

PERMITS, RENEWALS, & MODS

Chavez, Carl J, EMNRD

From:	Chavez, Carl J, EMNRD
Sent:	Thursday, July 02, 2015 9:43 AM
То:	'Lane, James, DGF'; Wunder, Matthew, DGF; 'Allison, Arthur, DIA';
	'ddapr@nmda.nmsu.edu'; 'jjuen@blm.gov'; 'psisneros@nmag.gov';
	'r@rthicksconsult.com'; 'sric.chris@earthlink.net'; 'nmparks@state.nm.us'; Verhines,
	Scott, OSE; 'peggy@nmbg.nmt.edu'; 'marieg@nmoga.org'; Fetner, William, NMENV;
	'lazarus@glorietageo.com'; 'cnewman02@fs.fed.us'; Kieling, John, NMENV;
	'bsg@garbhall.com'; 'Schoeppner, Jerry, NMENV'; 'claudette.horn@pnm.com';
	'ekendrick@montand.com'; 'staff@ipanm.org'; Dade, Randy, EMNRD; Bratcher, Mike,
	EMNRD; Perrin, Charlie, EMNRD; Jones, William V, EMNRD; Kelly, Jonathan, EMNRD;
	Powell, Brandon, EMNRD; Wojahn, Beth, EMNRD
Subject:	Navajo Refining Company, L.L.C. Artesia Refinery Discharge Permit (GW-028)
	Modification to Increase the Reverse Osmosis Reject Water Discharge Volume into
	Farm Fields Within the Property

Ladies and Gentlemen:

Please find below the New Mexico Oil Conservation Division (OCD) **initial** Public Notice for the above subject facility.

Discharge Permit (GW-028) Navajo Refining Company, L.L.C. Artesia Refinery (7/1/15) located at 501 East Main, Artesia, NM, 88210 in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County.

Administrative Completeness

Discharge Permit Modification to Increase the Reverse Osmosis Reject Water Discharge Volume Description

The OCD Website for public notices is at <u>http://www.emnrd.state.nm.us/OCD/env-draftpublicetc.html</u> (see "Draft Permits and Public Notices" section).

Please contact me if you have questions. Thank you.

Carl J. Chavez, CHMM

New Mexico Energy, Minerals & Natural Resources Department Oil Conservation Division, Environmental Bureau 1220 South St. Francis Drive, Santa Fe, New Mexico 87505 O: (505) 476-3490 E-mail: <u>CarlJ.Chavez@State.NM.US</u> Web: <u>http://www.emnrd.state.nm.us/ocd/</u>

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Chavez, Carl J, EMNRD

From:	Chavez, Carl J, EMNRD
Sent:	Wednesday, July 01, 2015 4:07 PM
То:	'Denton, Scott'; Griswold, Jim, EMNRD
Cc:	Marks, Allison, EMNRD; Brancard, Bill, EMNRD; McWatters, Denise; O'Brien, Robert
	(Bob) K.; Holder, Mike; Combs, Robert
Subject:	RE: Application for Modification of Discharge Permit GW-28 to Increase the Reverse
	Osmosis Reject Water Discharge Volume, dated May 22, 2015
Attachments:	OCD Admin Complete 7-1-2015.pdf

Scott:

Please find attached the New Mexico Oil Conservation Division's (OCD) Administratively Complete determination.

Thank you.

Carl J. Chavez, CHMM

New Mexico Energy, Minerals & Natural Resources Department Oil Conservation Division, Environmental Bureau 1220 South St. Francis Drive, Santa Fe, New Mexico 87505 O: (505) 476-3490 E-mail: <u>CarlJ.Chavez@State.NM.US</u> Web: <u>http://www.emnrd.state.nm.us/ocd/</u> **"Why Not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward With the Rest of the Nation?"** To see how, please go to: "Pollution Prevention & Waste Minimization" at http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental



From: Denton, Scott [mailto:Scott.Denton@HollyFrontier.com]

Sent: Wednesday, July 01, 2015 3:25 PM

To: Chavez, Carl J, EMNRD; Griswold, Jim, EMNRD

Cc: Marks, Allison, EMNRD; Brancard, Bill, EMNRD; McWatters, Denise; O'Brien, Robert (Bob) K.; Holder, Mike; Denton, Scott; Combs, Robert; Denton, Scott

Subject: RE: Application for Modification of Discharge Permit GW-28 to Increase the Reverse Osmosis Reject Water Discharge Volume, dated May 22, 2015

Carl & Jim,

Thanks for making time today to discuss changes to the Public Notice with me. I have attached the "highlighted" versions showing the changes that we discussed and a "clean" version. I hope this reduces your review time.

Since all the submittals have gone to the wide distribution, I thought I would continue that trend here.

Let me know if you have any questions. As I mentioned on the phone, I will be away from Artesia starting tomorrow and will return to the office on Tuesday. Enjoy the holiday weekend!

Thanks,

SMD

Scott M. Denton Environmental Manager

The HollyFrontier Companies P.O. Box 159 Artesia, NM 88211-0159 575-746-5487 (o) 970-581-7268 (c)

Scott.Denton@HollyFrontier.com

From: Chavez, Carl J, EMNRD [mailto:CarlJ.Chavez@state.nm.us]
Sent: Friday, June 26, 2015 3:40 PM
To: Denton, Scott
Subject: RE: Application for Modification of Discharge Permit GW-28 to Increase the Reverse Osmosis Reject Water Discharge Volume, dated May 22, 2015

Scott:

Good afternoon. The New Mexico Oil Conservation Division (OCD) has completed its review of Navajo's resubmittal of 6/25/2015 at 4:22 p.m.

On the public notice, paragraph 4: Please remove the entire section of text in the paragraph starting with, "However, based on investigations of the groundwater below the discharge locations, it is inconclusive whether the RO reject discharge......"

Please resubmit the public notice in Spanish and English to OCD for final approval.

Please contact me if you have questions. Thank you.

Carl J. Chavez, CHMM

New Mexico Energy, Minerals & Natural Resources Department Oil Conservation Division, Environmental Bureau 1220 South St. Francis Drive, Santa Fe, New Mexico 87505 O: (505) 476-3490 E-mail: <u>CarlJ.Chavez@State.NM.US</u> Web: <u>http://www.emnrd.state.nm.us/ocd/</u> **"Why Not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward With the Rest of the Nation?"** To see how, please go to: "Pollution Prevention & Waste Minimization" at http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental



From: Denton, Scott [mailto:Scott.Denton@HollyFrontier.com]
Sent: Thursday, June 25, 2015 4:22 PM
To: Chavez, Carl J, EMNRD; Griswold, Jim, EMNRD
Cc: Marks, Allison, EMNRD; Brancard, Bill, EMNRD; McWatters, Denise; O'Brien, Robert (Bob) K.; Holder, Mike; Denton, Scott; Combs, Robert
Subject: RE: Application for Modification of Discharge Permit GW-28 to Increase the Reverse Osmosis Reject Water Discharge Volume, dated May 22, 2015

Carl,

NRC has reviewed and updated the public notice to address your comments. Please see the attached draft public notice; also attached is the public notice in Spanish. The changes are highlighted for your review.

NRC has reviewed your request for additional modeling of the loading and infiltration of RO discharge applied to the discharge fields over the past 25 years (approximate). We propose to develop a 1-dimensional model to simulate the vertical transport of constituents through the vadose zone following the application of the discharge to the fields. For this work, we are using the geochemical modeling code PHREEQC with the Wateq4f geochemical database. The model will include the relevant geochemical processes that would potentially limit the transport of constituents of interest, including precipitation/dissolution, adsorption, and cation/anion exchange. The potential evapo-transpiration of water and subsequent concentration of inorganics within the fields prior to water percolation will also be assessed. A comparison of the quality of the RO reject stream will be made to the background groundwater concentrations.

A summary report of the evaluations will be submitted to OCD in July. We will not wait for the background study results, since it will not be ready until late July or early August.

Please let me know if you have any questions or any further comments.

Thanks,

SMD

Scott M. Denton Environmental Manager

The HollyFrontier Companies P.O. Box 159 Artesia, NM 88211-0159 575-746-5487 (o) 970-581-7268 (c)

Scott.Denton@HollyFrontier.com

From: Chavez, Carl J, EMNRD [<u>mailto:CarlJ.Chavez@state.nm.us</u>] Sent: Wednesday, June 03, 2015 4:14 PM To: Denton, Scott; Griswold, Jim, EMNRD **Cc:** Marks, Allison, EMNRD; Brancard, Bill, EMNRD; McWatters, Denise; O'Brien, Robert (Bob) K.; Holder, Mike **Subject:** Application for Modification of Discharge Permit GW-28 to Increase the Reverse Osmosis Reject Water Discharge Volume, dated May 22, 2015

Mr. Denton:

The Oil Conservation Division (OCD) has received Navajo Refining Company L.L.C.'s (operator) application for modification of the discharge permit and initial fee, dated May 22, 2015 for the Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9. N/2 of Section 12, Township 17 South. Range 26 East. NMPM, Eddy County, New Mexico.

The department has determined based on 20.6.2.3108 NMAC that the modification application is **not administratively complete**. The operator is encouraged to contact OCD to discuss Item 2 below.

The OCD has identified the following deficiencies:

- 1) Lack of the proposed locations and newspaper for providing notice [20.6.2.3108(A) NMAC].
- 2) Incomplete proposed public notice (see Attachment 1 Public Notice) per 20.6.2.3108(F) NMAC as follows:
 - a. Add zip code to the name and address of the proposed discharger [20.6.2.3108(F)(1) NMAC].
 - b. Add more specific discharge locations [20.6.2.3108(F)(2) NMAC], i.e., Unit Letter, Section, Township, and Range with more descriptive footages from major intersections to the two farm fields north and south of Eagle Creek.
 - Add description of the activities relative to the actual permit situation [20.6.2.3108(F)(3) NMAC], i.e., the RO Reject water discharges to farm fields are scheduled to terminate on or before October 21, 2016, etc.
 - d. Describe the expected reverse osmosis reject effluent quality from the two permanent units and the third temporary unit with sufficient information regarding discharge quality [20.6.2.3108(F)(4) NMAC], i.e. list constituents of concern, i.e., Chloride, Fluoride, Sulfate and Total Dissolved Solids, based on water quality exceedances to date.
 - e. Include language for requests for a copy or Web link of the application associated with OCD's contact information for questions [20.6.2.3108(F)(6) NMAC].

This section should not be misinterpreted to be required for OCD's Administrative Completeness review above; however, OCD is currently conducting a technical review of the application to expedite OCD's determination on the application and requests perhaps as "Attachment 5" of the application the following technical information:

- 1) A complete evaluation of RO Reject Water Quality, since the discharge was initiated.
- 2) A complete historical (> 25 years) evaluation with calculations of the estimated loading (tons) to the two 40-acre farm field areas or discharge areas based on historical (> 25 years) RO Reject Water Quality data, i.e., General Chemistry (Cl, F, SO4, NO3, and TDS) and Metals.
- 3) A contaminant hydrogeologic model of the two farm fields and the leachate discharge to groundwater beneath the two discharge locations based on 25 ft. of unsaturated zone (as a function of the actual sedimentation or lithologic units present beneath the two areas) with groundwater present at the same depth.
- 4) A statistical evaluation of max./min./avg., all exceedances of water quality standards, etc. leachate discharge levels in groundwater beneath each farm field.

Upon receipt of the administrative completeness information or deficiencies requested above, OCD may deem the application administratively complete and provide public notice pursuant to the WQCC notice requirements of 20.6.2.3108 NMAC to determine if there is any public interest.

Please contact me at (505) 476-3490 or <u>carlj.chavez@state.nm.us</u> if you have questions. Thank you for your cooperation in this matter.

Respectfully,

Carl J. Chavez, CHMM

New Mexico Energy, Minerals & Natural Resources Department Oil Conservation Division, Environmental Bureau 1220 South St. Francis Drive, Santa Fe, New Mexico 87505 O: (505) 476-3490 E-mail: <u>CarlJ.Chavez@State.NM.US</u> Web: <u>http://www.emnrd.state.nm.us/ocd/</u> **"Why Not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward With the Rest of the Nation?"** To see how, please go to: "Pollution Prevention & Waste Minimization" at http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental



From: Denton, Scott [mailto:Scott.Denton@HollyFrontier.com]
Sent: Friday, May 22, 2015 4:54 PM
To: Griswold, Jim, EMNRD; Chavez, Carl J, EMNRD
Cc: Marks, Allison, EMNRD; Brancard, Bill, EMNRD; McWatters, Denise; O'Brien, Robert (Bob) K.; Holder, Mike; Denton, Scott
Subject: GW-028 Permit Modification Submittal

Jim & Carl,

Attached it the permit modification for GW-028 and a copy of the filing fee that was mailed today.

Let me know if you have any questions.

Thanks,

SMD

Scott M. Denton Environmental Manager

The HollyFrontier Companies P.O. Box 159 Artesia, NM 88211-0159 575-746-5487 CONFIDENTIALITY NOTICE: This e-mail, and any attachments, may contain information that is privileged and confidential. If you received this message in error, please advise the sender immediately by reply e-mail and do not retain any paper or electronic copies of this message or any attachments. Unless expressly stated, nothing contained in this message should be construed as a digital or electronic signature or a commitment to a binding agreement. New Mexico Energy, Minerals and Natural Resources Department

Susana Martinez Governor

David Martin Cabinet Secretary

Brett F. Woods, Ph.D. Deputy Cabinet Secretary David R. Catanach, Division Director Oil Conservation Division



JULY 1, 2015

CERTIFIED MAIL RETURN RECEIPT NO: 3771 5886

Mr. Scott M. Denton Environmental Manager The HollyFrontier Companies P.O. Box 159 Artesia, NM 88211-0159

Re: Navajo Refining Company, L.L.C., Artesia Refinery (GW-028) Application for Modification to Increase the Reverse Osmosis Reject Water Discharge Volume into Two RO Reject Farm Fields dated May 22, 2015, Eddy County, New Mexico

Mr. Denton,

The New Mexico Oil Conservation Division (NMOCD) or department has received Navajo Refining Company L.L.C.'s application for modification of the discharge permit and initial fee, dated May 22, 2015 for the Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9. N/2 of Section 12, Township 17 South. Range 26 East. NMPM, Eddy County, New Mexico. Subsequent submittals have provided the required information in order for OCD to deem the application "administratively" complete.

Therefore, the New Mexico Water Quality Control Commission regulations (WQCC) notice requirements of 20.6.2.3108 NMAC must be satisfied and demonstrated to the OCD. OCD will provide public notice pursuant to the WQCC notice requirements of 20.6.2.3108 NMAC to determine if there is any public interest.

Please contact me at (505) 476-3490 or <u>carlj.chavez@state.nm.us</u> if you have questions. Thank you for your cooperation throughout the discharge permit modification review process.

Respectfully,

Carl J. Chavez

Environmental Engineer

xc: Artesia District Office





Susana Martinez Governor

David Martin Cabinet Secretary

Brett F. Woods, Ph.D. Deputy Cabinet Secretary

November 24, 2014

Michael McKee Navajo Refining Company, LLC 501 East Main Artesia, New Mexico 88210 Jami Bailey Division Director Oil Conservation Division



RE: Amendment of Discharge Permit GW-28 Concerning the Navajo Refinery in Artesia, New Mexico

Mr. McKee:

The Oil Conservation Division (OCD) has reviewed Navajo Refining Company's (Navajo's) request of November 3, 2014, regarding a time extension for the continuing land application of reject water from a reverse osmosis unit. The active GW-28 permit requires this surface discharge to cease no later than August 22, 2015 and Navajo has requested an extension to October 21, 2016, concurrent with the expiration/potential renewal date of the permit.

The OCD understands Navajo is in the process of substantially improving the refinery's water use, treatment, and disposal infrastructure as discussed in your request as well as during our meetings of October 16th and November 7th. The extension would allow time for that larger effort to be realized potentially resulting in a relative reduction in water consumption by the refinery, improved wastewater treatment, and more environmentally protective options of disposal.

The OCD is also in receipt of Navajo's November 7th application for a new nonhazardous injection well, WDW-4, which could, in conjunction with the three existing injection wells, provide sustained or even increased disposal capacity. It was discussed during our most recent meeting that this well could be a candidate, given other constraining factors, for the wastewater currently being discharged to the surface at the farms. We are also aware that a petition has been submitted to the Water Quality Control Commission to allow permitted injection wells to potentially accept hazardous waste. If adopted and applied to WDW-4, this would indirectly allow increased purification by reverse osmosis and improved water reuse, but create a reject stream containing higher contaminant concentrations.

The OCD hereby conditionally approves the extension of time. As such, the discharge permit is amended as follows:

Section 4.A. Discharge Volume: The Permittee is authorized to discharge approximately 10,000 barrels per day of reverse osmosis reject fluids to the surface at the Permittee's two farms. Discharge to Eagle Draw is prohibited. This authorization will expire no later than October 21, 2016 or when the proposed new Class I injection well is operationally capable of accepting this waste stream, whichever occurs first.

Section 6.C. Requirement to Cease All Discharge of Reverse Osmosis Reject Fluids to the Surface at the Two Farms. The Permittee shall cease all discharges of reverse osmosis reject fluids (approximately 10,000 barrels per day) and/or any other waste discharge to the surface on or before October 21, 2016 or when the proposed new Class I injection well is operationally capable of accepting this waste stream, whichever occurs first.



November 24, 2014 Page 2

Be advised that approval of this permit does not relieve Navajo of its responsibilities should operations result in pollution of surface water, groundwater, or the environment. Nor does this permit relieve Navajo of its responsibility to comply with any other applicable governmental rules or regulations.

If you have any questions, please contact Carl Chavez of my staff at (505) 476-3490 or by email at *carlj.chavez@state.nm.us*. On behalf of the Oil Conservation Division, I wish to thank you and your staff for your cooperation during our review of this modification request.

Respectfully,

2-12

Jim Griswold Environmental Bureau Chief

cc: OCD District II, Artesia Mike Holder, HollyFrontier

Chavez, Carl J, EMNRD

From:	Holder, Mike <michael.holder@hollyfrontier.com></michael.holder@hollyfrontier.com>
Sent:	Tuesday, June 24, 2014 11:50 AM
То:	Chavez, Carl J, EMNRD
Cc:	Holder, Mike; Crawford, Dan; Dawson, Scott, EMNRD; Griswold, Jim, EMNRD
Subject:	Re: Minor Permit Modification for ICP & SeRT Installation (Refinery: GW-028 & WDWs: UICI-008)
Attachments:	image001.png

Thanks Carl!

> On Jun 24, 2014, at 10:47 AM, "Chavez, Carl J, EMNRD" <<u>CarlJ.Chavez@state.nm.us</u>> wrote:

> > M#

> Mr. Holder:

> The New Mexico Oil Conservation Division (OCD) has completed its review of the Navajo Refining Company, LLC "Modification Request" for the installation of the Iron Co-precipitation (ICP) Unit and Selenium Reduction Technology (SeRTTM) Unit with various associated operational locations before injection of waste fluids occurs into disposal wells east of the refinery.

>

> OCD hereby approves the modification request that serves to reduce the Selenium concentration of injected fluids to below the regulatory limit before injection into the Underground Injection Control (UIC) Class I (non-hazardous) Disposal Wells associated with the Artesia Refinery. The operator shall submit revisions of any drawings, etc., as needed, if any changes occur, within 30-days of completion of a change(s).

>

> Please contact me if you have questions. Thank you.

> >

- > Carl J. Chavez, CHMM
- > New Mexico Energy, Minerals & Natural Resources Department Oil
- > Conservation Division, Environmental Bureau
- > 1220 South St. Francis Drive, Santa Fe, New Mexico 87505
- >O: (505) 476-3490
- > E-mail: <u>CarlJ.Chavez@State.NM.US<mailto:CarlJ.Chavez@State.NM.US</u>>
- > Web: <u>http://www.emnrd.state.nm.us/ocd/</u> "Why Not Prevent Pollution;
- > Minimize Waste; Reduce the Cost of Operations; & Move Forward With the
- > Rest of the Nation?" To see how, please go to: "Pollution Prevention &
- > Waste Minimization" at
- > http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental

>

- > [MC900151187[1]]
- >
- > From: Holder, Mike [mailto:Michael.Holder@hollyfrontier.com]
- > Sent: Monday, June 02, 2014 2:39 PM
- > To: Chavez, Carl J, EMNRD
- > Cc: Holder, Mike; Crawford, Dan; Dawson, Scott, EMNRD; Griswold, Jim,
- > EMNRD
- > Subject: Minor Permit Modification for ICP & SeRT

>

> Carl – at our March 1, 2014 meeting you indicated a minor permit modification was needed for the installation of the SeRT & ICP units at the Artesia Refinery. We've attached the modification for your review – please don't hesitate to contact us w/any questions or comments you may have. Thanks for your assistance!

> > Mike Holder

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> <image001.png>

> <OCD_Permit_Mod_Letter 6-2-2014.pdf>

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Chavez, Carl J, EMNRD

From:	Holder, Mike <michael.holder@hollyfrontier.com></michael.holder@hollyfrontier.com>					
Sent:	Monday, June 02, 2014 2:39 PM					
То:	Chavez, Carl J, EMNRD					
Cc:	Holder, Mike; Crawford, Dan; Dawson, Scott, EMNRD; Griswold, Jim, EMNRD					
Subject:	Minor Permit Modification for ICP & SeRT					
Attachments:	OCD_Permit_Mod_Letter.pdf					

Carl – at our March 1, 2014 meeting you indicated a minor permit modification was needed for the installation of the SeRT & ICP units at the Artesia Refinery. We've attached the modification for your review – please don't hesitate to contact us w/any questions or comments you may have. Thanks for your assistance!

Mike Holder

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June 2, 2014

Mr. Scott Dawson Mr. Carl Chavez Oil Conservation Division New Mexico Energy, Minerals & Natural Resources Department 1220 South St. Francis Drive Santa Fe, NM 87505

Certified Mail/Return Receipt 7007 3020 0000 3028 8093

RE: Minor Modification for Navajo Refining Company, L.L.C. Discharge Permit GW-028 Discharge Permit WDW-1, API No. 30-015-27592 Discharge Permit WBW-2, API No. 30-015-20894 Discharge Permit WDW-3, API No. 30-015-26575

Dear Sirs:

As discussed with you and other agency personnel during a meeting in your Sante Fe offices on March 1, 2014, Navajo Refining Company, L.L.C. (Navajo) recently added the following two systems to reduce the amount of selenium in the wastewater discharge and plans to continue operating them as part of the near-term selenium control strategy.

- Iron co-precipitation (ICP) process
- 100 gpm SeRT® (*Phillips 66* Selenium Removal Technology) process

Pursuant to Condition 1.G of Discharge Permits WDW-1, WDW-2, and WDW-3, and Discharge Permit GW-028, Navajo is required to notify the OCD Director and the Division's Environmental Bureau of any facility expansion, production increase, or process modification that would result in any significant modification in the discharge of water contaminants. It is Navajo's understanding from the March 1st meeting that this notification is considered a minor modification to the existing permit and can be handled administratively.

In April 2014, Navajo obtained an Amendment to Amend and Supplement the Agreed Compliance Order WQA-OCD-CO-2013-001(ACO) from the OCD. Paragraph 13 of Exhibit A, as amended, required Navajo to commence full-scale operation of the ICP system and the trial SeRT® unit by February 1, 2014, and to provide confirmation of selenium reduction with the 100 gpm SeRT® unit by March 31, 2014. These deadlines were met as previously documented in a monthly interim progress report.

Navajo has been moving forward expeditiously with evaluation, feasibility testing, and installation of both the ICP and SeRT® technologies as part of Navajo's remedy for selenium reduction. Figure 1 (*Appendix A*) is a schematic of these two processes at the refinery. SeRT® is being implemented for upstream stripped sour water (SSW) selenium treatment while the ICP is for end of pipe treatment at the refinery wastewater treatment plant (WWTP).

ICP Process

Technology Overview

The ICP process is a chemical precipitation process where an iron based coagulant is added to the water for selenium removal by transforming the dissolved selenium to a solid or insoluble floc. For selenium removal, typically a ferric coagulant (e.g., ferric chloride (FeCl₃)]) is used with a polymer to precipitate selenium with other suspended solids. ICP is the most commonly used process for selenium removal in oil refineries. ICP is effective for selenium removal when it is present in the selenite form, like downstream of the biological wastewater treatment process.

Process Overview

At Navajo, the ICP process is being implemented to reduce the amount of selenium within the refinery wastewater by chemically converting selenium to a solid particle in the wastewater, which is then removed by the existing DAF unit and filters prior to injection within the well field. Navajo selected ICP because of the feasibility of implementing this proven process at full scale in a shorter timeframe than other options.

Ferric chloride is added inline downstream of the two aeration tanks and upstream of the flocculator through existing injection points. The dosage for ferric chloride is generally maintained at about 50 mg/L. Coagulant and polymer addition through the existing feed systems, currently in place for solids removal at the DAF, will continue to operate without any significant changes. The flocculator provides sufficient mixing for floc formation which captures the selenium into the solids. The solids are subsequently removed by flotation in the DAF unit. The DAF unit float, which includes the iron solids containing the selenium, are sent to the existing DAF sludge tanks for further handling and disposal. Throughout the ICP trial, DAF solids were sent for TCLP selenium analysis, and lab reports show that the solids are not hazardous.

Material Safety Data Sheets (MSDSs) for the coagulant, polymer and ferric chloride were previously provided to OCD via email dated 12/03/13 (*Injection Well Historical Data for Effluent Analyses*). There will be no significant changes to the quality of the effluent sent to the deep wells for injection, except the selenium concentration will be reduced.

Performance Summary

The full-scale trial for the ICP process was commenced in November 2013. Since then, the ICP has been converted into continuous full-scale operation through further testing and optimization of the process and iron dosage rates. A summary of the results of sampling collected pursuant to Paragraph 1 of Exhibit A to the ACO, as amended, are presented in Figure 2. The data in Figure 2 represents three distinct operating periods. Period 1 represents no treatment of selenium. Period 2 represents the effect of ICP treatment of selenium. Period 3 represents the combined impact of SSW SeRT® pretreatment and ICP treatment of biological system effluent.

It can be seen from the November and December 2013 data that the selenium concentrations dropped significantly from a range of 0.7-1.2 mg/L prior to the ICP trial to 0.2-0.4 mg/L when the ICP process was optimized for selenium removal. The ICP trial results are summarized in Table 2 in *Appendix B* and show an average total selenium removal efficiency of 73%.

Navajo Refining Company, L.L.C. 501 East Main • Artesia, NM 88210 (575) 748-3311 • <u>http://www.hollyfrontier.com</u>

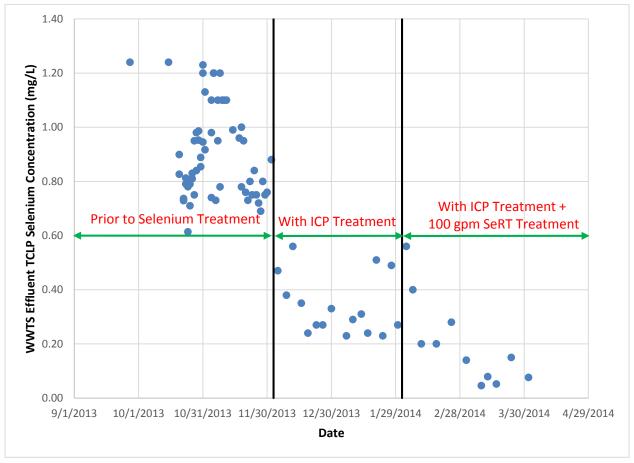


Figure 2: Selenium Measurements Collected Pursuant to Paragraph 1 of Exhibit A to the ACO (mg/L)

SeRT® Process

Technology Overview

The SeRT® process is a patented, adsorption process for removing selenium present in the selenocyanate (SeCN) form from aqueous streams. The process involves contacting the SSW effluent with a tailored granular activated carbon (GAC) based sorbent to remove SeCN by adsorption. Pretreatment is generally required to remove particulates and organic contaminants that can affect SeCN removal because of competitive adsorption.

Process Overview

Navajo is currently testing the SeRT® process on refinery SSW using a trial unit. A set of feed pumps are provided to feed SSW to the SeRT® process. The SSW requires heating in a shell and tube heat exchanger to the optimal temperature for the SeRT® process. The heated SSW is then sent through filtration to remove particulates and organic contaminants as pretreatment for the SeRT® process.

The next step in the process is pH adjustment to optimal Selenium adsorption conditions. The pH adjusted SSW then passes through additional filtration to remove solid material that can be formed during pH adjustment. The filter effluent is then sent through the SeRT® vessel for selenium

Navajo Refining Company, L.L.C. 501 East Main • Artesia, NM 88210 (575) 748-3311 • <u>http://www.hollyfrontier.com</u> removal followed by adjustment to neutral pH. The treated SSW is then cooled to around 110 °F using a fin fan cooler to be suitable for use at the application points downstream in the refinery.

Performance Summary

The full-scale operation of the 100 gpm SeRT® unit was commenced in February 2014. A summary of the results of sampling collected pursuant to Paragraph 1 of Exhibit A to the ACO, as amended, are presented in Figure 2. It can be seen that since the SeRT® unit came online in February, effluent selenium concentrations dropped further to generally < 0.2 mg/L when the process was optimized. The trial results for the 100 gpm SeRT® unit are summarized in Table 3 in *Appendix B* and show an average total selenium removal efficiency of 92%.

Since the installation and operation of the ICP and 100 gpm SeRT® processes, TCLP selenium concentrations in the effluent wastewater are significantly below 1 mg/L. Review of the data shows that either process could operate without the other and would be capable of achieving the treatment requirement. Based on the performance data collected so far, these two technologies are effective in meeting Navajo's near-term goal of reducing selenium concentrations in the discharge to less than 1.0 mg/L TCLP prior to the injection wells.

Navajo appreciates the continued cooperation of the NM OCD. Should you have questions, please do not hesitate to contact me at (575) 308-1115 or <u>mike.holder@hollyfrontier.com</u>. Thank you for your assistance in this matter.

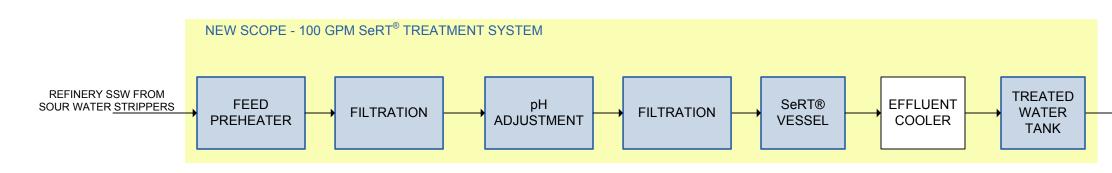
Sincerely,

mudal a Hilde

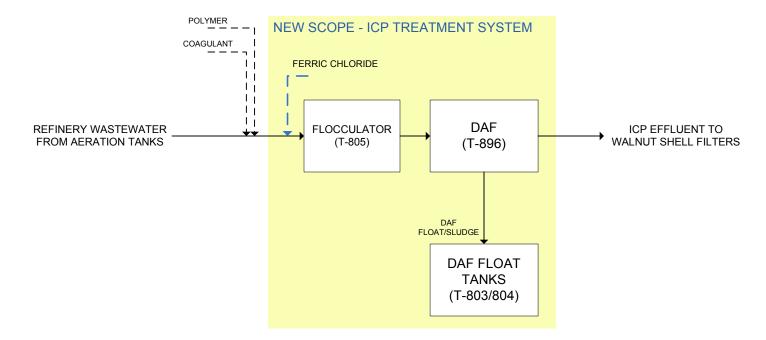
Mike Holder Corporate Environmental Specialist HollyFrontier

Appendix A Process Schematic

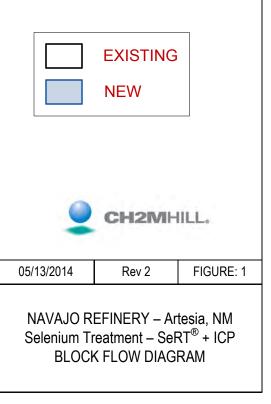
STRIPPED SOUR WATER (SSW) SYSTEM



REFINERY WASTEWATER TREATMENT PLANT (WWTP)







Appendix B Summary Tables – Analytical Data

DATE	Sampling Location	Laboratory	Method	TCLP Selenie	um (mg/L)
DATE		Laboratory	Method	Split Samples	Average ²
10/24/20121	T 001 Effluent	ALS Environmental	SW1311/ 6020	0.82	0.70
10/24/2013 ¹	T-801 Effluent	Hall Environmental	EPA 6010B	0.74	0.78
10/28/2013 ¹	T-801 Effluent	Hall Environmental	EPA 6010B	0.98	0.98
11/04/2013 ¹	Injection Well Effluent Sampling Point	Hall Environmental	EPA 6010B	1.10	1.10
11/11/2013 ¹	Injection Well Effluent Sampling Point	Hall Environmental	EPA 6010B	0.088	0.088
11/18/2013	Injection Well Effluent Sampling Point	Hall Environmental	EPA 6010B	0.78	0.78
11/25/2013	T-801 Effluent to Wells	Hall Environmental	EPA 6010B	0.75	0.75
12/02/2013	T-836 Effluent to Wells	Hall Environmental	EPA 6010B	0.88	0.88
12/09/2013	T-801 Effluent to Wells	Hall Environmental	EPA 6010B	0.38	0.38
12/16/2013	T-801 Effluent to Wells	Hall Environmental	EPA 6010B	0.35	0.35
12/23/2013	T-836 Effluent to Wells	Hall Environmental	EPA 6010B	0.27	0.27
12/30/2013	T-836 Effluent to Wells	Hall Environmental	EPA 6010B	0.33	0.33
01/06/2014	T-836 Effluent to Wells	Hall Environmental	EPA 6010B	0.23	0.23
01/13/2014	T-801 Effluent to Wells	Hall Environmental	EPA 6010B	0.31	0.31
01/20/2014	T-836 Effluent to Wells	Hall Environmental	EPA 6010B	0.51	0.51
01/27/2014	T-801 Effluent to Wells	Hall Environmental	EPA 6010B	0.49	0.49
02/03/2014	T-836 Effluent to Wells	Hall Environmental	EPA 6010B	0.56	0.56
02/10/2014	T-836 Effluent to Wells	Hall Environmental	EPA 6010B	0.20	0.20
02/17/2014	T-801 Effluent to Wells	Hall Environmental	EPA 6010B	0.20	0.20
02/24/2014	T-801 Effluent to Wells	Hall Environmental	EPA 6010B	0.28	0.28
03/03/2014	T-801 Effluent to Wells	Hall Environmental	EPA 6010B	0.14	0.14
03/10/2014	T-836 Effluent to Wells	Hall Environmental	EPA 6010B	0.05	0.05
03/13/2014	T-836 Effluent to Wells	Hall Environmental	EPA 6010B	0.08	0.08
03/17/2014	T-801 Effluent to Wells	Hall Environmental	EPA 6010B	0.05	0.05
03/24/2014	T-801 Effluent to Wells	Hall Environmental	EPA6010B	0.15	0.15
04/01/2014	T-801 Effluent to Wells	Hall Environmental	EPA6010B	0.08	0.08

Table 1: Selenium Measurements Collected Pursuant to Paragraph 1 of Exhibit A to the ACO (mg/L)

¹Samples collected per the requirements of the Agreed Compliance Order No. WQA-OCD-CO-2013-001 signed on October 24, 2013.

²For split samples.

		T-80	05 Eff.	DAF	Eff.	Walnut Filter Eff.		Tank 809 Eff.		Removal Efficiency
DATE	Laboratory	Total Se	TCLP Se	Total Se	TCLP Se	Total Se	TCLP Se	Total Se	TCLP Se	on Total Se
12/27/2013	Hall Environmental	1.1	0.30	0.38	0.30	0.37	0.31	0.38	0.34	66%
12/30/2013	Hall Environmental	1.6	0.37	0.63	0.35	0.43	0.34	-	-	73%
01/06/2014	Hall Environmental	1.2	0.17	0.34	0.18	0.27	0.20	-	-	78%
01/09/2014	Hall Environmental	1.8	0.14	0.42	0.21	0.43	0.25	-	-	76%
01/13/2014	Hall Environmental	2.1	0.34	0.41	0.33	0.37	0.35	-	-	82%
01/16/2014	Hall Environmental	1.6	0.18	0.25	0.22	0.20	0.20	-	-	88%
01/20/2014	Hall Environmental	1.0	0.55	0.75	0.57	0.54	0.55	-	-	46%
01/23/2014	Hall Environmental	1.4	0.18	0.24	0.19	0.21	0.20	-	-	85%
01/27/2014	Hall Environmental	1.2	0.43	0.55	0.58	0.51	0.51	-	-	58%
01/30/2014	Hall Environmental	1.0	0.26	0.30	0.27	0.23	0.29	-	-	77%
									Average	73%

Table 2: Selenium Measurements Collected During the Iron Co-Precipitation Trial (mg/L)

		SeRT Flow	SeRT I	nfluent	SeRT E	ffluent	Removal Efficiency
		-	Total Se	TCLP Se	Total Se	TCLP Se	On Total Se
DATE	Laboratory	(gpm)	(ppm)	(ppm)	(ppm)	(ppm)	-
02/10/2014	Hall Environmental	75	5.20	-	0.31	-	94%
02/12/2014	Hall Environmental	85	6.50	-	0.60	-	91%
02/13/2014	Hall Environmental	85	6.00	6.50	0.81	0.83	87%
02/17/2014	Hall Environmental	100	6.60	8.30	1.20	1.70	82%
02/19/2014	Hall Environmental	85	7.20	7.50	1.20	1.30	83%
02/20/2014	Hall Environmental	98	7.00	7.50	1.40	1.70	80%
02/24/2014	Hall Environmental	102	7.00	6.90	1.50	1.70	79%
02/26/2014	Hall Environmental	102	6.60	5.70	1.50	1.40	77%
02/27/2014	Hall Environmental	104	5.80	6.20	0.46	0.50	92%
03/03/2014	Hall Environmental	104	5.60	5.60	0.49	0.57	91%
03/05/2014	Hall Environmental	106	5.70	5.40	0.56	0.61	90%
03/06/2014	Hall Environmental	115	5.40	5.40	0.44	0.52	92%
03/10/2014	Hall Environmental	115	5.30	5.70	0.19	0.23	96%
03/12/2014	Hall Environmental	113	5.20	5.10	0.21	0.23	96%
03/13/2014	Hall Environmental	115	5.00	5.30	0.14	0.16	97%
03/17/2014	Hall Environmental	120	4.40	4.80	0.14	0.19	97%
03/19/2014	Hall Environmental	110	3.90	4.30	0.17	0.20	96%
03/20/2014	Hall Environmental	84	4.40	4.80	0.11	0.11	98%
03/24/2014	Hall Environmental	100	4.70	5.40	0.22	0.28	95%
03/27/2014	Hall Environmental	94	3.90	-	0.12	-	97%
03/31/2014	Hall Environmental	112	4.40	-	0.15	-	97%
04/03/2014	Hall Environmental	125	3.60	-	0.12	-	97%
04/07/2014	Hall Environmental	110	4.70	-	0.13	-	97%
04/10/2014	Hall Environmental	130	4.10	-	0.14	-	97%
04/14/2014	Hall Environmental	108	3.90	-	0.16	-	96%
04/17/2014	Hall Environmental	125	4.00	-	0.14	-	97%
04/21/2014	Hall Environmental	105	3.00	-	0.13	-	96%
04/24/2014	Hall Environmental	-	3.50	-	0.25	-	93%
						Average	92%

Table 3: Selenium Measurements Collected During the 100 gpm Trial SeRT® Unit

Chavez, Carl J, EMNRD

From:	Holder, Mike <michael.holder@hollyfrontier.com></michael.holder@hollyfrontier.com>
Sent:	Monday, June 23, 2014 7:07 AM
То:	Chavez, Carl J, EMNRD
Cc:	Crawford, Dan; Dawson, Scott, EMNRD; Griswold, Jim, EMNRD; Sanchez, Daniel J.,
	EMNRD; Dade, Randy, EMNRD; Brancard, Bill, EMNRD; Holder, Mike
Subject:	RE: Artesia Refinery (GW-028) Minor Permit Modification Request for Installation of
	ICP & SeRT
Attachments:	WWTP-sampling location.pdf; Plot Plan.pdf; sert-plot plan.pdf; WW PFD (ICP
	redline).pdf; LAU - 80-V-02-D-02 (redline).pdf; ATT00001.txt

Carl,

Attached are figures showing the OCD approved sampling location (per your separate email of 6/10/14) and the new treatment units & their respective locations relative to the refinery & associated process units. Please let us know if any questions or if you need additional information. Thanks for your help!

Mike

From: Chavez, Carl J, EMNRD [mailto:CarlJ.Chavez@state.nm.us]
Sent: Tuesday, June 10, 2014 8:48 AM
To: Holder, Mike
Cc: Crawford, Dan; Dawson, Scott, EMNRD; Griswold, Jim, EMNRD; Sanchez, Daniel J., EMNRD; Dade, Randy, EMNRD; Brancard, Bill, EMNRD
Subject: Artesia Refinery (GW-028) Minor Permit Modification Request for Installation of ICP & SeRT

Mike, et al.:

Good morning. The New Mexico Oil Conservation Division (OCD) has reviewed the above subject "Modification Request" dated June 2, 2014.

OCD requests a diagram(s) of the new treatment units and their respective installation locations, i.e., map(s) relative to the refinery and associated process areas within the refinery.

Please contact me if you have questions. Thank you.

Carl J. Chavez, CHMM

New Mexico Energy, Minerals & Natural Resources Department Oil Conservation Division, Environmental Bureau 1220 South St. Francis Drive, Santa Fe, New Mexico 87505 O: (505) 476-3490 E-mail: <u>CarlJ.Chavez@State.NM.US</u> Web: <u>http://www.emnrd.state.nm.us/ocd/</u> "Why Not Prevent Pollution: Minimize Waste: Reduce the Cos

"Why Not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward With the Rest of the Nation?" To see how, please go to: "Pollution Prevention & Waste Minimization" at http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental

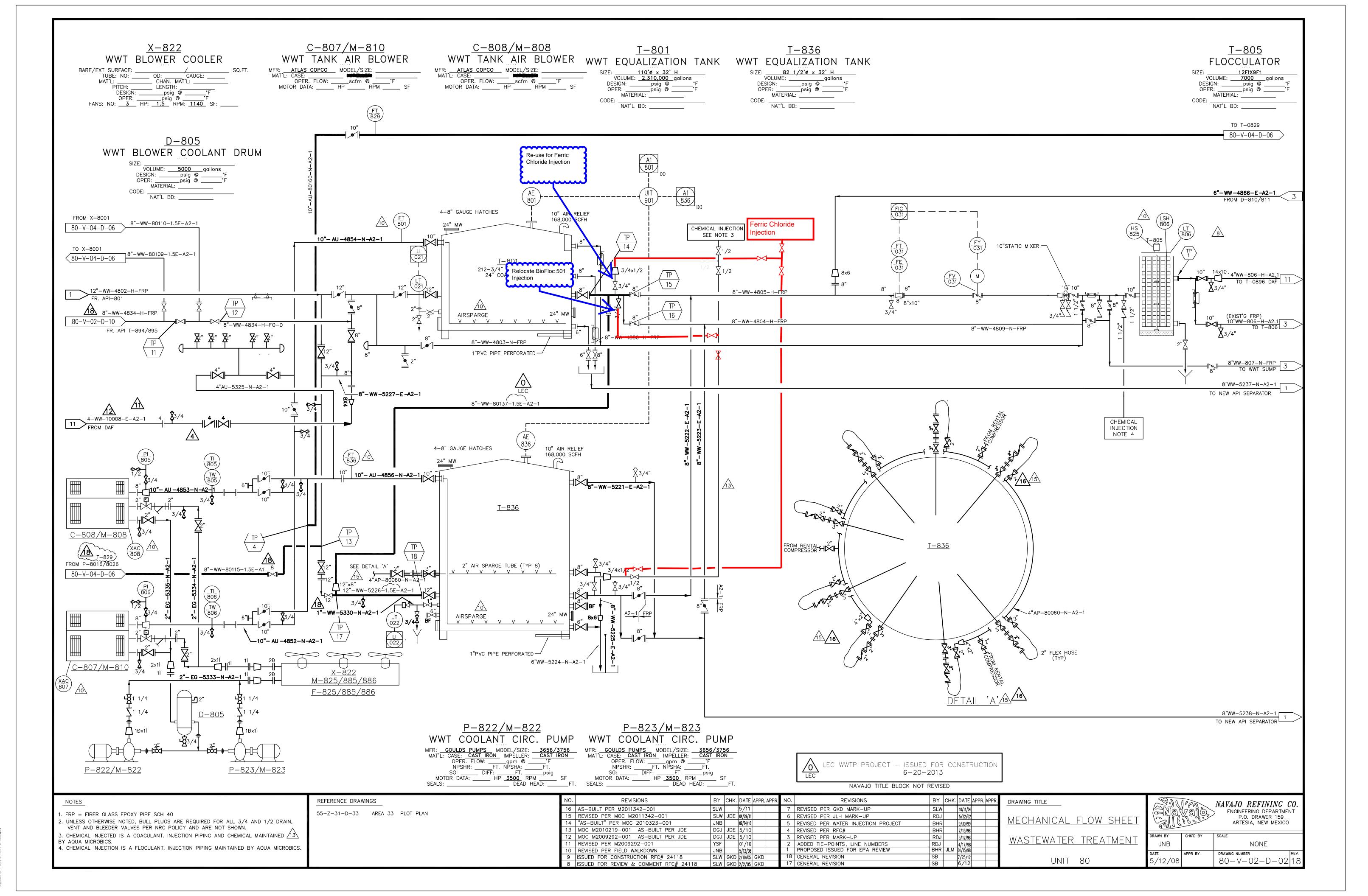


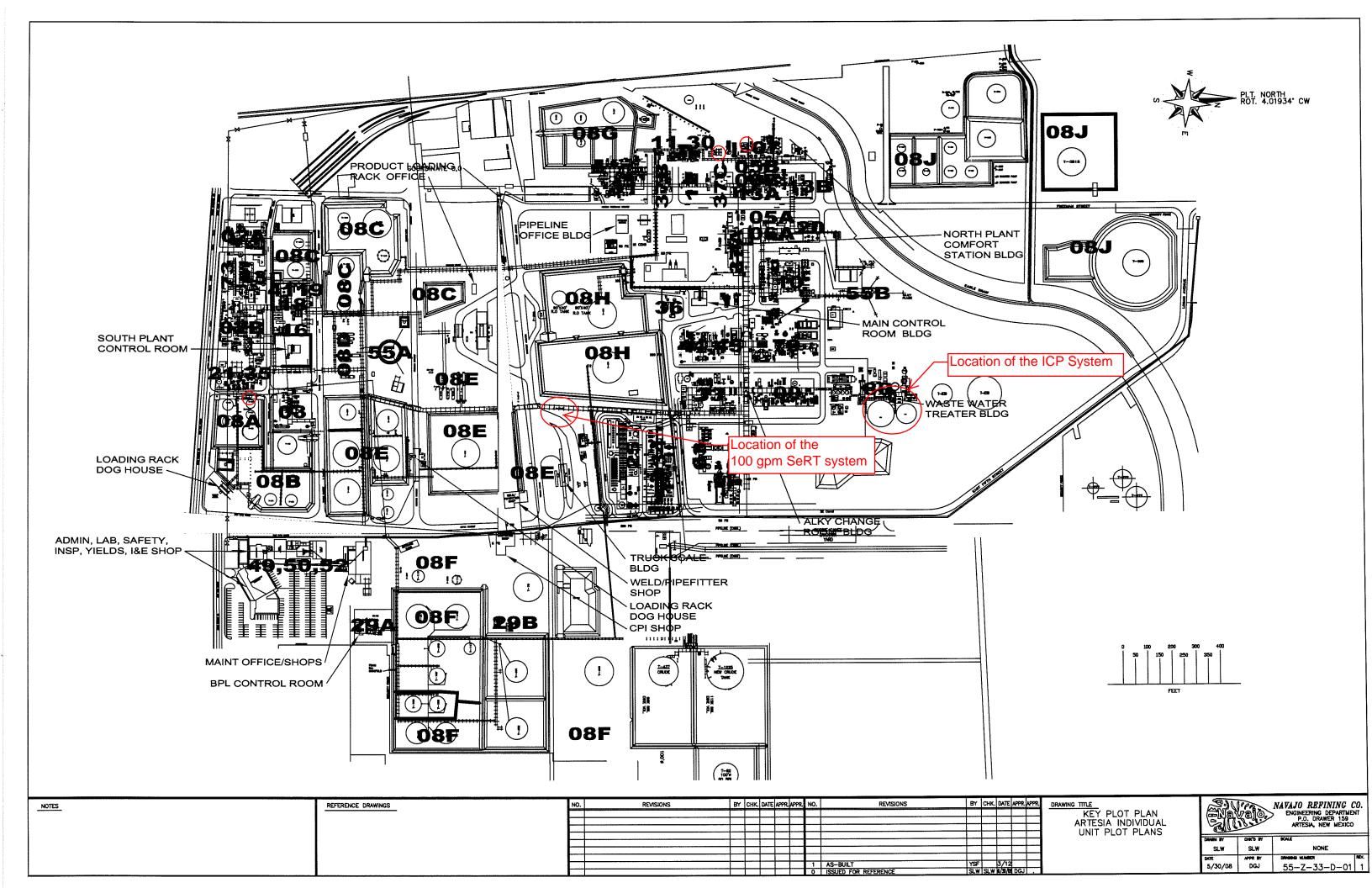
From: Holder, Mike [mailto:Michael.Holder@hollyfrontier.com]
Sent: Monday, June 02, 2014 2:39 PM
To: Chavez, Carl J, EMNRD
Cc: Holder, Mike; Crawford, Dan; Dawson, Scott, EMNRD; Griswold, Jim, EMNRD
Subject: Minor Permit Modification for ICP & SeRT

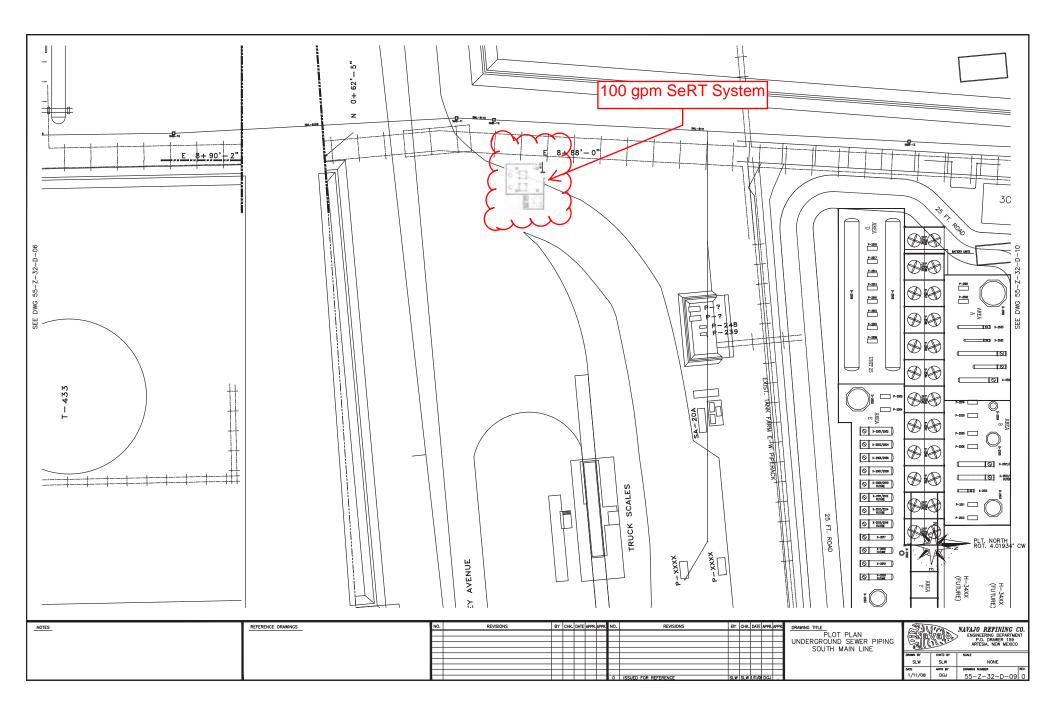
Carl – at our March 1, 2014 meeting you indicated a minor permit modification was needed for the installation of the SeRT & ICP units at the Artesia Refinery. We've attached the modification for your review – please don't hesitate to contact us w/any questions or comments you may have. Thanks for your assistance!

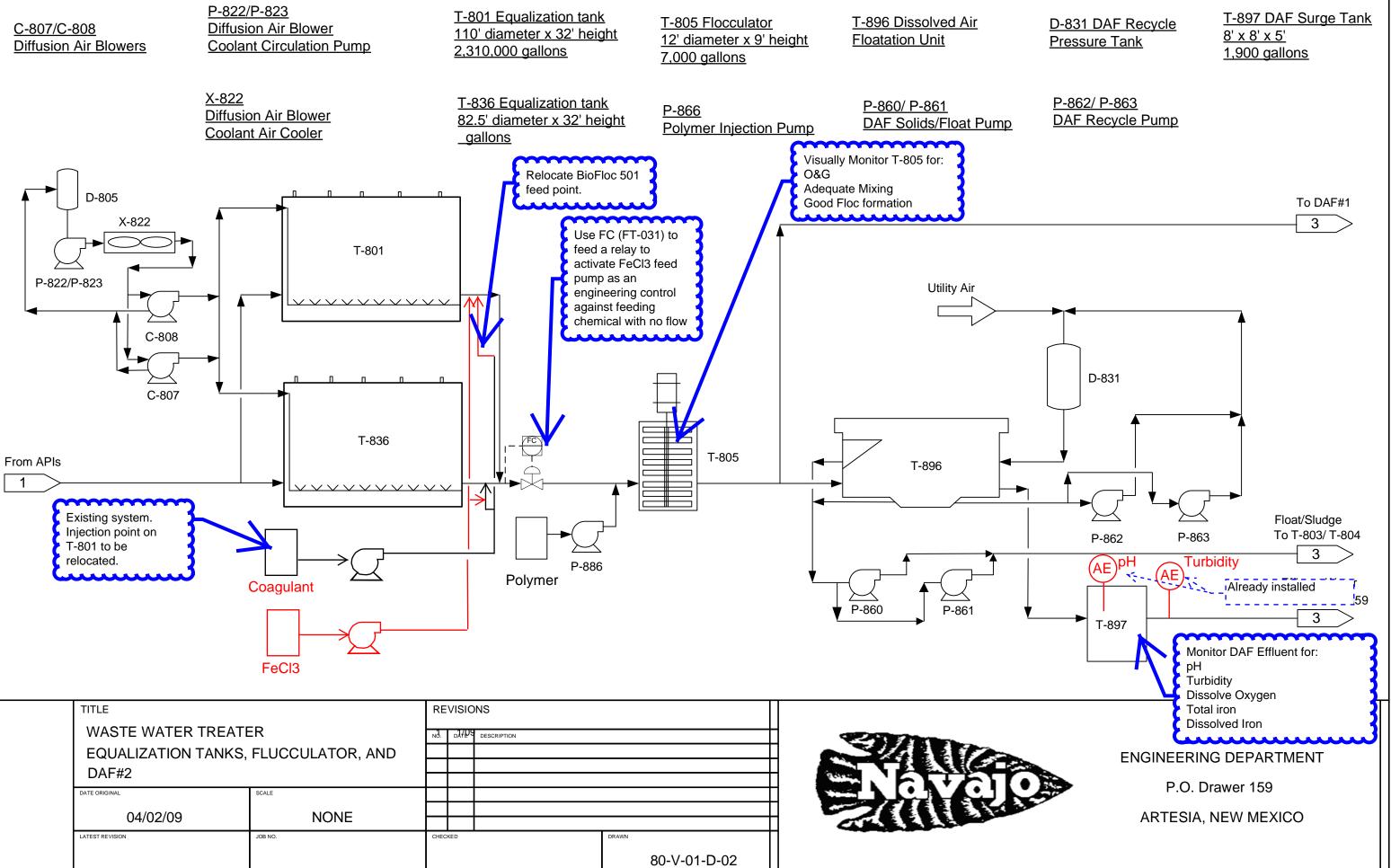
Mike Holder

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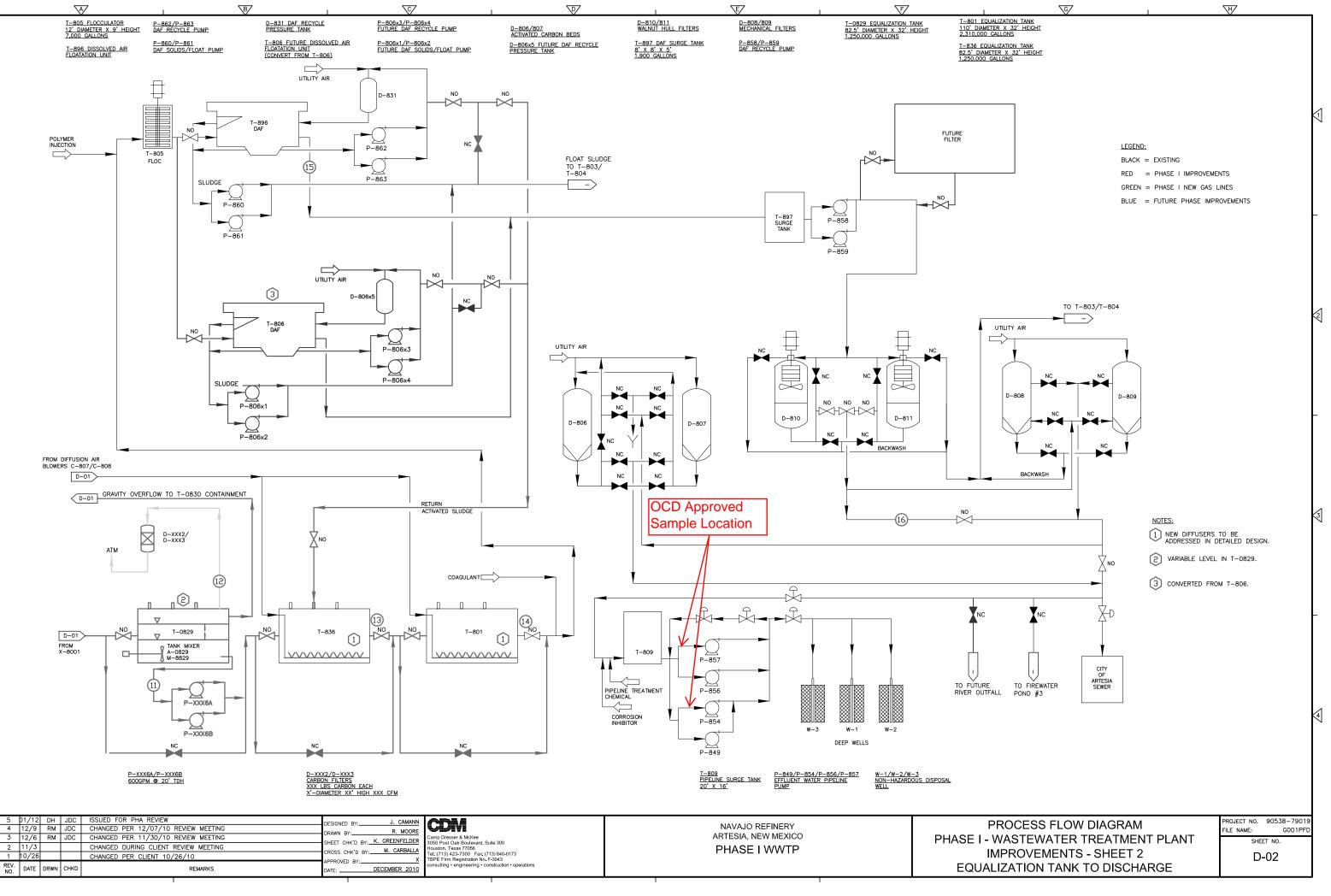






TITLE WASTE WATER TREATER EQUALIZATION TANKS, FLUCCULATOR, AND DAF#2			REVISIONS			
DATE ORIGINAL 04/02/09	SCALE NONE	CHE	CKED		DRAWN	Salar
	505 NJ.	UNE	ONED		80-V-01-D-02	

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State of New Mexico Energy, Minerals and Natural Resources Department

Susana Martinez Governor

John Bemis Cabinet Secretary

Brett F. Woods, Ph.D. Deputy Cabinet Secretary Jami Bailey Division Director Oll Conservation Division



AUGUST 22, 2012

CERTIFIED MAIL RETURN RECEIPT NO: 3341 0352

Mr. Johnny Lackey Environmental Manager Navajo Refining Company, LLC. P.O. Box 159 Artesia, NM 88211-0159

RE: OCD RESPONSE TO COMMENTS ON DRAFT DISCHARGE PERMIT AND APPROVAL OF FINAL DISCHARGE PERMIT FOR THE NAVAJO ARTESIA REFINERY (GW-028) SE/4 OF SECTION 1, E/2 OF SECTION 8, W/2 OF SECTION 9, N/2 OF SECTION 12, TOWNSHIP 17 SOUTH, RANGE 26 EAST, NMPM, EDDY COUNTY, NEW MEXICO

Dear Mr. Lackey:

The Oil Conservation Division (OCD) has reviewed Navajo's comments of July 12, 2012 on its draft discharge permit. OCD's *Response to Comments* is given in Attachment 1. OCD reviewed Navajo's comments and consequently made certain changes to Navajo's final discharge permit.

The discharge permit renewal (GW-028) for the Navajo Refining Company, LLC. Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico, is hereby approved under the terms and conditions specified in the enclosed Discharge Permit.

Navajo's original discharge permit was issued on October 21, 1991 and has been subsequently renewed. Navajo's discharge permit renewal application was submitted pursuant to 20.6.2.3106 NMAC. OCD approves this discharge permit renewal pursuant to 20.6.2.3109A NMAC. Please note 20.6.2.3109G NMAC, which provides for possible future amendment of the permit. Please be advised that approval of this discharge permit does not relieve Navajo of liability of operations result in pollution of surface water, ground water, or the environment.

Please note that 20.6.2.3104 NMAC specifies "When a permit has been issued, discharges must be consistent with the terms and conditions of the permit." Pursuant to 20.6.2.3107C NMAC, Navajo is required to notify the Director of any facility expansion, production increase, or

August 22, 2012 Page 2

process modification that would result in any change in the water quality or volume of the discharge.

This discharge permit will expire on October 21, 2016, and Navajo should submit a discharge permit renewal application in ample time before this date. Note that under 20.6.2.3106F NMAC, if a discharger submits a discharge permit renewal application at least 120 days before the discharge permit expires and is in compliance with the approved discharge permit, then the existing discharge permit will not expire until the application for renewal has been approved or disapproved.

The discharge permit renewal application for the Navajo Artesia Refinery is subject to 20.6.2.3114 NMAC. Every billable facility submitting a discharge permit renewal application is assessed a non-refundable filing fee of \$100.00. OCD has already received this filing fee. The permit fee for discharging at a refinery is \$8,400.00. The Permittee shall submit this amount along with the signed Discharge Permit. Checks must be payable to the "New Mexico Water Quality Management Fund," and **not** the Oil Conservation Division.

Please make all checks payable to:

WATER QUALITY MANAGEMENT FUND C/O: OIL CONSERVATION DIVISION 1220 NORTH ST. FRANCIS DRIVE SANTA FE, NEW MEXICO 87505

If you have any questions regarding this matter, please contact Glenn von Gonten at 505-476-3488. On behalf of the staff of OCD, I wish to thank you and your staff for your cooperation during this discharge permit renewal process.

Thank you for your cooperation.

Jami Bailey Director

JB/gvg

DISCHARGE PERMIT GW-028

1. GENERAL PROVISIONS:

1.A. PERMITTEE AND PERMITTED FACILITY: The Director of the Oil Conservation Division (OCD) of the Energy, Minerals and Natural Resources Department issues Discharge Permit GW-028 (Discharge Permit) to Navajo Refining Company (Permittee) located at 501 E. Main, Artesia, New Mexico 88210, to operate the Artesia Refinery (Facility) located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County. The refinery is located northeast of the intersection of Highway 285 and Highway 82, in Artesia, New Mexico.

The Permittee refines crude oil and processes natural gas at its Facility. The Facility refines and processes up to 50,000 barrels per day of crude oil and other feed stocks. The Permittee's Facility discharges approximately 10,000 barrels per day of reverse osmosis reject fluids to the surface at the Facility's two farms. The Permittee is abating ground water and vadose zone contamination at the Facility. Ground water that may be affected by a spill, leak, or accidental discharge occurs at a depth of approximately 25 feet below ground surface with a total dissolved solids concentration of approximately 2,500 mg/L.

1.B. SCOPE OF PERMIT: OCD has been granted authority to administer the Water Quality Act (Chapter 74, Article 6 NMSA 1978) as it applies to refineries by statute and by delegation from the Water Quality Control Commission pursuant to Section 74-6-4(E) NMSA 1978.

The Water Quality Act and the rules issued under that Act protect ground water and surface water of the State of New Mexico by providing that, unless otherwise allowed by rule, no person shall cause or allow effluent or leachate to discharge so that it may move directly or indirectly into ground water unless such discharge is pursuant to an approved discharge permit (See WQCC Regulations: 20.6.2.3104 NMAC and 20.6.2.3106 NMAC).

This Discharge Permit authorizes the Permittee to discharge approximately 10,000 barrels per day of reverse osmosis reject fluids at the Permittee's two farms. This Discharge Permit does not authorize any treatment of, or on-site disposal of, any materials, product, by-product, or oil field waste including, but not limited to, the on-site disposal of lube oil, glycol, antifreeze, filters, elemental sulfur, washdown water, contaminated soil, and cooling tower blowdown water.

This Discharge Permit does not convey any property rights of any sort nor any exclusive privilege, and does not authorize any injury to persons or property, any invasion of other private rights, or any infringement of state, federal, or local laws, rules or regulations.

The Permittee shall operate in accordance with the Discharge Permit conditions to comply with the Water Quality Act and the rules issued pursuant to that Act, so that neither a hazard to public health nor undue risk to property will result (See 20.6.2.3109C NMAC); so that no discharge will cause or may cause any stream standard to be violated (See 20.6.2.3109H(2) NMAC); so that no

NAVAJO REFINING COMPANY ARTESIA REFINERY

discharge of any water contaminant will result in a hazard to public health (See 20.6.2.3109H(3) NMAC); and, so that the numerical standards specified of 20.6.2.3103 NMAC are not exceeded.

1.C. DISCHARGE PERMIT RENEWAL: This Discharge Permit is a permit renewal that replaces the permit being renewed. Replacement of a prior permit does not relieve the Permittee of its responsibility to comply with the terms of that prior permit while that permit was in effect.

1.D. DEFINITIONS: Terms not specifically defined in this Discharge Permit shall have the same meanings as those in the Water Quality Act or the rules adopted pursuant to the Act, as the context requires.

1.E. FILING FEES AND PERMIT FEES: Pursuant to 20.6.2.3114 NMAC, every facility that submits a discharge permit application for initial approval or renewal shall pay the permit fees specified in Table 1 and the filing fee specified in Table 2 of 20.6.2.3114 NMAC. OCD has already received the required \$100.00 filing fee for this application. The permit fee for discharging at a refinery is \$8,400.00. The Permittee shall submit this amount along with the signed Discharge Permit. Checks must be payable to the "New Mexico Water Quality Management Fund," and not the Oil Conservation Division.

1.F. EFFECTIVE DATE, EXPIRATION, RENEWAL CONDITIONS, AND PENALTIES FOR OPERATING WITHOUT A DISCHARGE PERMIT: This Discharge Permit is effective 30 days from the date that the Permittee receives this discharge permit or until or until the permit is terminated. This Discharge Permit will expire on October 21, 2016. The Permittee shall submit an application for renewal no later than 120 days before that expiration date, pursuant to 20.6.2.3106F NMAC. If a Permittee submits a renewal application at least calendar days before the Discharge Permit expires and is in compliance with the approved Discharge Permit, then the existing Discharge Permit will not expire until OCD has approved or disapproved the renewal application. A discharge permit continued under this provision remains fully effective and enforceable. Operating with an expired Discharge Permit may subject the Permittee to civil and/or criminal penalties (See Section 74-6-10.1 NMSA 1978 and Section 74-6-10.2 NMSA 1978).

1.G. MODIFICATIONS: The Permittee shall notify the OCD Director and the Division's Environmental Bureau of any facility expansion, production increase, or process modification that would result in any significant modification in the discharge of water contaminants (See 20.6.2.3107C NMAC). OCD may require the Permittee to submit a permit modification pursuant to 20.6.2.3109E NMAC and may modify or terminate a permit pursuant to Section 74-6-5(M) through (N) NMSA 1978.

1.H. TRANSFER OF DISCHARGE PERMIT: Prior to any transfer of ownership, control, or possession (whether by lease, conveyance or otherwise) of the Facility, the transferor shall notify the transferee in writing of the existence of this Discharge Permit, and shall deliver or send by certified mail to OCD a copy of such written notification, together with a certification or other proof that such notification has been received by the transferee pursuant to 20.6.2.3111 NMAC. Upon receipt of such notification, the transferee shall inquire into all of the provisions and requirements contained in the Discharge Permit, and the transferee shall be charged with

notice of all such provisions and requirements as they appear of record in the Division's file or files concerning the Discharge Permit. Upon assuming either ownership or possession of the Facility the transferee shall have the same rights and responsibilities under the Discharge Permit as were applicable to the transferor (See 20.6.2.3111 NMAC).

Transfer of the ownership, control, or possession of the Facility does not relieve the transferor of responsibility or liability for any act or omission which occurred while the transferor owned, controlled, or was in possession of the Facility (See 20.6.2.3111E NMAC).

1.1. CLOSURE PLAN AND FINANCIAL ASSURANCE: The Permittee shall notify OCD in writing when any permitted discharge is discontinued for a period in excess of six months. Upon review of the Permittee's notice, OCD will determine whether to modify this permit, pursuant to 20.6.2.3107 NMAC and 20.6.2.3109E NMAC, to require the Permittee to submit a closure plan and/or post-closure plan, including financial assurance.

1.J. COMPLIANCE AND ENFORCEMENT: If the Permittee violates or is violating a condition of this Discharge Permit, OCD may issue a compliance order requiring compliance immediately or within a specified time period, suspending or terminating this Discharge Permit, and/or assessing a civil penalty (See Section 74-6-10 NMSA 1978). OCD may also commence a civil action in district court for appropriate relief, including injunctive relief (See Section 74-6-10(A)(2) NMSA 1978 and Section 74-6-11 NMSA 1978). The Permittee may be subject to criminal penalties for discharging a water contaminant without a discharge permit or in violation of a condition of a discharge permit; making any false material statement, representation, certification or omission of material fact in an application, record, report, plan or other document filed, submitted or required to be maintained under the Water Quality Act; falsifying, tampering with or rendering inaccurate any monitoring device, method or record required to be maintained under the Water Quality Act; falsifying, tampering with or rendering inaccurate any monitoring device, method or record required to be maintained under the Water Quality Act; falsifying, tampering with or rendering inaccurate any monitoring device, method or record required to be maintained under the Water Quality Act; falsifying, tampering with or rendering inaccurate any monitoring device, method or record required to be maintained under the Water Quality Act; or failing to monitor, sample or report as required by a permit issued pursuant to a state or federal law or regulation (See Section 74-6-10.2 NMSA 1978).

2. GENERAL FACILITY OPERATIONS:

2.A. CONTINGENCY PLAN: The Permittee shall implement its approved Contingency Plan to cope with failure of the Discharge Permit or system.

2.B. CLOSURE PLAN: After completing abatement of all ground water and vadose contamination required under Permit Condition 2.G, the Permittee shall perform the following closure measures:

 Remove or plug all lines leading to and from any extraction or recovery wells and any injection wells so that a discharge can no longer occur.

2. Remove all remediation system components from the site, if applicable.

 After receiving notification from OCD that post-closure monitoring may cease, the Permittee shall plug and abandon all monitor well(s).

2.C. RECORD KEEPING: The Permittee shall maintain records of all inspections required by this Discharge Permit at its Facility office for a minimum of five years and shall make those records available for inspection by OCD.

2.D. RELEASE REPORTING: The Permittee shall comply with the following permit conditions, pursuant to 20.6.2.1203 NMAC, and may report a release using an OCD form C-141, if it determines that a release of oil or other water contaminant, in such quantity as may with reasonable probability injure or be detrimental to human health, animal or plant life, or property, or unreasonably interfere with the public welfare or the use of property, has occurred. The Permittee shall report unauthorized releases of water contaminants in accordance with any additional commitments made in its approved Contingency Plan. If the Permittee determines that any constituent exceeds the standards specified at 20.6.2.3103 NMAC, then it shall report a release to OCD.

1. Oral Notification: As soon as possible after learning of such a discharge, but in no event more than twenty-four (24) hours thereafter, the Permittee shall notify OCD of a release. The Permittee shall provide the following:

- the name, address, and telephone number of the person or persons in charge of the facility, as well as of the Permittee of the facility;
- the name and location of the facility;
- the date, time, location, and duration of the discharge;
- the source and cause of discharge;
- a description of the discharge, including its chemical composition;
- the estimated volume of the discharge; and,
- any corrective or abatement actions taken to mitigate immediate environmental damage from the discharge.

2. Written Notification: Within one week after the Permittee has discovered a discharge, the Permittee shall send written notification (may use an OCD form C-141 with attachments) to OCD verifying the prior oral notification as to each of the foregoing items and providing any appropriate additions or corrections to the information contained in the prior oral notification.

2.E. OTHER REQUIREMENTS:

 Inspection and Entry: Pursuant to 20.6.2.4107A NMAC, the Permittee shall allow any authorized representative of the OCD Director, upon the presentation of proper credentials, to:

- enter the facility at reasonable times;
- inspect and copy records required by this discharge permit;
- inspect any treatment works, monitoring, and analytical equipment;
- sample any wastes, discharge, ground water, surface water, stream sediment, plants, animals, or vadose-zone material including vadose-zone vapor;
- use the Permittee's monitoring systems and wells in order to collect samples; and,

 gain access to off-site property not owned or controlled by the Permittee, but accessible to the Permittee through a third-party access agreement, provided that it is allowed by the agreement.

2. Advance Notice: Pursuant to 20.6.2.4107B NMAC, the Permittee shall provide OCD with at least four (4) working days advance notice of any environmental sampling to be performed pursuant to this Discharge Permit, or any well plugging, abandonment or destruction at the Facility site.

3. Plugging and Abandonment: Pursuant to 20.6.2.4107C NMAC, the Permittee shall propose to plug and abandon a monitor well by certified mail to OCD for approval, unless such approval is required from the State Engineer. The proposed action shall be designed to prevent water pollution that could result from water contaminants migrating through the well or borehole. The proposed action shall not take place without written approval from OCD, unless written approval or disapproval is not received by the Permittee within thirty (30) days of the date of receipt of the proposal.

2.F. ANNUAL DISCHARGE PERMIT REPORT: The Permittee shall submit its Annual Discharge Permit Report pursuant to 20.6.2.3107 NMAC to OCD by October 21th of each year. The Annual Discharge Permit Report shall include the following:

a summary of all major refinery activities or events;

a summary of the discharge activities, including the quality and volume of the discharge;

3. a summary of all leaks, spills, and releases and corrective actions taken; and,

4. a summary of the discovery of new ground water contamination.

2.G. ANNUAL GROUND WATER MONITORING REPORT: The Permittee shall submit its Annual Ground Water Monitoring Report pursuant to 20.6.2.3107 NMAC to OCD by October 21th of each year. The Annual Ground Water Monitoring Report shall include the following:

1. Description of ground water monitoring and remediation activities conducted throughout the reporting period, including sample collection procedures, decontamination procedures, sample handling procedures, and management of wastes;

2. Summary tables of semiannual ground water and activities; non-aqueous phase liquid (NAPL or Phase Separated Hydrocarbon - PSH) gauging data, with corrected water table elevation for all wells containing PSH;

 Summary table of ground water quality parameters recorded in the field (purge parameters);

Summary of laboratory analytical data with comparison to water quality standard;

 Any 20.6.2.3103 NMAC constituent found to exceed the water quality standard or background concentration shall be highlighted and noted in the Annual Discharge Permit Report;

- 6. Copies of the most recent year's laboratory analytical data sheets with QA/QC
- 7. Summary of QA/QC data review and validation;

8. Ground water contour maps for each aquifer system depicting the ground water gradient for each semiannual monitoring event, including site features and the direction and magnitude of the hydraulic gradient;

9. Isoconcentration maps for major constituents of concern for each semiannual monitoring event, including chloride, fluoride, sulfate, nitrate and TDS from the new monitor wells at the Permittee's farms and from existing monitor wells included in the FWGWMP.

 NAPL (PSH) thickness isopleth map for each semiannual monitoring event in all monitoring and recovery wells.

 Plots of static water elevation versus time in key wells, specifically those that contain NAPL (PSH);

 Tabulation of the monthly and cumulative volume of NAPL (PSH) removed from recovery wells or monitoring wells in accordance with the Ground Water and Product Recovery System Program throughout the reporting period; and,

 Recommendations, including any recommended changes to the groundwater monitoring program.

 The Permittee shall submit the Annual Ground Water Monitoring Report will be submitted in hardcopy and electronic format for review.

3. CLASS V WELLS: Pursuant to 20.6.2.5002B NMAC, leach fields and other wastewater disposal systems at Division-regulated facilities that inject non-hazardous fluid into or above an underground source of drinking water are Underground Injection Control (UIC) Class V injection wells. This Discharge Permit does not authorize the Permittee to use an UIC Class V injection well for the disposal of industrial waste at the Facility. Pursuant to 20.6.2.5005 NMAC, the Permittee shall close any UIC Class V industrial waste injection wells at its Facility that inject non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes (*e.g.*, septic systems, leach fields, dry wells, *etc.*) other than contaminated ground water within 90 calendar days of the issuance of this Discharge Permit. The Permittee shall document the closure of any UIC Class V wells used for the disposal of non-hazardous industrial wastes or a mixture of any UIC Class V wells used for the disposal of non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes other than contaminated ground water in its Annual Discharge Permit Report.

The Permittee must obtain a permit from the New Mexico Environment Department for other Class V wells, including wells used only for the injection of domestic wastes.

4. DISCHARGE OF REVERSE OSMOSIS REJECT FLUIDS AT PERMITTEE'S TWO FARMS:

4.A. Discharge Volume: The Permittee is authorized to discharge approximately 10,000 barrels per day of reverse osmosis reject fluids to the surface at the Permittee's two farms. Discharge to Eagle Draw is prohibited. This authorization expires on August 22, 2015, 36 months from the effective date of this permit.

4.B. Sampling and Analysis: The Permittee shall collect and analyze samples of the discharge as follows:

 The Permittee shall sample and analyze for all constituents listed in 20.6.2.3103A, B, and C NMAC at least semi-annually by collecting grab samples at the point of discharge.

 The Permittee shall sample and analyze using the methods specified in the Permittee's FWGWMP.

3. The Permittee shall retain all sampling and analytical QA/QC for four years.

4. The Permittee shall monitor and record the discharge flow on a daily basis.

 The Permittee shall report the analytical results for all discharge samples collected in a monitoring period.

 The Permittee shall ensure the sampling and flow measurements are representative of the volume and nature of the discharge.

 The Permittee submit all sample data, analytical results, and flow measurements in its annual report.

5. FACILITY WIDE GROUND WATER MONITORING PLAN (FWGWMP) AND GROUND WATER AND PRODUCT RECOVERY SYSTEM:

The Permittee shall monitor and abate water pollution as specified in this discharge permit, and in accordance with its approved Facility Wide Ground Water Monitoring Plan (FWGWMP) and in accordance with its approved Ground Water and Product Recovery System, as modified by OCD approval. However, if the OCD Director determines that the abatement will not meet WQCC ground or surface water standards, or that additional action is necessary to protect health, welfare, environment or property, then the OCD Director may require the Permittee to submit an Abatement Plan pursuant to Section 20.6.2.4104 and Subsection A of Section 20.6.2.4106 NMAC.

5.A. Facility Wide Ground Water Monitoring Plan (FWGWMP): The Permittee is implementing a FWGWMP which substantively meets the requirements for a Stage I Abatement Plan. The Permittee shall implement its approved Stage 1 Abatement Plan for monitoring and site investigation consistent with its approved FWGWMP, as modified annually and as required by OCD. Pursuant to 20.6.2.4106C NMAC, the purpose of a Stage 1 Abatement Plan is to design and conduct a site investigation that will adequately define site conditions, and provide the data necessary to select and design an effective abatement option.

5.B. Ground Water and Product Recovery System: The Permittee is implementing a Ground Water and Product Recovery System which substantively meets the requirements for a Stage 2 Abatement Plan. The Permittee shall implement its approved the Ground Water and Product Recovery System as modified annually and as required by OCD. Pursuant to 20.6.2.4106E NMAC, the purpose of the Stage 2 Abatement Plan is for the Permittee to select and design, if necessary, an abatement option that, when implemented, will result in attainment of the abatement standards and requirements specified in 20.6.2.4103 NMAC and Permit Condition 5.C, including post-closure maintenance activities.

5.C. Abatement Standards and Requirements: The Permittee shall abate the vadose zone so that water contaminants in the vadose zone shall not contaminate ground water or surface water through leaching, percolation or as the water table elevation fluctuates. The Permittee, where the Total Dissolved Solids concentration is 10,000 mg/L or less, shall abate contaminated

ground water so that toxic pollutant(s), as defined in 20.6.2.7(WW) NMAC, shall not be present and so that the standards of 20.6.2.3103 NMAC shall be met. If the background concentration of any water contaminant exceeds the standard or requirement of Subsections A, B and C of Section 20.6.2.4103 NMAC, then the ground water pollution shall be abated by the Permittee to the background concentration (See 20.6.2.4101B NMAC).

5.D. Completion and Termination: Pursuant to 20.6.2.4112 NMAC, abatement shall be considered complete when the standards and requirements specified in 20.6.2.4103 NMAC for both the vadose zone and ground water are met. At that time, the Permittee shall submit an Abatement Completion Report, documenting compliance with the standards and requirements specified in 20.6.2.4103 NMAC and this Discharge Permit, to OCD for approval. The Abatement Completion Report also shall propose any changes to long term monitoring and site maintenance activities, if needed, to be performed after termination of the Abatement Plan.

6. SCHEDULE OF COMPLIANCE:

6.A. SUBMISSION OF THE PERMIT FEES: As specified in Permit Condition 1.F, the Permittee shall submit the permit fee of \$8,400.00 within 30 days of its receipt of the Discharge Permit. Checks should be payable to the "New Mexico Water Quality Management Fund," not the Oil Conservation Division.

6.B. ANNUAL REPORT: As specified in Permit Conditions 2.F and 2.G, the Permittee shall submit its annual report to OCD by October 21th of each year.

6.C. REQUIREMENT TO CEASE ALL DISCHARGE OF "REVERSE OSMOSIS REJECT FLUIDS" TO THE SURFACE AT THE TWO "FARMS." The Permittee shall by 36 months after issuance of this permit cease all discharge(s) of reverse osmosis reject fluids (approximately 10,000 per day) and/or any other waste water effluent discharge(s) to the surface (*i.e.*, Permittee's farms).

6.D. SITE INVESTIGATION WORKPLANS FOR PERMITTEE'S TWO FARMS:

 Overview: Pursuant to 20.6.2.4105A(6) NMAC, a person who is abating water pollution pursuant to an approved ground water discharge permit is exempt from the requirements of Sections 20.6.2.4104 NMAC (Abatement Plan Required) and 20.6.2.4106 NMAC (Abatement Plan Proposal) to obtain and implement an Abatement Plan, unless the OCD Director determines pursuant to 20.6.2.4105B NMAC, that the abatement will not meet WQCC ground water or surface water standards, or that additional action is necessary to protect health, welfare, environment or property.

When a person is abating water pollution pursuant to an approved discharge permit, the discharge permit must be consistent with the requirements and provisions of Sections 20.6.2.4101 (Purpose), 20.6.2.4103 (Abatement Standards And Requirements), 20.6.2.4106C NMAC (Stage 1 Abatement Plan), 20.6.2.4106E NMAC (Purpose Of Stage 2 Of The Abatement Plan), 20.6.2.4107 (Other Requirements), and 20.6.2.4112 NMAC (Completion And Termination).

The Permittee began discharging reverse osmosis reject water at its two farms in accordance with a permit modification approved on April 17, 1993. The discharge contained constituents present at concentrations that exceeded the standards of 20.6.2.3103 NMAC, including chloride, fluoride, nitrate/nitrite and sulfate. Therefore, the Permittee shall investigate the ground water beneath its two farms to determine what impact to ground water quality has occurred as a result of the discharge of reverse osmosis fluid.

2. Site Investigation Workplan: The Permittee shall submit a Site Investigation Workplan for the two farms that complies with the requirements of 20.6.2.4105A(6) NMAC within 90 days of the issuance of the discharge permit. The objective of the site investigation workplan is to define (see 20.6.2.4105C(2) NMAC) the site geology and hydrogeology, the vertical and horizontal extent and magnitude of vadose zone and ground water contamination, the rate and direction of contaminant migration. The Permittee shall propose the location and depth of at least three soil borings which it will convert to monitor wells for each of the two farms at which the discharge occurred. The Permittee shall generally follow the protocols specified in its Facility Wide Ground Water Monitoring Plan, except as follows:

a. The Permittee shall include a proposed schedule for the installation and sampling of the new soil borings/monitor wells.

b. The new monitor wells shall be constructed of 2 inch Schedule 40 PVC with 10 feet of screen below the top of ground water and 5 feet of screen above.

c. The Permittee shall sample the new monitor wells at least quarterly and shall submit interim quarterly monitoring reports.

3. Final Site Investigation Report: The Permittee shall specify in its Site Investigation Workplan that it shall submit a Final Site Investigation Report to OCD for approval. The Final Site Investigation Report is due 90 days from the date that the Permittee completes the fourth quarterly sampling event. The quarterly interim reports are due 30 days after the Permittee receives the analytical data. The Final Site Investigation Report and quarterly interim reports shall generally follow the same format that the Permittee uses for its FWGWMP.

After reviewing and approving of the Final Site Investigation Report, the OCD Director shall determine whether to require the Permittee to continue monitoring or to require the Permittee to submit a Stage 2 Abatement Plan pursuant to 20.6.2.4106E NMAC. The results of the Final Site Investigation Report shall determine whether the ground water quality at the two farms has been impacted by the discharge of reverse osmosis reject water by comparison to the background water quality and to the standards of 20.6.2.3103 NMAC.

October 8, 2012

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Drive Santa Fe, New Mexico 87505

FEDEX

Re: OCD RESPONSE TO COMMENTS ON DRAFT DISCHARGE PERMIT AND APPROVAL OF FINAL DISCHARGE PERMIT FOR THE NAVAJO ARTESIA REFINERY (GW-028) SE/4 OF SECTION 1, E/2 OF SECTION 8, W/2 OF SECTION 9, N/2 OF SECTION 12, TOWNSHIP 17 SOUTH, RANGE 26 EAST, NMPM, EDDY COUNTY, NEW MEXICO

THE HOLLYFRONTIER COMPANIES

Dear Carl,

As we have discussed, Conditions 2.F, 2.G and 6.B of Discharge Permit GW-028, dated August 22, 2012, require Navajo to submit its Annual Report (including the Annual Discharge Permit Report and Annual Groundwater Monitoring Report) by October 21st of each year. Navajo's current semiannual sampling schedule has been established to be pre- and post-irrigation season; the fall sampling event is in progress now, which would prevent meeting the October deadline after receipt of analytical reports, evaluation and report preparation. Navajo believes that the deadline for the Annual Report no sooner than necessary for Navajo to receive the post-irrigation season sampling results and should allow sufficient time to perform necessary evaluations and prepare the report.

Consistent with that approach, Navajo requests that the required submittal date be revised to March 15th of each year. This date would better align with our February 28th due date for submittal to our Groundwater Monitoring Report as required by our RCRA permit, and allow sufficient time to evaluate the sampling results and prepare the report.

Navajo appreciates your cooperation in this matter and looks forward to your response.

Sincerely,

- i Hal

Mike Holder Environmental Manager

W/out enclosures: Electronic cc:

RAC, MLS, AMS

Env. File:

Annual Discharge Permit Rpt (ART.REF.12-4A01C) 2012-09-24 Discharge Permit Modification Request Letter

> Navajo Refining Company, LLC PO Box 159 • Artesia, NM 88211-0159 • (575) 748-3311 http://www.hollyfrontier.com

ACKNOWLEDGEMENT OF RECEIPT OF CHECK/CASH

Thereby acknowledge receipt of check No. 1000189745 dated 9/5/12
or cash received on in the amount of \$
from MAUAJO ReF. Ming Co
ior <u>GW-28</u>
Submitted by: / AWIENCE REMERO Date: 9/12/12
Submitted to ASD by: Journ Por Date: 9/12/12
Received in ASD by: Date:
Filing Fee New Facility Renewal
Modification Other Discharge Permit
Organization Code521.07 Applicable FY
To be deposited in the Water Quality Management Fund.
Full Payment or Annual Increment



RECEIVED OCD

September 06, 2012

Jami Bailey, Director Water Quality Management Fund c/o: Oil Conservation Division 1220 N. St. Francis Drive Santa Fe, NM 87505

CERITIFIED MAIL/RETURN RECEIPT

7011 3500 0001 4786 3316

RE: DISCHARGE PERMIT RENEWAL APPLICATION FEE SE/4 OF SECTION 1, E/2 OF SECTION 8, W/2 OF SECTION 9, N/2 OF SECTION 12, TOWNSHIP 17 SOUTH, RANGE 26 EAST, NMPM, EDDY COUNT, NEW MEXICO NAVAJO REFINING COMPANY, LLC EPA ID # NMDO48918817

Dear Jami Bailey:

Navajo is providing this letter in response to your letter of August 22, 2012 for approval of final Discharge Permit for Navajo Artesia Refinery. The permit fee for discharging at the refinery is \$8400.00, which is enclosed payable to: Water Quality Management Fund. If you have any questions regarding this fee please email me at Michael.holder@hollyfrontier.com or call me at 575-746-5487

Sincerely,

- - Wolh

Michael Holder, Environmental Manager, Navajo Refinery

Elec cc Navajo: MGM, REB, MDF, MWH, RAC, MLS, AMS

Environmental File: ART: REF: 4.A.01.A Discharge Permit Fee 2012-09-06 Final Discharge Permit Subm Ltr & Fee

State of New Mexico Energy, Minerals and Natural Resources Department

Susana Martinez Governor

John Bemis Cabinet Secretary

and the second second

Brett F. Woods, Ph.D. Deputy Cabinet Secretary Jami Bailey Division Director Oil Conservation Division



AUGUST 22, 2012

and the second second

CERTIFIED MAIL RETURN RECEIPT NO: 3341 0352

Mr. Johnny Lackey Environmental Manager Navajo Refining Company, LLC. P.O. Box 159 Artesia, NM 88211-0159

RE: OCD RESPONSE TO COMMENTS ON DRAFT DISCHARGE PERMIT AND APPROVAL OF FINAL DISCHARGE PERMIT FOR THE NAVAJO ARTESIA REFINERY (GW-028) SE/4 OF SECTION 1, E/2 OF SECTION 8, W/2 OF SECTION 9, N/2 OF SECTION 12, TOWNSHIP 17 SOUTH, RANGE 26 EAST, NMPM, EDDY COUNTY, NEW MEXICO

Dear Mr. Lackey:

The Oil Conservation Division (OCD) has reviewed Navajo's comments of July 12, 2012 on its draft discharge permit. OCD's *Response to Comments* is given in Attachment 1. OCD reviewed Navajo's comments and consequently made certain changes to Navajo's final discharge permit.

The discharge permit renewal (GW-028) for the Navajo Refining Company, LLC. Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico, is hereby approved under the terms and conditions specified in the enclosed Discharge Permit.

Navajo's original discharge permit was issued on October 21, 1991 and has been subsequently renewed. Navajo's discharge permit renewal application was submitted pursuant to 20.6.2.3106 NMAC. OCD approves this discharge permit renewal pursuant to 20.6.2.3109A NMAC. Please note 20.6.2.3109G NMAC, which provides for possible future amendment of the permit. Please be advised that approval of this discharge permit does not relieve Navajo of liability of operations result in pollution of surface water, ground water, or the environment.

Please note that 20.6.2.3104 NMAC specifies "When a permit has been issued, discharges must be consistent with the terms and conditions of the permit." Pursuant to 20.6.2.3107C NMAC, Navajo is required to notify the Director of any facility expansion, production increase, or

August 22, 2012 Page 2

process modification that would result in any change in the water quality or volume of the discharge.

This discharge permit will expire on October 21, 2016, and Navajo should submit a discharge permit renewal application in ample time before this date. Note that under 20.6.2.3106F NMAC, if a discharger submits a discharge permit renewal application at least 120 days before the discharge permit expires and is in compliance with the approved discharge permit, then the existing discharge permit will not expire until the application for renewal has been approved or disapproved.

The discharge permit renewal application for the Navajo Artesia Refinery is subject to 20.6.2.3114 NMAC. Every billable facility submitting a discharge permit renewal application is assessed a non-refundable filing fee of \$100.00. OCD has already received this filing fee. The permit fee for discharging at a refinery is \$8,400.00. The Permittee shall submit this amount along with the signed Discharge Permit. Checks must be payable to the "New Mexico Water Quality Management Fund," and <u>not</u> the Oil Conservation Division.

Please make all checks payable to:

WATER QUALITY MANAGEMENT FUND C/O: OIL CONSERVATION DIVISION 1220 NORTH ST. FRANCIS DRIVE SANTA FE, NEW MEXICO 87505

If you have any questions regarding this matter, please contact Glenn von Gonten at 505-476-3488. On behalf of the staff of OCD, I wish to thank you and your staff for your cooperation during this discharge permit renewal process.

Thank you for your cooperation.

Jami Bailey Director

JB/gvg

Chavez, Carl J, EMNRD

From: Sent: To: Cc: Subject: Attachments: Schultz, Michele <Michele.Schultz@hollyfrontier.com> Tuesday, September 11, 2012 7:35 AM Chavez, Carl J, EMNRD Holder, Mike; Combs, Robert; Strange, Aaron C-141 for fuel oil spill 9/10 c141.pdf

Carl – The attached C-141 form is notification for a fuel oil spill that occurred yesterday afternoon at the rail loading rack. Approximately 15 bbls were spilled, and 10 bbls were recovered. If you have questions regarding this event, please contact me by phone or email.

J

Micki Schultz, P.E., CHMM Environmental Specialist, Water and Waste Programs Navajo Refining Company 575-746-5281 (office) 575-308-2141 (cell) <u>micki.schultz@hollyfrontier.com</u>

CONFIDENTIALITY NOTICE: This e-mail, and any attachments, may contain information that is privileged, proprietary and/or confidential. If you

received this message in error, please advise the sender immediately by reply e-mail and do not retain any paper or electronic copies of this message or any

attachments. Unless expressly stated, nothing contained in this message should be construed as a digital or electronic signature or a commitment to a binding agreement.

State of New Mexico **Energy Minerals and Natural Resources**

Form C-141 Revised August 8, 2011

Oil Conservation Division 1220 South St. Francis Dr. Santa Fe, NM 87505

Submit 1 Copy to appropriate District Office in accordance with 19.15.29 NMAC.

Release Notification and Corrective Action

	OPERATOR	ХП	Initial Report	Final Report
Name of Company Navajo Refining Co. LLC	Contact Micki Schultz			
Address 501 E. Main St. Artesia, NM 88210	Telephone No. 575-746-5281	<u> </u>		
Facility Name Navajo Refinery	Facility Type Petroleum Refin	iery		

Surface Owner	Mineral Owner	API No.
		····

LOCATION 0	F RELEASE
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Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County

Latitude

Longitude_

NATURE OF RELEASE

Type of Release Fuel Oil Spill	Volume of Release ~15 bbls	Volume Recovered	~10 bbls				
Source of Release Rail Loading Pipeline Rack	Date and Hour of Occurrence Date and Hour of Discovery 9/10						
	9/10/12 @ ~ 1:00 pm	~ 1:00 pm					
Was Immediate Notice Given?	If YES, To Whom?						
Yes No X Not required							
By Whom?	Date and Hour						
Was a Watercourse Reached?	If YES, Volume Impacting the Wa	tercourse.					
Yes X No							
If a Watercourse was Impacted, Describe Fully.*		······································					
Describe Cause of Problem and Remedial Action Taken.*							
A pipeline valve was left open. The valve was shut upon discovery.							
Describe Area Affected and Cleanup Action Taken.*							
Railcar loading rack between two sections of track. Spill extended out approximately 4 ft. on either side from the pipe rack in a gravel strip approximately							
30 ft. long. Spilled fuel oil stayed in the low area under the pipe rack and ~10 bbl was recovered by vacuum truck.							
Therefore contify that the information gives there is the and some late to	1. 1	- d that mummant to NI	MOCD miles and				
I hereby certify that the information given above is true and complete to regulations all operators are required to report and/or file certain release a							
public health or the environment. The acceptance of a C-141 report by the							
should their operations have failed to adequately investigate and remedia							
or the environment. In addition, NMOCD acceptance of a C-141 report does not relieve the operator of responsibility for compliance with any other							
federal, state, or local laws and/or regulations.		<u> </u>					
	OIL CONSERVATION DIVISION						
Signature: Micki Schultz	······································						
Printed Name: Micki Schultz	Approved by Environmental Specialist:						
Title: Environmental Specialist	American Detail						
Title: Environmental Specialist	Approval Date: Expiration Date:						
E-mail Address: micki.schultz@hollyfrontier.com	Conditions of Approval:						
		Attach	ea 📋				
Date: 9/10/2012 Phone: 757-746-5281							

* Attach Additional Sheets If Necessary

Susana Martinez Governor

John Bemis Cabinet Secretary

Brett F. Woods, Ph.D. Deputy Cabinet Secretary Jami Bailey Division Director Oil Conservation Division



AUGUST 22, 2012

CERTIFIED MAIL RETURN RECEIPT NO: 3341 0352

Mr. Johnny Lackey Environmental Manager Navajo Refining Company, LLC. P.O. Box 159 Artesia, NM 88211-0159

RE: OCD RESPONSE TO COMMENTS ON DRAFT DISCHARGE PERMIT AND APPROVAL OF FINAL DISCHARGE PERMIT FOR THE NAVAJO ARTESIA REFINERY (GW-028) SE/4 OF SECTION 1, E/2 OF SECTION 8, W/2 OF SECTION 9, N/2 OF SECTION 12, TOWNSHIP 17 SOUTH, RANGE 26 EAST, NMPM, EDDY COUNTY, NEW MEXICO

Dear Mr. Lackey:

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Please note that 20.6.2.3104 NMAC specifies "When a permit has been issued, discharges must be consistent with the terms and conditions of the permit." Pursuant to 20.6.2.3107C NMAC, Navajo is required to notify the Director of any facility expansion, production increase, or

5

August 22, 2012 Page 2

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This discharge permit will expire on October 21, 2016, and Navajo should submit a discharge permit renewal application in ample time before this date. Note that under 20.6.2.3106F NMAC, if a discharger submits a discharge permit renewal application at least 120 days before the discharge permit expires and is in compliance with the approved discharge permit, then the existing discharge permit will not expire until the application for renewal has been approved or disapproved.

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Please make all checks payable to:

WATER QUALITY MANAGEMENT FUND C/O: OIL CONSERVATION DIVISION 1220 NORTH ST. FRANCIS DRIVE SANTA FE, NEW MEXICO 87505

If you have any questions regarding this matter, please contact Glenn von Gonten at 505-476-3488. On behalf of the staff of OCD, I wish to thank you and your staff for your cooperation during this discharge permit renewal process.

Thank you for your cooperation.

Jami Bailey Director

JB/gvg

DISCHARGE PERMIT GW-028

1. **GENERAL PROVISIONS:**

1.A. PERMITTEE AND PERMITTED FACILITY: The Director of the Oil Conservation Division (OCD) of the Energy, Minerals and Natural Resources Department issues Discharge Permit GW-028 (Discharge Permit) to Navajo Refining Company (Permittee) located at 501 E. Main, Artesia, New Mexico 88210, to operate the Artesia Refinery (Facility) located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County. The refinery is located northeast of the intersection of Highway 285 and Highway 82, in Artesia, New Mexico.

The Permittee refines crude oil and processes natural gas at its Facility. The Facility refines and processes up to 50,000 barrels per day of crude oil and other feed stocks. The Permittee's Facility discharges approximately 10,000 barrels per day of reverse osmosis reject fluids to the surface at the Facility's two farms. The Permittee is abating ground water and vadose zone contamination at the Facility. Ground water that may be affected by a spill, leak, or accidental discharge occurs at a depth of approximately 25 feet below ground surface with a total dissolved solids concentration of approximately 2,500 mg/L.

1.B. SCOPE OF PERMIT: OCD has been granted authority to administer the Water Quality Act (Chapter 74, Article 6 NMSA 1978) as it applies to refineries by statute and by delegation from the Water Quality Control Commission pursuant to Section 74-6-4(E) NMSA 1978.

The Water Quality Act and the rules issued under that Act protect ground water and surface water of the State of New Mexico by providing that, unless otherwise allowed by rule, no person shall cause or allow effluent or leachate to discharge so that it may move directly or indirectly into ground water unless such discharge is pursuant to an approved discharge permit (See WQCC Regulations: 20.6.2.3104 NMAC and 20.6.2.3106 NMAC).

This Discharge Permit authorizes the Permittee to discharge approximately 10,000 barrels per day of reverse osmosis reject fluids at the Permittee's two farms. This Discharge Permit does not authorize any treatment of, or on-site disposal of, any materials, product, by-product, or oil field waste including, but not limited to, the on-site disposal of lube oil, glycol, antifreeze, filters, elemental sulfur, washdown water, contaminated soil, and cooling tower blowdown water.

This Discharge Permit does not convey any property rights of any sort nor any exclusive privilege, and does not authorize any injury to persons or property, any invasion of other private rights, or any infringement of state, federal, or local laws, rules or regulations.

The Permittee shall operate in accordance with the Discharge Permit conditions to comply with the Water Quality Act and the rules issued pursuant to that Act, so that neither a hazard to public health nor undue risk to property will result (See 20.6.2.3109C NMAC); so that no discharge will cause or may cause any stream standard to be violated (See 20.6.2.3109H(2) NMAC); so that no

discharge of any water contaminant will result in a hazard to public health (See 20.6.2.3109H(3) NMAC); and, so that the numerical standards specified of 20.6.2.3103 NMAC are not exceeded.

1.C. DISCHARGE PERMIT RENEWAL: This Discharge Permit is a permit renewal that replaces the permit being renewed. Replacement of a prior permit does not relieve the Permittee of its responsibility to comply with the terms of that prior permit while that permit was in effect.

1.D. DEFINITIONS: Terms not specifically defined in this Discharge Permit shall have the same meanings as those in the Water Quality Act or the rules adopted pursuant to the Act, as the context requires.

1.E. FILING FEES AND PERMIT FEES: Pursuant to 20.6.2.3114 NMAC, every facility that submits a discharge permit application for initial approval or renewal shall pay the permit fees specified in Table 1 and the filing fee specified in Table 2 of 20.6.2.3114 NMAC. OCD has already received the required \$100.00 filing fee for this application. The permit fee for discharging at a refinery is \$8,400.00. The Permittee shall submit this amount along with the signed Discharge Permit. Checks must be payable to the "New Mexico Water Quality Management Fund," and <u>not</u> the Oil Conservation Division.

1.F. EFFECTIVE DATE, EXPIRATION, RENEWAL CONDITIONS, AND PENALTIES FOR OPERATING WITHOUT A DISCHARGE PERMIT: This Discharge Permit is effective 30 days from the date that the Permittee receives this discharge permit or until or until the permit is terminated. This Discharge Permit will expire on October 21, 2016. The Permittee shall submit an application for renewal no later than 120 days before that expiration date, pursuant to 20.6.2.3106F NMAC. If a Permittee submits a renewal application at least calendar days before the Discharge Permit expires and is in compliance with the approved Discharge Permit, then the existing Discharge Permit will not expire until OCD has approved or disapproved the renewal application. A discharge permit continued under this provision remains fully effective and enforceable. Operating with an expired Discharge Permit may subject the Permittee to civil and/or criminal penalties (See Section 74-6-10.1 NMSA 1978 and Section 74-6-10.2 NMSA 1978).

1.G. MODIFICATIONS: The Permittee shall notify the OCD Director and the Division's Environmental Bureau of any facility expansion, production increase, or process modification that would result in any significant modification in the discharge of water contaminants (See 20.6.2.3107C NMAC). OCD may require the Permittee to submit a permit modification pursuant to 20.6.2.3109E NMAC and may modify or terminate a permit pursuant to Section 74-6-5(M) through (N) NMSA 1978.

1.H. TRANSFER OF DISCHARGE PERMIT: Prior to any transfer of ownership, control, or possession (whether by lease, conveyance or otherwise) of the Facility, the transferor shall notify the transferee in writing of the existence of this Discharge Permit, and shall deliver or send by certified mail to OCD a copy of such written notification, together with a certification or other proof that such notification has been received by the transferee pursuant to 20.6.2.3111 NMAC. Upon receipt of such notification, the transferee shall inquire into all of the provisions and requirements contained in the Discharge Permit, and the transferee shall be charged with

notice of all such provisions and requirements as they appear of record in the Division's file or files concerning the Discharge Permit. Upon assuming either ownership or possession of the Facility the transferee shall have the same rights and responsibilities under the Discharge Permit as were applicable to the transferor (See 20.6.2.3111 NMAC).

Transfer of the ownership, control, or possession of the Facility does not relieve the transferor of responsibility or liability for any act or omission which occurred while the transferor owned, controlled, or was in possession of the Facility (See 20.6.2.3111E NMAC).

1.I. CLOSURE PLAN AND FINANCIAL ASSURANCE: The Permittee shall notify OCD in writing when any permitted discharge is discontinued for a period in excess of six months. Upon review of the Permittee's notice, OCD will determine whether to modify this permit, pursuant to 20.6.2.3107 NMAC and 20.6.2.3109E NMAC, to require the Permittee to submit a closure plan and/or post-closure plan, including financial assurance.

1.J. COMPLIANCE AND ENFORCEMENT: If the Permittee violates or is violating a condition of this Discharge Permit, OCD may issue a compliance order requiring compliance immediately or within a specified time period, suspending or terminating this Discharge Permit, and/or assessing a civil penalty (See Section 74-6-10 NMSA 1978). OCD may also commence a civil action in district court for appropriate relief, including injunctive relief (See Section 74-6-10(A)(2) NMSA 1978 and Section 74-6-11 NMSA 1978). The Permittee may be subject to criminal penalties for discharging a water contaminant without a discharge permit or in violation of a condition of a discharge permit; making any false material statement, representation, certification or omission of material fact in an application, record, report, plan or other document filed, submitted or required to be maintained under the Water Quality Act; falsifying, tampering with or rendering inaccurate any monitoring device, method or record required to be maintained under the Water Quality Act; or failing to monitor, sample or report as required by a permit issued pursuant to a state or federal law or regulation (See Section 74-6-10.2 NMSA 1978).

2. GENERAL FACILITY OPERATIONS:

2.A. CONTINGENCY PLAN: The Permittee shall implement its approved Contingency Plan to cope with failure of the Discharge Permit or system.

2.B. CLOSURE PLAN: After completing abatement of all ground water and vadose contamination required under Permit Condition 2.G, the Permittee shall perform the following closure measures:

1. Remove or plug all lines leading to and from any extraction or recovery wells and any injection wells so that a discharge can no longer occur.

2. Remove all remediation system components from the site, if applicable.

3. After receiving notification from OCD that post-closure monitoring may cease, the Permittee shall plug and abandon all monitor well(s).

2.C. RECORD KEEPING: The Permittee shall maintain records of all inspections required by this Discharge Permit at its Facility office for a minimum of five years and shall make those records available for inspection by OCD.

2.D. RELEASE REPORTING: The Permittee shall comply with the following permit conditions, pursuant to 20.6.2.1203 NMAC, and may report a release using an OCD form C-141, if it determines that a release of oil or other water contaminant, in such quantity as may with reasonable probability injure or be detrimental to human health, animal or plant life, or property, or unreasonably interfere with the public welfare or the use of property, has occurred. The Permittee shall report unauthorized releases of water contaminants in accordance with any additional commitments made in its approved Contingency Plan. If the Permittee determines that any constituent exceeds the standards specified at 20.6.2.3103 NMAC, then it shall report a release to OCD.

1. Oral Notification: As soon as possible after learning of such a discharge, but in no event more than twenty-four (24) hours thereafter, the Permittee shall notify OCD of a release. The Permittee shall provide the following:

- the name, address, and telephone number of the person or persons in charge of the facility, as well as of the Permittee of the facility;
- the name and location of the facility;
- the date, time, location, and duration of the discharge;
- the source and cause of discharge;
- a description of the discharge, including its chemical composition;
- the estimated volume of the discharge; and,
- any corrective or abatement actions taken to mitigate immediate environmental damage from the discharge.

2. Written Notification: Within one week after the Permittee has discovered a discharge, the Permittee shall send written notification (may use an OCD form C-141 with attachments) to OCD verifying the prior oral notification as to each of the foregoing items and providing any appropriate additions or corrections to the information contained in the prior oral notification.

2.E. OTHER REQUIREMENTS:

1. Inspection and Entry: Pursuant to 20.6.2.4107A NMAC, the Permittee shall allow any authorized representative of the OCD Director, upon the presentation of proper credentials, to:

- enter the facility at reasonable times;
- inspect and copy records required by this discharge permit;
- inspect any treatment works, monitoring, and analytical equipment;
- sample any wastes, discharge, ground water, surface water, stream sediment, plants, animals, or vadose-zone material including vadose-zone vapor;
- use the Permittee's monitoring systems and wells in order to collect samples; and,

• gain access to off-site property not owned or controlled by the Permittee, but accessible to the Permittee through a third-party access agreement, provided that it is allowed by the agreement.

2. Advance Notice: Pursuant to 20.6.2.4107B NMAC, the Permittee shall provide OCD with at least four (4) working days advance notice of any environmental sampling to be performed pursuant to this Discharge Permit, or any well plugging, abandonment or destruction at the Facility site.

3. Plugging and Abandonment: Pursuant to 20.6.2.4107C NMAC, the Permittee shall propose to plug and abandon a monitor well by certified mail to OCD for approval, unless such approval is required from the State Engineer. The proposed action shall be designed to prevent water pollution that could result from water contaminants migrating through the well or borehole. The proposed action shall not take place without written approval from OCD, unless written approval or disapproval is not received by the Permittee within thirty (30) days of the date of receipt of the proposal.

2.F. ANNUAL DISCHARGE PERMIT REPORT: The Permittee shall submit its Annual Discharge Permit Report pursuant to 20.6.2.3107 NMAC to OCD by October 21th of each year. The Annual Discharge Permit Report shall include the following:

1. a summary of all major refinery activities or events;

2. a summary of the discharge activities, including the quality and volume of the discharge;

3. a summary of all leaks, spills, and releases and corrective actions taken; and,

4. a summary of the discovery of new ground water contamination.

2.G. ANNUAL GROUND WATER MONITORING REPORT: The Permittee shall submit its Annual Ground Water Monitoring Report pursuant to 20.6.2.3107 NMAC to OCD by October 21th of each year. The Annual Ground Water Monitoring Report shall include the following:

1. Description of ground water monitoring and remediation activities conducted throughout the reporting period, including sample collection procedures, decontamination procedures, sample handling procedures, and management of wastes;

2. Summary tables of semiannual ground water and activities; non-aqueous phase liquid (NAPL or Phase Separated Hydrocarbon - PSH) gauging data, with corrected water table elevation for all wells containing PSH;

3. Summary table of ground water quality parameters recorded in the field (purge parameters);

4. Summary of laboratory analytical data with comparison to water quality standard;

5. Any 20.6.2.3103 NMAC constituent found to exceed the water quality standard or background concentration shall be highlighted and noted in the Annual Discharge Permit Report;

6. Copies of the most recent year's laboratory analytical data sheets with QA/QC

7. Summary of QA/QC data review and validation;

8. Ground water contour maps for each aquifer system depicting the ground water gradient for each semiannual monitoring event, including site features and the direction and magnitude of the hydraulic gradient;

9. Isoconcentration maps for major constituents of concern for each semiannual monitoring event, including chloride, fluoride, sulfate, nitrate and TDS from the new monitor wells at the Permittee's farms and from existing monitor wells included in the FWGWMP.

10. NAPL (PSH) thickness isopleth map for each semiannual monitoring event in all monitoring and recovery wells.

11. Plots of static water elevation versus time in key wells, specifically those that contain NAPL (PSH);

12. Tabulation of the monthly and cumulative volume of NAPL (PSH) removed from recovery wells or monitoring wells in accordance with the Ground Water and Product Recovery System Program throughout the reporting period; and,

13. Recommendations, including any recommended changes to the groundwater monitoring program.

14. The Permittee shall submit the Annual Ground Water Monitoring Report will be submitted in hardcopy and electronic format for review.

3. CLASS V WELLS: Pursuant to 20.6.2.5002B NMAC, leach fields and other wastewater disposal systems at Division-regulated facilities that inject non-hazardous fluid into or above an underground source of drinking water are Underground Injection Control (UIC) Class V injection wells. This Discharge Permit does not authorize the Permittee to use an UIC Class V injection well for the disposal of industrial waste at the Facility. Pursuant to 20.6.2.5005 NMAC, the Permittee shall close any UIC Class V industrial waste injection wells at its Facility that inject non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes (*e.g.*, septic systems, leach fields, dry wells, *etc.*) other than contaminated ground water within 90 calendar days of the issuance of this Discharge Permit. The Permittee shall document the closure of any UIC Class V wells used for the disposal of non-hazardous industrial wastes or a mixture of industrial wastes or a mixture of industrial wastes or a mixture of any UIC Class V wells used for the disposal of non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes other than contaminated ground water in its Annual Discharge Permit Report.

The Permittee must obtain a permit from the New Mexico Environment Department for other Class V wells, including wells used only for the injection of domestic wastes.

4. DISCHARGE OF REVERSE OSMOSIS REJECT FLUIDS AT PERMITTEE'S TWO FARMS:

4.A. Discharge Volume: The Permittee is authorized to discharge approximately 10,000 barrels per day of reverse osmosis reject fluids to the surface at the Permittee's two farms. Discharge to Eagle Draw is prohibited. This authorization expires on August 22, 2015, 36 months from the effective date of this permit.

4.B. Sampling and Analysis: The Permittee shall collect and analyze samples of the discharge as follows:

1. The Permittee shall sample and analyze for all constituents listed in 20.6.2.3103A, B, and C NMAC at least semi-annually by collecting grab samples at the point of discharge.

2. The Permittee shall sample and analyze using the methods specified in the Permittee's FWGWMP.

3. The Permittee shall retain all sampling and analytical QA/QC for four years.

4. The Permittee shall monitor and record the discharge flow on a daily basis.

5. The Permittee shall report the analytical results for all discharge samples collected in a monitoring period.

6. The Permittee shall ensure the sampling and flow measurements are representative of the volume and nature of the discharge.

7. The Permittee submit all sample data, analytical results, and flow measurements in its annual report.

5. FACILITY WIDE GROUND WATER MONITORING PLAN (FWGWMP) AND GROUND WATER AND PRODUCT RECOVERY SYSTEM:

The Permittee shall monitor and abate water pollution as specified in this discharge permit, and in accordance with its approved Facility Wide Ground Water Monitoring Plan (FWGWMP) and in accordance with its approved Ground Water and Product Recovery System, as modified by OCD approval. However, if the OCD Director determines that the abatement will not meet WQCC ground or surface water standards, or that additional action is necessary to protect health, welfare, environment or property, then the OCD Director may require the Permittee to submit an Abatement Plan pursuant to Section 20.6.2.4104 and Subsection A of Section 20.6.2.4106 NMAC.

5.A. Facility Wide Ground Water Monitoring Plan (FWGWMP): The Permittee is implementing a FWGWMP which substantively meets the requirements for a Stage 1 Abatement Plan. The Permittee shall implement its approved Stage 1 Abatement Plan for monitoring and site investigation consistent with its approved FWGWMP, as modified annually and as required by OCD. Pursuant to 20.6.2.4106C NMAC, the purpose of a Stage 1 Abatement Plan is to design and conduct a site investigation that will adequately define site conditions, and provide the data necessary to select and design an effective abatement option.

5.B. Ground Water and Product Recovery System: The Permittee is implementing a Ground Water and Product Recovery System which substantively meets the requirements for a Stage 2 Abatement Plan. The Permittee shall implement its approved the Ground Water and Product Recovery System as modified annually and as required by OCD. Pursuant to 20.6.2.4106E NMAC, the purpose of the Stage 2 Abatement Plan is for the Permittee to select and design, if necessary, an abatement option that, when implemented, will result in attainment of the abatement standards and requirements specified in 20.6.2.4103 NMAC and Permit Condition 5.C, including post-closure maintenance activities.

5.C. Abatement Standards and Requirements: The Permittee shall abate the vadose zone so that water contaminants in the vadose zone shall not contaminate ground water or surface water through leaching, percolation or as the water table elevation fluctuates. The Permittee, where the Total Dissolved Solids concentration is 10,000 mg/L or less, shall abate contaminated

ground water so that toxic pollutant(s), as defined in 20.6.2.7(WW) NMAC, shall not be present and so that the standards of 20.6.2.3103 NMAC shall be met. If the background concentration of any water contaminant exceeds the standard or requirement of Subsections A, B and C of Section 20.6.2.4103 NMAC, then the ground water pollution shall be abated by the Permittee to the background concentration (See 20.6.2.4101B NMAC).

5.D. Completion and Termination: Pursuant to 20.6.2.4112 NMAC, abatement shall be considered complete when the standards and requirements specified in 20.6.2.4103 NMAC for both the vadose zone and ground water are met. At that time, the Permittee shall submit an Abatement Completion Report, documenting compliance with the standards and requirements specified in 20.6.2.4103 NMAC and this Discharge Permit, to OCD for approval. The Abatement Completion Report also shall propose any changes to long term monitoring and site maintenance activities, if needed, to be performed after termination of the Abatement Plan.

6. SCHEDULE OF COMPLIANCE:

6.A. SUBMISSION OF THE PERMIT FEES: As specified in Permit Condition 1.F, the Permittee shall submit the permit fee of \$8,400.00 within 30 days of its receipt of the Discharge Permit. Checks should be payable to the "New Mexico Water Quality Management Fund," <u>not</u> the Oil Conservation Division.

6.B. ANNUAL REPORT: As specified in Permit Conditions 2.F and 2.G, the Permittee shall submit its annual report to OCD by October 21^{th} of each year.

6.C. REQUIREMENT TO CEASE ALL DISCHARGE OF "REVERSE OSMOSIS REJECT FLUIDS" TO THE SURFACE AT THE TWO "FARMS." The Permittee shall by 36 months after issuance of this permit cease all discharge(s) of reverse osmosis reject fluids (approximately 10,000 per day) and/or any other waste water effluent discharge(s) to the surface (*i.e.*, Permittee's farms).

6.D. SITE INVESTIGATION WORKPLANS FOR PERMITTEE'S TWO FARMS:

1. Overview: Pursuant to 20.6.2.4105A(6) NMAC, a person who is abating water pollution pursuant to an approved ground water discharge permit is exempt from the requirements of Sections 20.6.2.4104 NMAC (Abatement Plan Required) and 20.6.2.4106 NMAC (Abatement Plan Proposal) to obtain and implement an Abatement Plan, unless the OCD Director determines pursuant to 20.6.2.4105B NMAC, that the abatement will not meet WQCC ground water or surface water standards, or that additional action is necessary to protect health, welfare, environment or property.

When a person is abating water pollution pursuant to an approved discharge permit, the discharge permit must be consistent with the requirements and provisions of Sections 20.6.2.4101 (Purpose), 20.6.2.4103 (Abatement Standards And Requirements), 20.6.2.4106C NMAC (Stage 1 Abatement Plan), 20.6.2.4106E NMAC (Purpose Of Stage 2 Of The Abatement Plan); 20.6.2.4107 (Other Requirements), and 20.6.2.4112 NMAC (Completion And Termination).

The Permittee began discharging reverse osmosis reject water at its two farms in accordance with a permit modification approved on April 17, 1993. The discharge contained constituents present at concentrations that exceeded the standards of 20.6.2.3103 NMAC, including chloride, fluoride, nitrate/nitrite and sulfate. Therefore, the Permittee shall investigate the ground water beneath its two farms to determine what impact to ground water quality has occurred as a result of the discharge of reverse osmosis fluid.

2. Site Investigation Workplan: The Permittee shall submit a Site Investigation Workplan for the two farms that complies with the requirements of 20.6.2.4105A(6) NMAC within 90 days of the issuance of the discharge permit. The objective of the site investigation workplan is to define (see 20.6.2.4105C(2) NMAC) the site geology and hydrogeology, the vertical and horizontal extent and magnitude of vadose zone and ground water contamination, the rate and direction of contaminant migration. The Permittee shall propose the location and depth of at least three soil borings which it will convert to monitor wells for each of the two farms at which the discharge occurred. The Permittee shall generally follow the protocols specified in its Facility Wide Ground Water Monitoring Plan, except as follows:

a. The Permittee shall include a proposed schedule for the installation and sampling of the new soil borings/monitor wells.

b. The new monitor wells shall be constructed of 2 inch Schedule 40 PVC with 10 feet of screen below the top of ground water and 5 feet of screen above.

c. The Permittee shall sample the new monitor wells at least quarterly and shall submit interim quarterly monitoring reports.

3. Final Site Investigation Report: The Permittee shall specify in its Site Investigation Workplan that it shall submit a Final Site Investigation Report to OCD for approval. The Final Site Investigation Report is due 90 days from the date that the Permittee completes the fourth quarterly sampling event. The quarterly interim reports are due 30 days after the Permittee receives the analytical data. The Final Site Investigation Report and quarterly interim reports shall generally follow the same format that the Permittee uses for its FWGWMP.

After reviewing and approving of the Final Site Investigation Report, the OCD Director shall determine whether to require the Permittee to continue monitoring or to require the Permittee to submit a Stage 2 Abatement Plan pursuant to 20.6.2.4106E NMAC. The results of the Final Site Investigation Report shall determine whether the ground water quality at the two farms has been impacted by the discharge of reverse osmosis reject water by comparison to the background water quality and to the standards of 20.6.2.3103 NMAC.

ATTACHMENT 1

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DISCHARGE PERMIT GW-028

1 GENERAL PROVISIONS:

1.A PERMITTEE AND PERMITTED FACILITY: The Director of the Oil Conservation Division (OCD) of the Energy, Minerals and Natural Resources Department issues Discharge Permit GW-028 (Discharge Permit) to Navajo Refining Company(Permittee) located at 501 E. Main, Artesia, New Mexico 88210, to operate the Artesia Refinery(Facility) located in theSE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County. The refinery is located northeast of the intersection of Highway 285 and Highway 82, in Artesia, New Mexico.

The Permittee refines crude oil and processes natural gas at its Facility. The Facility refines and processes up to 40,000 barrels per day of crude oil and other feed stocks. The Permittee's Facility discharges approximately 10,000 8,200 barrels per day of reverse osmosis reject fluids to the surface at the Facility's two farms. The Permittee is abating ground water and vadose zone contamination at the Facility. Ground water that may be affected by a spill, leak, or accidental discharge occurs at a depth of approximately 25 feet below ground surface with a total dissolved solids concentration of approximately 2,500 mg/L.

COMMENT: When OCD issued the initial draft permit on July 29, 2011, only one RO Unit was operating at Navajo and discharging approximately 8,200 barrels per day of RO Reject to the farms. Between that time and the issuance of the current draft permit, June 13, 2012, Navajo has added a second RO Unit to handle the increased demand for makeup water to the boilers and cooling towers. This second RO Unit added approximately 1,500 barrels of reject water to the farms. Thus, the total amount discharged increased from 8,200 bbls/day to approximately 10,000 bbls/day. Additional changes to the RO system are being evaluated that have the potential to lower the overall discharge rate to the farms. It is difficult to predict what the actual volume discharged will be between now and the end of the 36 month period when Navajo has agreed to cease the discharge. Therefore, it is appropriate to reference a discharge rate of 10,000 bbls/day, rather than the initial estimate of 8,200 bbls/day.

OCD Response to Comments (RTC): OCD has change Permit Condition 1.A to indicate that the Facility "... processes up to 50,000 barrels per day...." OCD has changed the permit throughout to indicate that the Facility "discharges approximately 10,000 barrels per day...."

1.B SCOPE OF PERMIT: OCD has been granted authority to administer the Water Quality Act (Chapter 74, Article 6 NMSA 1978) as it applies to refineries by statute and by delegation from the Water Quality Control Commission pursuant to Section 74-6-4(E) NMSA 1978.

The Water Quality Act and the rules issued under that Act protect ground water and surface water of the State of New Mexico by providing that, unless otherwise allowed by rule, no person shall cause or allow effluent or leachate to discharge so that it may move directly or indirectly into ground water unless such discharge is pursuant to an approved discharge permit (See WQCC Regulations: 20.6.2.3104 NMAC and 20.6.2.3106 NMAC).

This Discharge Permit authorizes the Permittee to discharge approximately 10,0008,200barrels per day of reverse osmosis reject fluids at the Permittee's two farms. This Discharge Permit does not authorize any treatment of, or on-site disposal of, any materials, product, by-product, or oil field waste including, but not limited to, the on-site disposal of lube oil, glycol, antifreeze, filters, elemental sulfur, wash down water, contaminated soil, and cooling tower blow down water.

COMMENT: See the previous comment.

This Discharge Permit does not convey any property rights of any sort nor any exclusive privilege, and does not authorize any injury to persons or property, any invasion of other private rights, or any infringement of state, federal, or local laws rules or regulations.

The Permittee shall operate in accordance with the Discharge Permit conditions to comply with the Water Quality Act and the rules issued pursuant to that Act, so that neither a hazard to public health nor undue risk to property will result (See 20.6.2.3109C NMAC); so that no discharge will cause or may cause any stream standard to be violated (See 20.6.2.3109H(2) NMAC); so that no discharge of any water contaminant will result in a hazard to public health(See 20.6.2.3109H(3) NMAC); and, so that the numerical standards specified of 20.6.2.3103 NMAC are not exceeded.

The Permittee shall not allow or cause water pollution, discharge, or release of any water contaminant that exceeds the Water Quality Control Commission (WQCC) standards specified at 20.6.2.3101 NMAC and 20.6.2.3103 NMAC or 20.6.4 NMAC (Water Quality Standards for Interstate and Intrastate Streams).

COMMENT: This statement does not accurately reflect the discharge requirements of the WQCC's ground water regulations, 20.6.2.3101 through 3114 NMAC. Nothing in those regulations limits discharges to ground water standards in 20.6.2.3101 & 3103NMAC or surface water standards in 20.6.4 NMAC. Rather, they limit discharges if they cause the standards to be exceeded in ground water at places of withdrawal of water for present or reasonably foreseeable future use. 20.6.2.3109.C(2) NMAC.

OCD RTC: OCD has deleted part of this Permit Condition as requested.

1.C DISCHARGE PERMIT RENEWAL: This Discharge Permit is a permit renewal that replaces the permit being renewed. Replacement of a prior permit does not relieve the Permittee of its responsibility to comply with the terms of that prior permit while that permit was in effect.

1.D DEFINITIONS: Terms not specifically defined in this Discharge Permit shall have the same meanings as those in the Water Quality Act or the rules adopted pursuant to the Act, as the context requires.

1.E FILING FEES AND PERMIT FEES: Pursuant to 20.6.2.3114 NMAC, every facility that submits a discharge permit application for initial approval or renewal shall pay the permit fees specified in Table 1 and the filing fee specified in Table 2 of 20.6.2.3114 NMAC. OCD has

already received the required \$100.00 filing fee for this application. The permit fee for discharging at a refinery is \$8,400.00. The Permittee shall submit this amount along with the signed Discharge Permit. Checks must be payable to the "New Mexico Water Quality Management Fund," and <u>not</u> the Oil Conservation Division.

1.F EFFECTIVE DATE, EXPIRATION, RENEWAL CONDITIONS, AND

PENALTIES FOR OPERATING WITHOUT A DISCHARGE PERMIT: This Discharge Permit is effective 30 days from the date that the Permittee receives this discharge permit or until the permit is terminated. This Discharge Permit will expire on October21, 2016July XX, 2017. The Permittee shall submit an application for renewal no later than 120 days before that expiration date, pursuant to 20.6.2.3106F NMAC. If a Permittee submits a renewal application at least 120 calendar days before the Discharge Permit expires and is in compliance with the approved Discharge Permit, then the existing Discharge Permit will not expire until OCD has approved or disapproved the renewal application. A discharge permit continued under this provision remains fully effective and enforceable. Operating with an expired Discharge Permit may subject the Permittee to civil and/or criminal penalties (See Section 74-6-10.1 NMSA 1978 and Section 74-6-10.2 NMSA 1978).

COMMENT: Navajo is aware of no basis/need to limit this permit to a term less than 5 years. The insertion of "120 calendar days" clarifies the sentence and conforms to the regulation.

OCD RTC: Under the Water Quality Act (Section 74-6-5(I) NMSA 1978) and WQCC regulations (3109H(4) NMAC), discharge permits may be issued for fixed terms not to exceed five years, meaning constituent agencies may set the terms provided the term does not exceed five years. Discharge Permits are not required to be five year terms and Navajo has had the benefit of a Discharge Permit for almost a year. OCD did not change the expiration date. OCD did change Permit Condition 1.F by inserting the omitted "<u>120</u> calendar days."

1.G MODIFICATIONS: The Permittee shall notify the OCD Director and the Division's Environmental Bureau of any facility expansion, production increase, or process modification that would result in any significant modification in the discharge of water contaminants (See 20.6.2.3107CNMAC). OCD may require the Permittee to submit a permit modification pursuant to 20.6.2.3109E NMAC and may modify or terminate a permit pursuant to Section 74-6-5(M) through (N) NMSA 1978.

1.H TRANSFER OF DISCHARGE PERMIT: Prior to any transfer of ownership, control, or possession (whether by lease, conveyance or otherwise) of the Facility, the transferor shall notify the transferee in writing of the existence of this Discharge Permit, and shall deliver or send by certified mail to OCD a copy of such written notification, together with a certification or other proof that such notification has been received by the transferee pursuant to 20.6.2.3111 NMAC. Upon receipt of such notification, the transferee shall inquire into all of the provisions and requirements contained in the Discharge Permit, and the transferee shall be charged with notice of all such provisions and requirements as they appear of record in the Division's file or files concerning the Discharge Permit. Upon assuming either ownership or possession of the Facility the transferee shall have the same rights and responsibilities under the Discharge Permit as were applicable to the transferor (See 20.6.2.3111 NMAC).

Transfer of the ownership, control, or possession of the Facility does not relieve the transferor of responsibility or liability for any act or omission which occurred while the transferor owned, controlled, or was in possession of the Facility (See 20.6.2.3111E NMAC).

1.I CLOSURE PLANAND FINANCIAL ASSURANCE: The Permittee shall notify OCD in writing when operations of its Facility are to beany permitted discharge is discontinued for a period in excess of six months. Upon review of the Permittee's notice, OCD will determine whether to modify this permit, pursuant to 20.6.2.3107 NMAC and 20.6.2.3109E NMAC, to require the Permittee to submit a closure plan and/or post-closure plan, including financial assurance.

COMMENT: There are operations at the Refinery that are not linked to a permitted discharge. Cessation of those operations are not within the OCD's authority under the WQCC discharge permitting program and should not give rise to a potential closure of a permitted discharge.

OCD RTC: OCD has changed Permit Condition 1.1 as requested.

1.J COMPLIANCE AND ENFORCEMENT: If the Permittee violates or is violating a condition of this Discharge Permit, OCD may issue a compliance order requiring compliance immediately or within a specified time period, suspending or terminating this Discharge Permit, and/or assessing a civil penalty (See Section 74-6-10 NMSA 1978). OCD may also commence a civil action in district court for appropriate relief, including injunctive relief (See Section 74-6-10(A)(2) NMSA 1978 and Section 74-6-11 NMSA 1978). The Permittee may be subject to criminal penalties for discharging a water contaminant without a discharge permit or in violation of a condition of a discharge permit, making any false material statement, representation, certification or omission of material fact in an application, record, report, plan or other document filed, submitted or required to be maintained under the Water Quality Act; falsifying, tampering with or rendering inaccurate any monitoring device, method or record required to be maintained under the Water Quality Act; or failing to monitor, sample or report as required by a permit issued pursuant to a state or federal law or regulation (See Section 74-6-10.2 NMSA 1978).

2 GENERAL FACILITY OPERATIONS:

2.A CONTINGENCY PLAN: The Permittee shall implement its approved Contingency Plan to cope with failure of the Discharge Permit or system.

2.B CLOSURE PLAN: After completing abatement of all ground-water and vadose contamination required under Permit Condition 2.G, the Permittee shall perform the following closure measures:

1. Remove or plug all lines leading to and from any extraction or recovery wells and any injection wells so that a discharge can no longer occur.

2. Remove all remediation system components from the site, if applicable.

3. After receiving notification from OCD that post-closure monitoring may cease, the Permittee shall plug and abandon all monitor well(s).

COMMENT: Deletion of this phrase avoids issues concerning the presence of ground water or vadose zone contamination.

OCD RTC: Navajo is responsible for abating ground water contamination at its Artesia Refinery. OCD includes this permit condition to put Navajo on notice that it will be required to conduct abatement of all ground water and vadose zone contamination. OCD did not make the requested change to Permit Condition 2.B.

2.C RECORD KEEPING: The Permittee shall maintain records of all inspections required by this Discharge Permit at its Facility office for a minimum of five years and shall make those records available for inspection by OCD.

2.D RELEASE REPORTING: The Permittee shall comply with the following permit conditions, pursuant to 20.6.2.1203 NMAC, and shall submit an OCD form C-141 to report releases, if it determines that a release discharge of oil or other water contaminant, in such quantity as may with reasonable probability injure or be detrimental to human health, animal or plant life, or property, or unreasonably interfere with the public welfare or the use of property, has occurred. The Permittee shall report unauthorized releases of water contaminants in accordance with any additional commitments made in its approved Contingency Plan. If the Permittee determines that any constituent exceeds the standards specified at 20.6.2.3103 NMAC, then it shall report a release to OCD.

COMMENT: The notification requirements of 20.6:2.1203 NMAC are independent of permitting requirements. Navajo submits the proposed changes to clarify that the reporting is to be conducted under this permit, and not the regulation. Also, Navajo proposed to delete the requirement that all discharges in excess of the 20.6,2,3103 NMAC standards be reported because it is inconsistent with of 20.6.2.1203.A NMAC. Reporting is only required if the discharge may cause injury. Not all discharges in excess of the standards may result in injury or be detrimental to human health, etc.

OCD RTC: OCD has not made all of the requested changes. There is no reason why a Discharge Permit cannot specify reporting requirements that operators must comply with. All discharges in excess of the WQCC standards specified at 20.6.2.3103 NMAC have the potential to exceed standards in the ground water; that is, the release "...<u>may</u> result in injury...." This is a reasonable permit condition that requires Navajo to inform OCD if Navajo is having repeat releases. Navajo is prohibited from making unauthorized discharges (that is spills, leaks, releases *etc.*) and doing nothing – that would be an intentional and illegal discharge. There is no reason to wait until injury actually occurs. The Oil Conservation Commission has already determined that releases of chloride not only <u>may</u>, but will inevitably reach ground water. OCD will not accept the argument that unauthorized releases cause no harm or injury. OCD already has determined that Navajo has gross ground water contamination; therefore the "<u>may</u>" issue is moot.

OCD has determined that Operators **may** use C-141s because of convenience and has changed Permit Condition 2.D to reflect this. OCD changed Permit Condition 2.D to specify that the Permittee may report a release using OCD form C-141. OCD has also changed Permit Condition 2.D by striking the phrase "... pursuant to...." OCD has also changed Permit Condition 2.D by replacing "release" with "discharge" to be consistent with WQCC regulations

1. **Oral-Notification:** As soon as possible after learning of such a discharge, but in no event more than twenty-four (24) hours thereafter, the Permittee shall notify OCD of a release. The Permittee shall provide the following:

COMMENT: There is no reason to limit notification to oral notification. Email or fax notification are equally effective and may result in earlier notification of OCD staff.

OCD RTC: Navajo may <u>also</u> use email and fax to make a notification, but it is required to verbally notify OCD of a release. OCD did not make the requested change.

- the name, address, and telephone number of the person or persons in charge of the facility, as well as of the Permittee of the facility;
- the name and location of the facility;

COMMENT: Since this is a permitted facility, OCD should already be aware of this information.

OCD RTC: Although OCD is certainly aware of this information, Navajo is required by 20.6.2.1303A NMAC to provide this information. There is no reason why Navajo should not submit a complete notification and no reason why Navajo should expect OCD to change a permit condition that reflects the plain language of the regulations. OCD did not make the requested change.

- the date, time, location, and duration of the discharge;
- the source and cause of discharge;
- a description of the discharge, including its chemical composition;
- the estimated volume of the discharge; and,
- any corrective or abatement actions taken to mitigate immediate environmental damage from the discharge.

2. Written Notification: Within one week after the Permittee has discovered a discharge, the Permittee shall send written notification (may use an OCD form C-141 with attachments) to OCD verifying the prior oral notification as to each of the foregoing items and providing any appropriate additions or corrections to the information contained in the prior oral notification.

COMMENT: Deletion of "oral" makes this paragraph consistent with 2.D.1.

OCD RTC: Leaving it as it is, keeps it consistent with the plain language of the WQCC regulations and consistent with the unchanged Permit Condition 2.D.1. OCD did not make the requested change.

2.E OTHER REQUIREMENTS:

1. Inspection and Entry: Pursuant to 20.6.2.4107A NMAC, the Permittee shall allow any authorized representative of the OCD Director, upon the presentation of proper credentials, to:

- enter the facility at reasonable times;
- inspect and copy records required by this discharge permit;
- inspect any treatment works, monitoring, and analytical equipment;
- sample any wastes, discharge, ground water, surface water, stream sediment, plants, animals, or vadose-zone material including vadose-zone vapor;
- use the Permittee's monitoring systems and wells in order to collect samples; and,
- gain access to off-site property not owned or controlled by the Permittee, but accessible to the Permittee through a third-party access agreement, provided that it is allowed by the agreement.

2. Advance Notice: Pursuant to 20.6.2.4107B NMAC, the Permittee shall provide OCD with at least four (4) working days advance notice of any environmental sampling to be performed pursuant to this Discharge Permit, or any well plugging, abandonment or destruction at the Facility site.

3. Plugging and Abandonment: Pursuant to 20.6.2.4107C NMAC, tThe Permittee shall propose to plug and abandon a monitor well by certified mail to OCD for approval, unless such approval is required from the State Engineer. The proposed action shall be designed to prevent water pollution that could result from water contaminants migrating through the well or borehole. The proposed action shall not take place without written approval from OCD, unless written approval or disapproval is not received by the Permittee within thirty (30) days of the date of receipt of the proposal.

COMMENT: 20.6.2.4107 NMAC only applies to abatement actions carried out under the WQCC's abatement regulations. The monitor wells covered by this permit are not part of an OCD-approved abatement action under the abatement regulations.

OCD RTC: All wells, including remediation and monitor wells are part of Navajo's Facility Wide Ground Water Monitoring Plan (FWGWMP) which is part of the Abatement Plan. The additional monitor wells will either be added to the FWGWMP or will be required separately by this Discharge Permit and the associated Abatement Plan. OCD did not make the requested change.

2.F ANNUAL DISCHARGE PERMIT REPORT: The Permittee shall submit its Annual Discharge Permit Report pursuant to 20.6.2.3107 NMAC to OCD by October 21th of each year. The Annual Discharge Permit Report shall include the following:

1. a summary of all major refinery activities or events that could substantially affect the quantity or quality of any discharge covered by this permit;

2. a summary of the discharge activities, including the quality and volume of the discharge;

4.

3. a summary of all leaks, spills, and releases to the environment that may reach ground or surface water, and corrective actions taken; and,

a summary of the discovery of new groundwater contamination.

COMMENT: As written, the report could require information about activities at the refinery that do not relate to discharges at the site.

OCD RTC: This is just a summary in the annual report that Navajo is required to make under the spill reporting Permit Condition. OCD did not make the requested change.

2.G ANNUAL GROUND WATER MONITORING REPORT: The Permittee shall submit its Annual Ground Water Monitoring Report pursuant to 20:6:2:3107 NMAC to OCD by October 21st of each year. The Annual Ground Water Monitoring Report shall include the following:

1. Description of groundwater monitoring and remediation activities conducted throughout the reporting period, including sample collection procedures, decontamination procedures, sample handling procedures, and management of wastes;

2. Summary tables of semiannual groundwater and activities; non-aqueous phase liquid (NAPL or Phase Separated Hydrocarbon - PSH) gauging data, with corrected water table elevation for all wells containing PSH

3. Summary table of groundwater quality parameters recorded in the field (purge parameters);

4. Summary of laboratory analytical data with comparison to water quality standard;

5. Any 20.6.2.3103 NMAC constituent found to exceed the water quality standard or background concentration shall be highlighted and noted in the Annual Discharge Permit Report;

- 6. Copies of the most recent year's laboratory analytical data sheets with QA/QC
- 7. Summary of QA/QC data review and validation;

8. Groundwater contour maps for each aquifer systemdepicting the groundwater gradient for eachsemiannual monitoring event, including site featuresand the direction and magnitude of the hydraulic gradient;

COMMENT: Navajo is not aware of any benefit this additional information will provide OCD. Additionally, the requirement to prepare contour maps of "each aquifer" is overly broad and may have no relationship with discharges authorized under this permit.

OCD RTC: OCD is requiring this because it is basic hydrogeologic information that Navajo must obtain to comply with its FWGWMP. OCD did not make the requested change.

9. Iso-concentration maps for major constituents of concern for each semiannual monitoring event, including chloride, fluoride, sulfate, nitrate and TDS from the new monitor wells at the Permittee's farms and from existing monitor wells included in the FWGWMP.

OCD RTC: Navajo did not comment on why it thinks that OCD should strike the highlighted phrase. OCD included this permit condition to make clear that Navajo will be required to investigate and to abate any ground water contamination that resulted from its history of discharging RO Reject water at the farms. OCD did not make the indicated change.

10. NAPL (PSH) thickness isopleth map for each semiannual monitoring event in all monitoring and recovery wells.

Plots of static water elevation versus time in key wells, specifically those that 11. contain NAPL (PSH):

12. Tabulation of the monthly and cumulative volume of NAPL (PSH)removed from recovery wells or monitoring wells in accordance with the Ground Water and Product Recovery System Program throughout the reporting period; and,

Recommendations, including any recommended changes to the groundwater 13. monitoring program.

14. The Permittee shall submit the Annual Ground Water Monitoring Report will be submitted in hardcopy and electronic format for review.

3 CLASS V WELLS: Pursuant to 20.6.2.5002B NMAC, leach fields and other wastewater disposal systems at Division-regulated facilities that inject non-hazardous fluid into or above an underground source of drinking water are Underground Injection Control (UIC) Class V injection wells. This Discharge Permit does not authorize the Permittee to use an UIC Class V injection well for the disposal of industrial waste at the Facility. Pursuant to 20.6.2.5005 NMAC, the Permittee shall close any UIC Class V industrial waste injection wells at its Facility that inject non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes (e.g., septic systems, leach fields, dry wells, etc.) other than contaminated ground water within 90 calendar days of the issuance of this Discharge Permit. The Permittee shall document the closure of any UIC Class V wells used for the disposal of non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes other than contaminated ground water in its Annual Discharge Permit Report.

The Permittee must obtain a permit from the New Mexico Environment Department for other Class V wells, including wells used only for the injection of domestic wastes.

DISCHARGE OF REVERSE OSMOSIS REJECT FLUIDS AT PERMITTEE'S 4 **TWO FARMS:** (1, 1)

Discharge Volume: The Permittee is authorized to discharge approximately 4.A 10,0008,200 barrels per day of reverse osmosis reject fluids to the surface at the Permittee's two farms. Discharge to Eagle Draw is prohibited. This authorization expires on [date], 36 months from the effective date of this permit.

COMMENT: See comment on page 1 concerning the volume of the discharge. Navajo proposes to add language concerning the termination of the authorization that is consistent with Condition 6.C and makes it clear that the authorization in this section expires in 36 months.

OCD RTC: OCD made the requested changes.

4.B Sampling and Analysis: The Permittee shall collect and analyze samples of the discharge as follows:

1. The Permittee shall sample and analyze for all constituents listed in 20.6.2.3103A, B, and C NMAC chloride, fluoride, and sulfate at least semi-annually by collecting grab samples at the point of discharge.

COMMENT: Extensive historical sampling as submitted to OCD in the Annual Groundwater Monitoring Reports shows that the majority of constituents listed in 20.6.2.3101 A, B, and C NMAC are not present or are present at levels well below WQCC standards, as well as previously permitted levels. Additionally, the influent to the RO system is comprised solely of fresh water; no process wastewaters, sanitary discharges, or other sources are processed via the RO system. Therefore, the proposed analyte list of chloride, fluoride, and sulfate is reasonable and sufficient to assure the applicable standards are met.

OCD RTC: The requirement that Navajo characterize the water quality of the discharge for all 20.6.2.3103 NMAC constituents semiannually is reasonable. Historical water quality data does not demonstrate what the quality of the current discharge is. The observation that the influent water is "fresh water" is irrelevant. OCD is requiring Navajo to characterize the quality of the discharge, which certainly is not fresh water. OCD did not make the requested change.

2. The Permittee shall sample and analyze using the methods specified in the Permittee's FWGWMP.

- 3. The Permittee shall retain all sampling and analytical QA/QC for four years.
- 4. The Permittee shall monitor and record the discharge flow on a daily basis.

5. The Permittee shall report the analytical results for all discharge samples collected in a monitoring period.

6. The Permittee shall ensure the sampling and flow measurements are representative of the volume and nature of the discharge.

7. The Permittee submit all sample data; analytical results, and flow measurements in its annual report.

5 FACILITY WIDE GROUND WATER MONITORING PLAN (FWGWMP) AND GROUND WATER AND PRODUCT RECOVERY SYSTEM:

The Permittee shall monitor and abate water pollution as specified in this discharge permit, and in accordance with its approved Facility Wide Ground Water Monitoring Plan (FWGWMP) and in accordance with its approved Ground Water and Product Recovery System, as modified by OCD approval. However, if the OCD Director determines that the abatement will not meet WQCC ground or surface water standards, or that additional action is necessary to protect health, welfare, environment or property, then the OCD Director may require the Permittee to submit an Abatement Plan pursuant to Section 20.6.2.4104 and Subsection A of Section 20.6.2.4106 NMAC.

5.A Facility Wide Ground Water Monitoring Plan (FWGWMP): The Permittee is implementing a FWGWMP which substantively meets the requirements for a Stage 1 Abatement Plan. The Permittee shall implement its approved Stage 1 Abatement Plan for monitoring and site investigation consistent with its approved FWGWMP, as modified annually and as required by OCD. Pursuant to 20.6.2.4106C NMAC, the purpose of a Stage 1 Abatement Plan is to

design and conduct a site investigation that will adequately define site conditions, and provide the data necessary to select and design an effective abatement option.

5.B Ground Water and Product Recovery System: The Permittee is implementing a Ground Water and Product Recovery System which substantively meets the requirements for a Stage 2 Abatement Plan. The Permittee shall implement its approved the Ground Water and Product Recovery System as modified annually and as required by OCD. Pursuant to 20.6.2.4106E NMAC, the purpose of the Stage 2 Abatement Plan is for the Permittee to select and design, if necessary, an abatement option that, when implemented, will result in attainment of the abatement standards and requirements specified in 20.6.2.4103 NMAC and Permit Condition 5.C, including post-closure maintenance activities

5.C Abatement Standards and Requirements: The Permittee shall abate the vadose zone so that water contaminants in the vadose zone shall not contaminate ground water or surface water through leaching, percolation or as the water table elevation fluctuates. The Permittee, where the Total Dissolved Solids concentration is 10,000 mg/L or less, shall continue abatement until the standards and requirements of 20.6.2.4103 are abate contaminated ground water so that toxic pollutant(s), as defined in 20.6.2.7(WW) NMAC, shall not be present and so that the standards of 20.6.2.3103 NMAC shall be met. If the background concentration of any water contaminant exceeds the standard or requirement of Subsections A, B and C of Section 20.6.2.4103 NMAC, then the ground water pollution shall be abated by the Permittee to thebackground concentration (See 20.6.2.4101B NMAC).

COMMENT: To avoid confusion, Navajo suggests that the language be consistent with 20.6.2.4109.F NMAC for approval of abatement plans.

OCD RTC: This Permit Condition is clear and is based on the 20.6.2.4103 NMAC. Navajo is required to clean up the vadose zone and ground water. OCD did not make the requested change.

5.F Completion and Termination: Pursuant to 20.6.2.4112 NMAC, abatement shall be considered complete when the standards and requirements specified in 20.6.2.4103 NMAC for both the vadose zone and ground water are met. At that time, the Permittee shall submit an Abatement Completion Report, documenting compliance with the standards and requirements specified in 20.6.2.4103 NMAC and this Discharge Permit, to OCD for approval. The Abatement Completion Report also shall propose any changes to long term monitoring and site maintenance activities, if needed, to be performed after termination of the Abatement Plan.

COMMENT: The proposed change makes the language more consistent with 20.6.2.4112 NMAC.

OCD RTC: Again, OCD reminds Navajo that it is required to abatement contamination in both the vadose zone and ground water. OCD did not make the requested change.

6 SCHEDULE OF COMPLIANCE:

6.A SUBMISSION OF THE PERMIT FEES: As specified in Permit Condition 1.F, the Permittee shall submit the permit fee of \$8,400.00within 30 days of its receipt of the Discharge Permit. Checks should be payable to the "New Mexico Water Quality Management Fund," <u>not</u> the Oil Conservation Division.

6.B ANNUAL REPORT: As specified in Permit Conditions 2.F and 2.G, the Permittee shall submit its annual report to OCD by October 21^{st} of each year.

6.C REQUIREMENT TO CEASE ALL DISCHARGE OF "REVERSE OSMOSIS REJECT FLUIDS" TO THE SURFACE AT THE TWO "FARMS." The Permittee shall by 36 months after issuance of this permit cease all discharge(s) of reverse osmosis reject fluids (approximately 8,200 barrels per day) and/or any other waste water effluent discharge(s) to the surface (*i.e.*, Permittee's farms) unless treated to either the water quality standards specified in Section 20.6.2.3103 NMAC-or to background.

COMMENT: Navajo has agreed to cease the discharge in 36 months. That obligation is reflected in its proposed change to Condition 4.A. As discussed earlier, the "unless treated" language is inconsistent with the regulation. Navajo understands that if it wishes to discharge reverse osmosis reject fluids after this 36 month period (which it does not expect), it will be required to submit a request to OCD identifying the basis for approval of the discharge.

OCD RTC: The purpose of Permit Condition 6 (Schedule of Compliance) is to put in a single section all the "deliverables" and other special permit conditions that the Permittee is required to meet. Navajo's Discharge Permit is based on regulatory requirements, not what Navajo has agreed to. OCD did not make the requested change. OCD did change Permit Condition 6.C to specify that Navajo shall cease its discharge within 36 months of the issuance of this discharge permit.

6.D SITE INVESTIGATION WORKPLANS FOR PERMITTEE'S TWO FARMS:

1. Overview:Pursuant to 20.6.2.4105A(6) NMAC, a person who is abating water pollution pursuant to an approved ground water discharge permit is exempt from the requirements of Sections 20.6.2.4104 NMAC (Abatement Plan Required) and 20.6.2.4106 NMAC (Abatement Plan Proposal) to obtain and implement an Abatement Plan, unless the OCD Director determines pursuant to 20.6.2.4105B NMAC, that the abatement will not meet WQCC ground water or surface water standards, or that additional action is necessary to protect health, welfare, environment or property.

When a person is abating water pollution pursuant to an approved discharge permit, the discharge permit must be consistent with the requirements and provisions of Sections 20.6.2.4101 (Purpose), 20.6.2.4103 (Abatement Standards And Requirements), 20.6.2.4106C NMAC (Stage 1 Abatement Plan), 20.6.2.4106E NMAC (Purpose Of Stage 2 Of The Abatement Plan), 20.6.2.4107 (Other Requirements), and 20.6.2.4112 NMAC (Completion And Termination).

The Permittee began discharging reverse osmosis reject water at its two farms in accordance with a permit modification approved on April 17, 1993. The discharge contained constituents present at concentrations that exceeded the standards of 20.6.2.3103 NMAC, including chloride, fluoride, nitrate/nitrite and sulfate. Therefore, the Permittee shall investigate the ground water beneath its two farms to determine what impact to ground water quality has occurred as a result of the discharge of reverse osmosis fluid.

2. Site Investigation Workplan: The Permittee shall submit a Site Investigation Workplan for the two farms that complies with the requirements of 20.6.2.4105A(6) NMAC within 90 days of the issuance of the discharge permit. The objective of the site investigation workplan is to define (see 20.6.2.4105C(2) NMAC) the site geology and hydrogeology, the vertical and horizontal extent and magnitude of vadose zone and groundwater contamination, the rate and direction of contaminant migration. The Permittee shall propose the location and depth of at least three soil borings which it will convert to monitor wells for each of the two farms at which the discharge occurred. The Permittee shall generally follow the protocols specified in its Facility Wide Ground Water Monitoring Plan, except as follows:

3. Final Site Investigation Report: The Permitteeshall specify in its Site Investigation Workplanthat itshall submit a Final Site Investigation Report to OCD for approval. The Final Site Investigation Report is due 90 days from the date that the Permitteecompletes the fourth quarterly sampling event. The quarterly interim reports are due 30 days after the Permitteereceives the analytical data. The Final Site Investigation Report and quarterly interim reports shall generally follow the same format that the Permittee uses for its FWGWMP.

After reviewing and approving of the Final Site Investigation Report, the OCD Director shall determine whether to require the Permitteeto continue monitoring or to require the Permitteeto submit a Stage 2 Abatement Plan pursuant to 20.6.2.4106E NMAC. The results of the Final Site Investigation Report shall determine whether the ground water quality at the two farms has been impacted by the discharge of reverse osmosis reject water by comparison to the background water quality and to the standards of 20.6.2.3103 NMAC.

COMMENT: There is no legal or factual basis to require the investigation or remediation. To require Navajo to conduct these remedial efforts, the regulations require the OCD the determine that the standards of 20.6.2.3103 NMAC "are being or will be exceeded. . . in ground water at any place of withdrawal for present or reasonably foreseeable future use . . . **due to the discharge**." 20.6.2.3109.E NMAC (emphasis added). Navajo is unaware of any such determination. In fact, as Navajo has asserted previously, the concentration of water contaminants in ground water at the time the discharge began already exceeded the numerical criteria in 20.6.2.3103 NMAC. Therefore, under the regulation, the concentrations at time

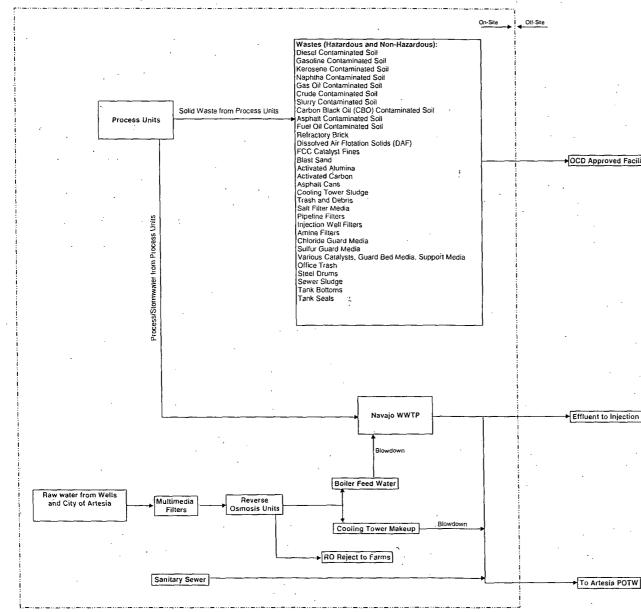
became the standard. As noted in previous submittals, the reverse osmosis reject water discharge has not resulted in concentrations in ground water in excess of those original levels. In fact, for a number of parameters, the ground water quality has improved.

OCD RTC: Navajo's assertion that "*There is no legal or factual basis to require the investigation or remediation*" is difficult to understand, given that OCD explicitly states in Permit Condition 6.D.1 that Navajo's discharges contained constituents at concentrations that exceeded WQCC standards specified at 20.6.2.3103 NMAC in large volumes for 29 years. Again, OCD reminds Navajo that it is required to abatement contamination in both the vadose zone and ground water. OCD did not make the requested change.

Additionally, Navajo notes that OCD is required to show "that each condition is reasonable and necessary to ensure compliance with the Water Quality Act and applicable regulation, considering site-specific conditions." NMSA 1978, § 74-6-5.D (2009).Navajo is unaware of OCD's position on the reasonableness and necessity of the proposed condition, and therefore, is unable to provide any further comments on the proposed condition.

OCD RTC: As noted above, OCD explicitly stated in Permit Condition 6.D.1 exactly why it is requiring Navajo to investigate the impact of its discharge to shallow ground water. OCD did not make the requested change.

Artesia Facility Water and Waste Handling



OCD Approved Facility

Effluent to Injection Wells

Chavez, Carl J, EMNRD

From:	Chavez, Carl J, EMNRD
Sent:	Friday, July 20, 2012 9:30 AM
То:	Chavez, Carl J, EMNRD
Subject:	GW-028 Navajo Artesia Refinery, Discharge Permit Credits Note to File

This note is written to document the credits for the overall changes to the newly issued discharge permit and associated documents. The changes were made by Glenn von Gonten (Acting Environmental Bureau Chief) and Sonny Swazo (Assistant to the General Counsel).

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Department Oil Conservation Division, Environmental Bureau

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SUSANA MARTINEZ Governor JOHN A. SANCHEZ Lieutenant Governor NEW MEXICO ENVIRONMENT DEPARTMENT

Ground Water Quality Bureau BECEWED OCD

Harold Runnels Building 1190 St. Francis Dave FEB 29 A 9:54 PO Box 5469, Santa Fe, NM 87502-5469 Phone (505) 827-2918 Fax (505) 827-2965 www.nmenv.state.nm.us



DAVE MARTIN Secretary BUTCH TONGATE Deputy Secretary

CERTIFIED MAIL – RETURN RECEIPT REQUESTED

February 15, 2012

Robert E. Forrest, Infrastructure Director City of Artesia 1702 N. Haldeman Road Artesia, NM 88210

RE: Response to Notice of Intent to Discharge; Discharge Permit Modification Required for Artesia Municipal Wastewater Treatment Facility, DP-258

Dear Mr. Forrest:

The Ground Water Quality Bureau of the New Mexico Environment Department (NMED) received a Notice of Intent (NOI) from you on December 13, 2011. The notice describes the discharge of 15 gallons per minute (gpm) of slip stream industrial wastewater and 150 gpm cooling tower blowdown industrial wastewater from the Navajo Refinery to the Artesia Municipal Wastewater Treatment Facility (WWTF). The notice satisfies the requirements of Subsection A of 20.6.2.1201 NMAC of the New Mexico Water Quality Control Commission (WQCC) Regulations, 20.6.2 NMAC. The facility is located at 1702 N Haldeman Road, Artesia, in Sections 2, 7, and 8, T17S, R26E, and Sections 6 and 24, T17S, R25E, Eddy County.

NMED has reviewed the information provided in accordance with Subsection D of 20.6.2.1201 NMAC. You are hereby notified that a Discharge Permit Modification of DP-258 is required for the proposed discharge. To apply for a Discharge Permit modification, you must complete and submit three copies of the enclosed Discharge Permit application, along with the \$100 filing fee. Please be advised that any discharge not authorized under DP-258 from this facility without prior written approval from NMED would be a violation of the WQCC Regulations. Robert Forrest, **DP-258** February 15, 2012 Page 2

In a letter dated November 30, 2011, NMED requested information from the City of Artesia concerning the discharges described in the December 13, 2011 NOI. In the City's response letter dated December 16, 2011, you stated that a treatment model was evaluated to ensure that the Artesia WWTF was not hydraulically overloaded and that effective treatment was possible with the addition of the industrial wastewater. When the City submits its application for modification of DP-258, please provide a copy of that treatment model evaluation. In addition, please include information showing that the increase in salinity (chloride and total dissolved solids) of the effluent due to the addition of industrial wastewater will not cause exceedances of these constituents in ground water in areas that receive reclaimed wastewater, within the meaning of Section 20.6.2.3010 NMAC of the WOCC regulations.

If you have any questions, please contact either Naomi Davidson at (505) 827-2936 or Clint Marshall, Program Manager of the Ground Water Pollution Prevention Section, at (505) 827-0027.

Sincerely,

Jerry Schoeppner, Acting Chief Ground Water Quality Bureau

JS:ND

Enc: Applying for a Discharge Permit: General Information Discharge Permit Application, General Form

cc: Mike Kessler, Acting District Manager, NMED District III NMED Roswell Field Office DP Required File Steven Baumgard, NMED-SWQB Rich Powell, NMED-SWQB Carl Chavez, ENMRD-OCD

Roy Robinson, Smith Engineering Company, PO Box 2565, Roswell, NM 88201



SUSANA MARTINEZ Governor

JOHN A. SANCHEZ Lieutenant Governor

NEW MEXICO ENVIRONMENT DEPARTMENT

Ground Water Quality Bureau



Harold Runnels Building 1190 St. Francis Drive PO Box 5469, Santa Fe, NM 87502-5469 Phone (505) 827-2918 Fax (505) 827-2965 www.nmenv.state.nm.us

2012 FEB 29 A 9: 54 DAVE MARTIN Secretary

> BUTCH TONGATE Deputy Secretary

CERTIFIED MAIL – RETURN RECEIPT REQUESTED

February 15, 2012

Robert E. Forrest, Infrastructure Director City of Artesia 1702 N. Haldeman Road Artesia, NM 88210

RE: Response to Notice of Intent to Discharge; Discharge Permit Amendment Required for Artesia Municipal Wastewater Treatment Facility, DP-258

Dear Mr. Forrest:

The New Mexico Environment Department (NMED) received a Notice of Intent (NOI) on December 16, 2011 to add the use of a Bulk Water System to be used to deliver reclaimed wastewater for use in compaction, dust control, oil field mud mixing and other non-potable uses. The NOI requested this proposed discharge be an addition to Discharge Permit, DP-258. The notice satisfies the requirements of Subsection A of 20.6.2.1201 NMAC of the New Mexico Water Quality Control Commission (WQCC) Regulations (20.6.2 NMAC). The facility is located at 1702 N Haldeman Road, Artesia, in Sections 2, 7, and 8, T17S, R26E, and Sections 6 and 24, T17S, R25E, Eddy County.

DP-258 authorizes the City of Artesia to discharge up to 3.0 million gallons per day (MGD) of municipal wastewater to the City's wastewater treatment facility (WWTF), and reuse the treated wastewater (reclaimed wastewater) for irrigation of various parks, athletic fields, schools, etc. throughout the City. The City is also authorized to discharge treated wastewater to the Pecos River pursuant to National Pollutant Discharge Elimination System (NPDES) permit NM0022268, issued by the United States Environmental Protection Agency (USEPA).

Based on the information provided in your Notice of Intent, NMED has determined that a Discharge Permit Amendment of Discharge Permit, DP-258 is required. For efficiency, NMED

Robert Forrest, **DP-258** February 15, 2012 Page 2

proposes implementation of this amendment in conjunction with the Discharge Permit modification of DP-258 necessitated by the NOI filed by the City of Artesia on December 13, 2011 (see accompanying letter).

If you have any questions, please contact either Naomi Davidson at (505) 827-2936 or Clint Marshall, Program Manager of the Ground Water Pollution Prevention Section, at (505) 827-0027.

Sincerely,

Jerry Schoeppner, Acting Chief Ground Water Quality Bureau

JS:ND

Enc: Applying for a Discharge Permit: General Information Discharge Permit Application, General Form

cc: Mike Kessler, Acting District Manager, NMED District III NMED Roswell Field Office DP Required File Steven Baumgard, NMED-SWQB Rich Powell, NMED-SWQB Carl Chavez, ENMRD-OCD Roy Robinson, Smith Engineering Company, PO Box 2565, Roswell, NM 88201

Chavez, Carl J, EMNRD

From:Chavez, Carl J, EMNRDSent:Friday, February 24, 2012 3:05 PMTo:'Lackey, Johnny'Cc:Sanchez, Daniel J., EMNRD; VonGonten, Glenn, EMNRD; Swazo, Sonny, EMNRD; Bailey,
Jami, EMNRD; McKee, Michael; Combs, RobertSubject:RE: December 14, 2011 Letter Returned to OCD

Johnny, et al.:

Good afternoon. Thanks for sending your discharge permit renewal response below on 2/13/2012.

In response to your last paragraph in your response, and your statement, "Before Navajo commits capital and resources to accomplish this, we would like to meet with the OCD to discuss the agency's evaluation of the ground water impacts from the current discharge and any concerns or recommendations it may have on how to address the waste stream."

OCD agrees that communication should help to resolve this matter with any identified concerns, fleshing out issues, ideas, brainstorming, etc.

The OCD final discharge permit renewal stipulates some additional work that needs to be completed in order to help assess impacts (if any) from the historical and current RO reject water discharge to the farm fields.

However, the OCD regrets that it cannot make any recommendations on how to address the waste stream issue due to liability issues. The OCD does recommend that a highly qualified waste water engineering firm be retained that is fully knowledgeable and experienced in addressing all aspects of the waste water treatment engineering issues associated with this type and magnitude of waste water discharge scenario in order to successfully address the intent of the OCD Discharge Permit Renewal.

Thanks for your communication in this matter. Please provide to the OCD a date and time that you would like to meet or hold a telephone conference call to communicate on this matter further. Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: CarlJ.Chavez@state.nm.us Website: <u>http://www.emnrd.state.nm.us/ocd/</u> "Why not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward with the Rest of the Nation?" To see how, go to "Pollution Prevention & Waste Minimization" at: http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental)

From: Lackey, Johnny [mailto:Johnny.Lackey@hollyfrontier.com]
Sent: Monday, February 13, 2012 4:01 PM
To: Chavez, Carl J, EMNRD
Cc: Sanchez, Daniel J., EMNRD; VonGonten, Glenn, EMNRD; Swazo, Sonny, EMNRD; Bailey, Jami, EMNRD; McKee, Michael; Combs, Robert
Subject: RE: December 14, 2011 Letter Returned to OCD

1

Carl.

Here are Navajo's responses to the attached letter that we received on January 13, 2012. Attached also, is an updated water waste stream Process flow diagram for the Artesia Refinery that should clarify how the various waste streams are disposed of. This should replace the existing Attachment 2 in the current Navajo Artesia permit (GW-028):

In response to item 1:

Please see the attachment. The process flow diagram has been revised to show the current waste streams and their associated destination. For the purpose of clarification, the feed to the Reverse Osmosis Unit has been included. The RO Unit is fed solely by well water (groundwater) and purchased water from the City of Artesia (groundwater) No waste streams, including process waste streams, are conveyed or processed in the RO Unit. In fact, there is no connection between any process waste streams and the RO unit. The RO unit is designed to simply remove the salts from the feed water for use as boiler feed water and cooling tower make-up water. The RO unit concentrates the salts into a smaller 'reject' water stream that is discharged.

In response to item 2:

The Waste Water Treatment Plant (WWTP) at the Navajo Refinery is designed to, and treats **ONLY** process waste water. Hazardous wastes are isolated, managed and disposed of off-site in accordance with applicable rules.

In response to item 3:

Please see the attachment. The process flow diagram has been revised to show the current waste streams and their associated destination. For the purpose of clarification, the feed to the Reverse Osmosis Unit has been included. Sanitary sewage <u>IS NOT</u> discharged as feed to the Navajo WWTP or disposed in our UIC Class I injection wells. The "sanitary sewer" waste stream from the refinery operation is discharged to the City of Artesia POTW.

Hopefully the Revised Water and Waste Process Flow Diagram (attached) for Navajo, will clear up questions on the disposition of the various waste streams generated at the refinery.

As explained previously, the discharge of RO reject water is currently authorized under the ground water discharge permit and renewal of that permit is appropriate under the Water Quality Control Commission's ground water regulations. The ground water affected by the discharge exceeded applicable ground water standards at the time the discharge began, and the discharge has not caused an increase in water contaminant concentrations. In fact, as the analyses submitted earlier demonstrated, water contaminant concentrations have gotten somewhat better over time. However, even though the continued discharge is permittable, Navajo has retained a consultant to evaluate options to either treat the RO Reject to meet State groundwater limits or develop an alternative disposal method for this discharge.

Based on the advice of the consultant, Navajo has determined that it will take at least **36 months** to design, procure, construct and implement a treatment and disposal project for this waste stream. Before Navajo commits capital and resources to accomplish this, we would like to meet with the OCD to discuss the agency's evaluation of the ground water impacts from the current discharge and any concerns or recommendations it may have on how to address this waste stream.

Thanks,

Johnny Lackey Sr. Environmental Manager The HollyFrontier Companies P.O. Box 159 501 E. Main St. Artesia, NM 88211-0159 Office - 575-746-5490 Cell - 972-261-8075 Fax - 575-746-5451 Johnny.Lackey@hollyfrontier.com

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From: Chavez, Carl J, EMNRD [mailto:CarlJ.Chavez@state.nm.us]
Sent: Tuesday, January 10, 2012 4:18 PM
To: Lackey, Johnny; Moore, Darrell
Cc: Sanchez, Daniel J., EMNRD; VonGonten, Glenn, EMNRD; Swazo, Sonny, EMNRD
Subject: December 14, 2011 Letter Returned to OCD

Gentlemen:

Please find attached an OCD letter that was recently returned to the OCD due to an apparent address error. I will resend it tomorrow morning via postal service, but wanted you to have it in hand electronically too.

The OCD apologizes for any inconvenience this may have caused you. Please respond to the attached letter on or before COB Monday, February 13, 2012.

Please contact me if you have questions. Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: CarlJ.Chavez@state.nm.us Website: <u>http://www.emnrd.state.nm.us/ocd/</u> "Why not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward with the Rest of the Nation?" To see how, go to "Pollution Prevention & Waste Minimization" at: <u>http://www.emnrd.state.nm.us/ocd/</u>environmental.htm#environmental)

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New Mexico Energy, Minerals and Natural Resources Department

Susana Martinez Governor

John H. Bemis Cabinet Secretary

Brett F. Woods, Ph.D. Deputy Cabinet Secretary . .

Jami Bailey Division Director Oil Conservation Division



JANUARY 11, 2012

CERTIFIED MAIL RETURN RECEIPT NO: 7923 1183

Mr. Johnny Lackey Environmental Manager Navajo Refining Company, LLC P.O. Box 159 Artesia, New Mexico 88211-0159

RE: Artesia Refinery Discharge Permit Renewal (GW-028) SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM Eddy County, New Mexico

Dear Mr. Lackey:

Pursuant to Water Quality Control Commission (WQCC) Regulations 20.6.2.3104 - 20.6.2.3114 NMAC, the Oil Conservation Division (OCD) hereby approves the discharge permit for **Navajo Refining Company - Artesia Refinery**. Attached are two copies of the discharge permit. Please sign and return one copy to Oil Conservation Division's Santa Fe Office within 45 days of receipt of this letter including permit fees. Checks should be made payable to the "**New Mexico Water Quality Management Fund,**" and <u>not</u> the Oil Conservation Division.

Please be advised that approval of this discharge permit does not relieve Navajo of responsibility if operations result in pollution of surface water, ground water, or the environment. Nor does approval of the discharge permit relieve Navajo of its responsibility to comply with any other applicable governmental authority's rules and regulations.

If you have any questions, please contact Carl Chavez of my staff at (505-476-3490) or E-mail: <u>CarlJ.Chavez@state.nm.us</u>. On behalf of the staff of the OCD, I wish to thank you and your

Mr. Johnny Lackey Page 2

staff for your cooperation during this discharge permit review.

Sincerely,

- Bag <

Jami Bailey Director

JB/cjc

DISCHARGE PERMIT GW-028

1. GENERAL PROVISIONS:

A. PERMITTEE AND PERMITTED FACILITY: The Oil Conservation Division (OCD) of the Energy, Minerals and Natural Resources Department issues Discharge Permit GW-028 (Discharge Permit) to Navajo Refining Company (Owner/Operator) located at 501 E. Main, Artesia, New Mexico 88210, to operate the Artesia Refinery (Facility) located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, including the abatement of ground water and vadose zone contamination. The refinery is located northeast of the intersection of Hwy. 285 and Hwy. 82, in Artesia, New Mexico.

The Facility provides oil and gas refining. The Facility refines and processes up to 40,000 barrels per day of crude oil and other feed stocks. Ground water that may be affected by a spill, leak, or accidental discharge occurs at a depth of approximately 25 feet below ground surface with a total dissolved solids concentration of approximately 2,500 mg/L.

B. SCOPE OF PERMIT: OCD has been granted authority to administer the Water Quality Act (Chapter 74, Article 6 NMSA 1978) as it applies to refineries by statute and by delegation from the Water Quality Control Commission pursuant to Section 74-6-4(E) NMSA 1978.

The Water Quality Act and the rules issued under that Act protect ground water and surface water of the State of New Mexico by providing that, unless otherwise allowed by rule, no person shall cause or allow effluent or leachate to discharge so that it may move directly or indirectly into ground water unless such discharge is pursuant to an approved discharge permit (see WQCC Regulations: 20.6.2.3104 NMAC and 20.6.2.3106 NMAC).

This Discharge Permit does not authorize any treatment of, or on-site disposal of, any materials, product, by-product, or oil field waste including, but not limited to, the on-site disposal of lube oil, glycol, antifreeze, filters, elemental sulfur, washdown water, contaminated soil, and cooling tower blowdown water.

This Discharge Permit does not convey any property rights of any sort nor any exclusive privilege, and does not authorize any injury to persons or property, any invasion of other private rights, or any infringement of state, federal, or local laws, rules or regulations.

The Owner/Operator shall operate in accordance with the Discharge Permit conditions to comply with the Water Quality Act and the rules issued pursuant to that Act, so that neither a hazard to public health nor undue risk to property will result (see 20.6.2.3109C NMAC); so that no discharge will cause or may cause any stream standard to be violated (see 20.6.2.3109H(2) NMAC); so that no discharge of any water contaminant will result in a hazard to public health, (see 20.6.2.3109H(3) NMAC); and so that the numerical standards specified of 20.6.2.3103 NMAC are not exceeded.

The Owner/Operator shall not allow or cause water pollution, discharge, or release of any water contaminant that exceeds the Water Quality Control Commission (WQCC) standards specified at 20.6.2.3101 NMAC and 20.6.2.3103 NMAC or 20.6.4 NMAC (Water Quality Standards for Interstate and Intrastate Streams).

C. **DISCHARGE PERMIT CONDITIONS:** By signing this Discharge Permit, the Owner/Operator agrees to the specific provisions set out in this document, and the commitments made in the approved Discharge Permit Application and the attachments to that application, which are incorporated into the Discharge Permit by reference.

This Discharge Permit is a permit renewal that replaces the permit being renewed. Replacement of a prior permit does not relieve the Owner/Operator of its responsibility to comply with the terms of that prior permit while that permit was in effect.

D. DEFINITIONS: Terms not specifically defined in this Discharge Permit shall have the same meanings as those in the Water Quality Act or the rules adopted pursuant to the Act, as the context requires.

E. FILING FEES AND PERMIT FEES: Pursuant to 20.6.2.3114 NMAC, every facility that submits a discharge permit application for initial approval or renewal shall pay the permit fees specified in Table 1 and the filing fee specified in Table 2 of 20.6.2.3114 NMAC. OCD has already received the required \$100.00 filing fee for this application. The flat fee for the abatement of Ground Water and Vadose Zone Contamination is \$2,600.00. The Owner/Operator shall submit this amount along with the signed Discharge Permit. Checks should be payable to the **"New Mexico Water Quality Management Fund,"** and <u>not</u> the Oil Conservation Division.

F. EFFECTIVE DATE, EXPIRATION, RENEWAL CONDITIONS, AND PENALTIES FOR OPERATING WITHOUT A DISCHARGE PERMIT: This Discharge Permit is effective when the Division's Environmental Bureau receives the signed Discharge Permit from the Owner/Operator and the \$2,600.00 fee or until the permit is terminated. This Discharge Permit will expire on October 21, 2016. The Owner/Operator shall submit an application for renewal no later than 120 calendar days before that expiration date, pursuant to 20.6.2.3106F NMAC. If an Owner/Operator submits a renewal application at least 120 calendar days before the Discharge Permit expires and is in compliance with the approved Discharge Permit, then the existing Discharge Permit will not expire until OCD has approved or disapproved the renewal application. Operating with an expired Discharge Permit may subject the Owner/Operator to civil and/or criminal penalties. See Section 74-6-10.1 NMSA 1978 and Section 74-6-10.2 NMSA 1978.

G. MODIFICATIONS: The Owner/Operator shall notify the Division's Environmental Bureau of any Facility expansion, production increase, or process modification that would result in any significant modification in the discharge of water contaminants (see 20.6.2.3107C NMAC). The Division's Environmental Bureau may require the Owner/Operator to submit a permit modification pursuant to 20.6.2.3109E NMAC and may modify or terminate a permit pursuant to Section 74-6-5(M) through (N) NMSA 1978.

H. TRANSFER OF DISCHARGE PERMIT: Prior to any transfer of ownership, control, or possession (whether by lease, conveyance or otherwise) of the Facility, the transferor shall notify the transferee in writing of the existence of the Discharge Permit, and shall deliver or send by certified mail to the Division's Environmental Bureau a copy of such written notification, together with a certification or other proof that such notification has been received by the transferee pursuant to 20.6.2.3111 NMAC. Upon receipt of such notification, the transferee shall inquire into all of the provisions and requirements contained in the Discharge Permit, and the transferee shall be charged with notice of all such provisions and requirements as they appear of record in the Division's file or files concerning the Discharge Permit. Upon assuming either ownership or possession of the Facility the transferee shall have the same rights and responsibilities under the Discharge Permit as were applicable to the transferor (see 20.6.2.3111 NMAC).

Transfer of the ownership, control, or possession of the Facility does not relieve the transferor of responsibility or liability for any act or omission which occurred while the transferor owned, controlled, or was in possession of the Facility (see 20.6.2.3111(E) NMAC).

I. CLOSURE PLAN AND FINANCIAL ASSURANCE: The Owner/Operator shall notify the Division's Environmental Bureau in writing when any operations of its Facility are to be discontinued for a period in excess of six months. Upon review of the Owner/Operator's notice, the Division's Environmental Bureau will determine whether to modify this permit, pursuant to 20.6.2.3107 NMAC and 20.6.2.3109E NMAC, to require the Owner/Operator to submit a closure plan and/or post-closure plan, including financial assurance.

J. COMPLIANCE AND ENFORCEMENT: If the Owner/Operator violates or is violating a condition of this Discharge Permit, the Division's Environmental Bureau may issue a compliance order requiring compliance immediately or within a specified time period, suspending or terminating this Discharge Permit, and/or assessing a civil penalty. See Section 74-6-10 NMSA 1978. The Division's Environmental Bureau may also commence a civil action in district court for appropriate relief, including injunctive relief. See Section 74-6-10(A)(2) NMSA 1978 and Section 74-6-11 NMSA 1978. The Owner/Operator may be subject to criminal penalties for discharging a water contaminant without a discharge permit or in violation of a condition of a discharge permit; making any false material statement, representation, certification or omission of material fact in an application, record, report, plan or other document filed, submitted or required to be maintained under the Water Quality Act; falsifying, tampering with or rendering inaccurate any monitoring device, method or record required to be maintained under the Water Quality Act; falsifying, tampering with or rendering inaccurate any monitor, sample or report as required by a permit issued pursuant to a state or federal law or regulation. See Section 74-6-10.2 NMSA 1978.

2. GENERAL FACILITY OPERATIONS:

A. OPERATIONAL MONITORING: The Owner/Operator shall comply with its approved monitoring programs pursuant to 20.6.2.3107 NMAC.

1. **Ground Water Monitoring System:** The Owner/Operator shall monitor and abate ground water in accordance with the Facility-Wide Ground Water Monitoring Plan

(FWGWMP) to address OCD ground water monitoring and reporting requirements. However, surface discharges are handled under this permit by OCD specifically, unless hazardous constituents of concern are identified, which require NMED involvement. The Owner/Operator shall monitor for all of the constituents listed in 20.6.2.3103 NMAC following the procedures specified in the FWGWMP and/or as directed by OCD. Proposed changes to the FWGWMP shall be submitted annually to OCD during the month of March.

B. POST-CLOSURE MONITORING: The Owner/Operator shall comply with its approved post-closure monitoring program pursuant 20.6.2.3107 NMAC (Continuation of monitoring after cessation of operations).

C. CONTINGENCY PLANS: The Owner/Operator shall implement its approved Contingency Plans to cope with failure of the Discharge Permit or system in accordance with Permit Conditions 2.F and 2.G.

D. CLOSURE PLAN: After completing abatement of all ground water and vadose contamination required under Permit Condition 2.G, the Owner/Operator shall perform the following closure measures:

1. Remove or plug all lines leading to and from any extraction or recovery wells and any injection wells so that a discharge can no longer occur.

2. Remove all remediation system components from the site, if applicable.

3. After receiving notification from the Division's Environmental Bureau that postclosure monitoring may cease, the Owner/Operator shall plug and abandon the monitoring well(s).

E. RECORD KEEPING: The Owner/Operator shall maintain records of all inspections required by this Discharge Permit at its Facility office for a minimum of five years and shall make those records available for inspection by the Division's Environmental Bureau.

F. RELEASE REPORTING: The Owner/Operator shall comply with the following permit conditions, pursuant to 20.6.2.1203 NMAC, and submittal of an OCD C-141 to report releases, if it determines that a release of oil or other water contaminant, in such quantity as may with reasonable probability injure or be detrimental to human health, animal or plant life, or property, or unreasonably interfere with the public welfare or the use of property, has occurred. The Owner/Operator shall report unauthorized releases of water contaminants in accordance with any additional commitments made in its approved Contingency Plan. If the Owner/Operator determines that any constituent exceeds the standards specified at 20.6.2.3103 NMAC, then it shall report a release to the Division's Environmental Bureau.

1. Oral Notification: As soon as possible after learning of such a discharge, but in no event more than twenty-four (24) hours thereafter, the Owner/Operator shall notify the Division's Environmental Bureau. The Owner/Operator shall provide the following:

• the name, address, and telephone number of the person or persons in charge of the facility, as well as of the Owner/Operator of the facility;

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- the name and location of the facility;
- the date, time, location, and duration of the discharge;
- the source and cause of discharge;
- a description of the discharge, including its chemical composition;
- the estimated volume of the discharge; and,
- any corrective or abatement actions taken to mitigate immediate environmental damage from the discharge.

2. Written Notification: Within one week after the Owner/Operator has discovered a discharge, the Owner/Operator shall send written notification (may use a C-141 form with attachments) to the Division's Environmental Bureau verifying the prior oral notification as to each of the foregoing items and providing any appropriate additions or corrections to the information contained in the prior oral notification.

G. ABATEMENT PLAN: Pursuant to 20.6.2.4105A(6) NMAC, an Owner/Operator is exempt from the requirement to obtain and implement an Abatement Plan, as required in 20.6.2.4104 NMAC. However, an Owner/Operator's Discharge Permit must address abatement of contaminated ground water and be consistent with the requirements and provisions of Sections 20.6.2.4101, 20.6.2.4103, Subsections C and E of Section 20.6.2.4106, Sections 20.6.2.4107 and 20.6.2.4112 NMAC.

1. **Purpose of Abatement Plan:** The Owner/Operator shall abate polluted ground water so as to either remediate or protect the ground water for use as domestic and agricultural water supply.

2. Abatement Standards and Requirements: The Owner/Operator shall abate the vadose zone so that water contaminants in the vadose zone shall not contaminate ground water or surface water through leaching, percolation or as the water table elevation fluctuates. The Owner/Operator, where the Total Dissolved Solids concentration is 10,000 mg/L or less, shall abate contaminated ground water so that toxic pollutant(s), as defined in 20.6.2.7WW NMAC, shall not be present and so that the standards of 20.6.2.3103 NMAC shall be met.

3. Stage 1 Abatement Plan: The Owner/Operator shall continue to implement its approved Stage 1 Abatement and monitoring consistent with the Facility-Wide Ground Water Monitoring Plan (FWGWMP). Pursuant to 20.6.2.4106C NMAC, the purpose of a Stage 1 Abatement Plan is to design and conduct a site investigation that will adequately define site conditions, and provide the data necessary to select and design an effective abatement option.

4. Stage 2 Abatement Plan: The Owner/Operator shall continue to implement its approved Stage 2 Abatement and monitoring consistent with the FWGWMP. OCD will allow the Owner/Operator to abate pollution under this provision for good cause. Pursuant to 20.6.2.4106E NMAC, the purpose of the Stage 2 Abatement Plan is for the Owner/Operator to select and design, if necessary, an abatement option that, when implemented, will result in attainment of the abatement standards and requirements set forth in Section 20.6.2.4103 NMAC, including post-closure maintenance activities.

5. Completion and Termination: Pursuant to 20.6.2.4112 NMAC, abatement shall be considered complete when the standards and requirements specified in 20.6.2.4103 NMAC are met. At that time, the Owner/Operator shall submit an abatement completion report, documenting compliance with the standards and requirements set forth in 20.6.2.4103 NMAC and this Discharge Permit, to Division's Environmental Bureau for approval. The abatement completion report also shall propose any changes to long term monitoring and site maintenance activities, if needed, to be performed after termination of the abatement plan.

H. OTHER REQUIREMENTS:

1. Effluent Monitoring System: The Owner/Operator shall by 36 months after issuance of this permit prevent the discharge(s) of reverse osmosis reject fluids (~ 8,200 bbl/day) and/or any other waste water effluent discharge(s) to the environment (*i.e.*, farm fields, land surface, etc.) unless treated to background and/or WQQC water quality standards before discharge. Toxic pollutant(s) as defined in Section 20.6.2.7(WW) NMAC and in excess of standards for ground water in Section 20.6.2.3103 NMAC shall not move directly or indirectly into the vadose zone to cause degradation of the ground water beyond these limitations. If the existing concentration of any water contaminant in "background" ground water exceeds regulatory limits, no degradation of the ground water beyond the greater of "background" and/or regulatory limit shall be allowed. A Statistical 95% Upper Confidence Limit (UCL) analysis from upgradient "UG" designated monitor wells with a minimum sample event population size of 9 shall be required to propose background limits under this section. Note that this section shall apply to OCD WQCC requirements, unless hazardous constituents of concern are discovered that shall require reporting to applicable state and/or federal agencies.

a. Within 90 days, with extension for good cause shown, of permit issuance, the operator shall submit a remediation and/or abatement (See Permit Condition 2.G) plan (plan) for OCD approval with project schedule to address the discharge of reverse osmosis reject water and/or any other discharges to the farm fields where WQCC exceedances of chloride, fluoride, sulfate, nitrate and TDS have been documented from historical analytical laboratory data. The plan shall include a minimum of 3 monitoring wells per farm field where the reverse osmosis reject water has been discharged to investigate the potential contamination of the vadose zone and ground water (See Attachment 1- Table 1) within these areas. The Annual Report (See Permit Condition 2.I.5) shall include "iso-concentration" contour maps of the above constituents and any other chemicals of concern identified during the field work on the above MWs and any nearby existing MWs included from the Facility-Wide Ground Water Monitoring Plan (FWGWMP) and annual reports.

b. After the date of permit issuance, the Owner/Operator shall begin sampling and/or monitoring background monitor wells (MWs with "UG" designation) monthly for nine (9) consecutive months for the specified constituents and complete the Statistical 95% Upper Confidence Limit (UCL) analysis to propose any "background" limit(s) for this section. The proposed limit(s) shall be submitted to OCD for approval within or before one year of permit issuance. If complete data sets exist prior to permit issuance, OCD may allow past sample events to be included, but a minimum statistical population size of nine (n => 9) is required for each background constituent proposed.

c. The environmental sampling and analytical laboratory data results shall meet OCD data quality objectives (DQOs) and quality assurance/quality control (QA/QC) standards, which are similar to those of the EPA. Environmental data sheets with all raw analytical laboratory data results with laboratory QA/QC shall be attached to the statistical report and include summary tables with statistical applications (If computer statistical software is used, please reference the software package and pertinent information) that form the basis for any proposed "background" limit(s).

2. **OCD Inspections:** OCD may place additional requirements on the facility and modify the permit conditions as needed based on OCD inspections.

3. Inspection and Entry: Pursuant to 20.6.2.4107A NMAC, the Owner/Operator shall allow the Division's Environmental Bureau, upon the presentation of proper credentials, to:

- enter the facility at reasonable times;
- inspect and copy records required by this discharge permit;
- inspect any treatment works, monitoring, and analytical equipment;
- sample any wastes, ground water, surface water, stream sediment, plants, animals, or vadose-zone material including vadose-zone vapor;
- use the Owner/Operator's monitoring systems and wells in order to collect samples; and,
- gain access to off-site property not owned or controlled by the Owner/Operator, but accessible to the Owner/Operator through a third-party access agreement, provided that it is allowed by the agreement.

4. Advance Notice: Pursuant to 20.6.2.4107B NMAC, the Owner/Operator shall provide the Division's Environmental Bureau with at least four (4) working days advance notice of any environmental sampling to be performed pursuant to this Discharge Permit, or any well plugging, abandonment or destruction at the Facility site.

5. Hydrostatic Testing: Pursuant to 20.6.2.3104 NMAC, no effluent or leachate shall discharge or be allowed to move directly or indirectly into ground water unless a discharge permit is issued by OCD. When a permit has been issued, discharges must be consistent with the terms and conditions of the permit.

6. Plugging and Abandonment: Pursuant to 20.6.2.4107C NMAC, the Owner/Operator shall propose to plug and abandon a monitor well by certified mail to the Division's Environmental Bureau for approval, unless such approval is required from the State Engineer. The proposed action shall be designed to prevent water pollution that could result from water contaminants migrating through the well or borehole. The proposed action shall not take place without written approval from the Division's Environmental Bureau, unless written approval or disapproval is not received by the Owner/Operator within thirty (30) days of the date of receipt of the proposal. I. ANNUAL REPORT: The Owner/Operator shall submit its annual report pursuant to 20.6.2.3107 NMAC to the Division's Environmental Bureau by April 15th of each year. The annual report shall include the following:

1. A summary of all major refinery activities or events including: a description of the monitoring and remediation activities, which occurred during the year with any conclusions and recommendations.

2. A summary of any new discoveries of ground water contamination with all leaks, spills and releases and corrective actions taken. Also include recommendations for investigation and abatement.

3. Summary tables listing laboratory analyses of all water samples for each monitoring point and plots of concentration vs. time for contaminants of concern from each monitoring point. Any WQCC 20.6.2.3103 NMAC constituent found to exceed the water quality standard shall be highlighted and noted in the annual report. The Owner/Operator shall include copies of the most recent year's laboratory analytical data sheets with QA/QC.

4. An annual water table (piezometric) and potentiometric elevation map per aquifer system(s) using the water table elevation(s) from associated monitor wells in each aquifer system(s). A corrected water table or head elevation shall be determined for all wells containing phase-separated hydrocarbons. This map shall show aquifer system well locations, pertinent site features, and the ground water flow direction with hydraulic gradient. Include plots of head elevation vs. time for each ground water monitoring well over time.

5. An annual non-aqueous phase liquid and/or product thickness map from ground water in all monitoring and recovery wells. This map shall include isopleths or iso-concentration contour lines for products and contaminants of concern detected within each aquifer system. In addition, an iso-concentration map depicting chloride, fluoride, sulfate, nitrate and TDS from MWs within the farmland areas and from existing MWs included in the Facility-Wide Ground Water Monitoring Plan (FWGWMP).

6. Summary of the volume and quality of non-aqueous phase liquid removed and the discharged treated ground water from the recovery wells during each quarter and the total recovered to date.

7. Results of ground water monitoring program with any recommendations based on contaminant hydrogeology. Include any recommended abatement or approved Contingency Plan.

8. Summary of all waste (See Attachment 2) and wastewater disposed of, sold, or treated on-site.

9. Electronic filing: Owner/Operator shall file this report in an acceptable electronic format with hard copy submittals to OCD.

3. CLASS V WELLS: Pursuant to 20.6.2.5002B NMAC, leach fields and other wastewater disposal systems at Division-regulated facilities that inject non-hazardous fluid into or above an underground source of drinking water are UIC Class V injection wells. This Discharge Permit does not authorize the use of a Class V injection well for the disposal of industrial waste at the Facility, except for the disposal of contaminated ground water. Pursuant to 20.6.2.5005 NMAC, the Owner/Operator shall close any Class V industrial waste injection wells at its Facility that inject non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes (*e.g.*, septic systems, leach fields, dry wells, *etc.*) other than contaminated ground water within 90 calendar days of the issuance of this Discharge Permit. The Owner/Operator shall document the closure of any Class V wells used for the disposal of non-hazardous industrial wastes or a mixture of industrial wastes or a mixture of industrial wastes or a mixture of non-hazardous industrial wastes and domestic wastes or a mixture of industrial wastes or a mixture of non-hazardous industrial wastes or a mixture of industrial wastes or a mixture of non-hazardous industrial wastes or a mixture of industrial wastes on a mixture of non-hazardous industrial wastes or a mixture of industrial wastes on a mixture of industrial wastes and domestic wastes other than contaminated ground water in its Annual Report.

Other Class V wells, including wells used only for the injection of domestic wastes, must be permitted by the New Mexico Environment Department.

4. SCHEDULE OF COMPLIANCE:

A. **PERMIT CERTIFICATION:** The Owner/Operator shall sign and return this Permit to the Division's Environmental Bureau within 45 days of its receipt of this Permit.

B. SUBMISSION OF THE PERMIT FEES: As specified in Permit Condition 1.F, the Owner/Operator shall submit the permit fee of \$2,600.00 along with the signed Discharge Permit within 30 days of the receipt of the Discharge Permit. Checks should be payable to the "New Mexico Water Quality Management Fund," not the Oil Conservation Division.

C. ANNUAL REPORT: As specified in Permit Condition 2.I, the Owner/Operator shall submit its annual report to the Division's Environmental Bureau by April 15th of each year.

5. CERTIFICATION: (OWNER/OPERATOR) by the officer whose signature appears below, acknowledges receipt of this Discharge Permit, and has reviewed its terms and conditions.

Company Name - print name

Company Representative - print name

Company Representative - Signature

Title:_____

Date: _____

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ATTACHMENT 1

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TABLE 1 NAVAJO ARTESIA REFINERY MONITORING SCHEDULE

Monitoring Well ID	Sampling Frequency	Field Sampling Water Quality Parameters	Analytical Suite	Approximate Well location
N RO Field MW-1 ^{1, 2}	Semi -annual	pH, SC, Temp, ORP, DO	20.6.2.3103(A)(B)(C) NMAC Constituents	TBD in Farm Field No. 1
N RO Field MW-2 ^{1, 2}				TBD in Farm Field No. 1
N RO Field MW-3 ^{1, 2}				TBD in Farm Field No. 1
S RO Field MW-4 ^{1, 2}				TBD in Farm Field No. 2
S RO Field MW-5 ^{1, 2}				TBD in Farm Field No. 2
S RO Field MW-6 ^{1, 2}				TBD in Farm Field No. 2
RO Reject Water ^{2, 3}				RO Reject Water End-of- Pipe to N & S Farm Fields

Acronym List

N = North; RO = Reverse Osmosis; S = South; TBD = to be determined

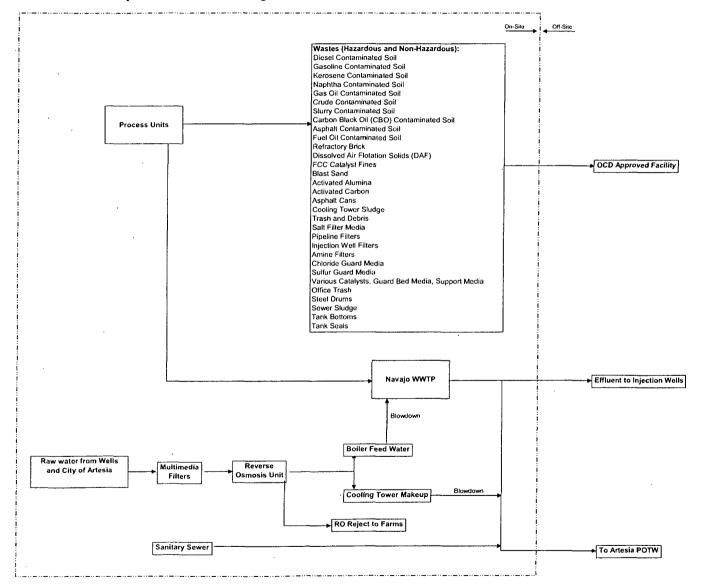
SC = specific conductance DO = dissolved oxygen ORP = oxygen reduction potential Temp = temperature;

¹= New OCD water and soil monitoring for WQCC 20.6.2.3103 NMAC standards for ground water in fields where RO reject water was discharged.
 ²= Semi-annual water monitoring event must be completed in accordance with the Facility-Wide Ground Water Monitoring Plan (FWGWMP).
 ³= Monthly effluent discharge locations (provide latitude(s) and longitude(s) for any point of discharge) with rates per source to land surface shall be maintained and reported in the Annual Report (Permit Condition 2.1.8).

Note: All water samples exhibiting oil sheen or non-aqueous phase liquids (NAPLs) must be checked at a minimum of once per month and recorded on a spreadsheet. The data must be presented in table form listing all of the monitor and or recovery wells, date inspected, product thickness measured to 0.01 of a foot, and if recovery wells are installed, the amount of product/water recovered. If NAPL are observed in a monitoring well of 0.5 ft or less, a passive recovery system may be installed, if 0.5 ft of PHS or greater is present, then an active recovery system must be installed to recover the PSHs using the best available technology and approved by OCD. This information must also be included in the discharge permit annual ground water report.

ATTACHMENT 2

Artesia Facility Water and Waste Handling



PDF created with FinePrint pdfFactory trial version <u>http://www.pdffactory.com</u>

Chavez, Carl J, EMNRD

From:	Lackey, Johnny [Johnny.Lackey@hollyfrontier.com]
Sent:	Monday, February 13, 2012 4:01 PM
То:	Chavez, Carl J, EMNRD
Cc:	Sanchez, Daniel J., EMNRD; VonGonten, Glenn, EMNRD; Swazo, Sonny, EMNRD; Bailey, Jami, EMNRD; McKee, Michael; Combs, Robert
Subject:	RE: December 14, 2011 Letter Returned to OCD
Attachments:	OCD Response Letter 12-14-2011.pdf; Artesia water and waste Process Flow Diagram.pdf

Carl.

Here are Navajo's responses to the attached letter that we received on January 13, 2012. Attached also, is an updated water waste stream Process flow diagram for the Artesia Refinery that should clarify how the various waste streams are disposed of. This should replace the existing Attachment 2 in the current Navajo Artesia permit (GW-028):

In response to item 1:

Please see the attachment. The process flow diagram has been revised to show the current waste streams and their associated destination. For the purpose of clarification, the feed to the Reverse Osmosis Unit has been included. The RO Unit is fed solely by well water (groundwater) and purchased water from the City of Artesia (groundwater) No waste streams, including process waste streams, are conveyed or processed in the RO Unit. In fact, there is no connection between any process waste streams and the RO unit. The RO unit is designed to simply remove the salts from the feed water for use as boiler feed water and cooling tower make-up water. The RO unit concentrates the salts into a smaller 'reject' water stream that is discharged.

In response to item 2:

The Waste Water Treatment Plant (WWTP) at the Navajo Refinery is designed to, and treats **ONLY** process waste water. Hazardous wastes are isolated, managed and disposed of off-site in accordance with applicable rules.

In response to item 3:

Please see the attachment. The process flow diagram has been revised to show the current waste streams and their associated destination. For the purpose of clarification, the feed to the Reverse Osmosis Unit has been included. Sanitary sewage <u>IS NOT</u> discharged as feed to the Navajo WWTP or disposed in our UIC Class I injection wells. The "sanitary sewer" waste stream from the refinery operation is discharged to the City of Artesia POTW.

Hopefully the Revised Water and Waste Process Flow Diagram (attached) for Navajo, will clear up questions on the disposition of the various waste streams generated at the refinery.

As explained previously, the discharge of RO reject water is currently authorized under the ground water discharge permit and renewal of that permit is appropriate under the Water Quality Control Commission's ground water regulations. The ground water affected by the discharge exceeded applicable ground water standards at the time the discharge began, and the discharge has not caused an increase in water contaminant concentrations. In fact, as the analyses submitted earlier demonstrated, water contaminant concentrations have gotten somewhat better over time. However, even though the continued discharge is permittable, Navajo has retained a consultant to evaluate options to either treat the RO Reject to meet State groundwater limits or develop an alternative disposal method for this discharge.

Based on the advice of the consultant, Navajo has determined that it will take at least **36 months** to design, procure, construct and implement a treatment and disposal project for this waste stream. Before Navajo commits capital and resources to accomplish this, we would like to meet with the OCD to discuss the agency's evaluation of the ground water impacts from the current discharge and any concerns or recommendations it may have on how to address this waste stream.

Thanks,

Johnny Lackey Sr. Environmental Manager The HollyFrontier Companies P.O. Box 159

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501 E. Main St. Artesia, NM 88211-0159 Office - 575-746-5490 Cell - 972-261-8075 Fax - 575-746-5451 Johnny.Lackey@hollyfrontier.com

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From: Chavez, Carl J, EMNRD [mailto:CarlJ.Chavez@state.nm.us]
Sent: Tuesday, January 10, 2012 4:18 PM
To: Lackey, Johnny; Moore, Darrell
Cc: Sanchez, Daniel J., EMNRD; VonGonten, Glenn, EMNRD; Swazo, Sonny, EMNRD
Subject: December 14, 2011 Letter Returned to OCD

Gentlemen:

Please find attached an OCD letter that was recently returned to the OCD due to an apparent address error. I will resend it tomorrow morning via postal service, but wanted you to have it in hand electronically too.

The OCD apologizes for any inconvenience this may have caused you. Please respond to the attached letter on or before COB Monday, February 13, 2012.

Please contact me if you have questions. Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: CarlJ.Chavez@state.nm.us Website: <u>http://www.emnrd.state.nm.us/ocd/</u> "Why not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward with the Rest of the Nation?" To see how, go to "Pollution Prevention & Waste Minimization" at: http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental)

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New Mexico Energy, Minerals and Natural Resources Department

Susana Martinez Governor

John H. Bemis Cabinet Secretary-Designate

Brett F. Woods, Ph.D. Deputy Cabinet Secretary Jami Bailey Division Director Oil Conservation Division



DECEMBER 14, 2011

Mr. Johnny Lackey Environmental Manager Navajo Refining Company, LLC 188 County Road 4900 Bloomfield, NM 87413

RE: REQUEST FOR ADDITIONAL INFORMATION

Dear Mr. Lackey:

The Oil Conservation Division (OCD) is in receipt of Navajo Refining Company, LLC's (Navajo) November 23, 2011 letter in which you responded to OCD's request for additional information of November 17, 2011. Thank you for responding so promptly. You began by correctly citing to 20.6.2.3109A NMAC which authorizes OCD to request additional information that it deems necessary for the evaluation of an application for a discharge permit. You offered Navajo's opinion that most of the information that OCD requested is either not necessary or has already been provided to OCD and declined to provide OCD with the requested information. While Navajo is certainly entitled to its own opinion about whether the information requested, pursuant to the Water Quality Control Commission (WOCC) Regulations, is necessary, it is OCD's opinion that most, but not all of the requested information is necessary. New Mexico Courts routinely hold that regulatory agencies have the authority to interpret the regulations that they are responsible for enforcing and give deference to an agency's interpretation of its own regulations. If Navajo does not provide OCD with the required information that OCD has determined that it needs to evaluate Navajo's discharge permit renewal application, then Navajo runs the risk of being subject to enforcement action, something that neither OCD nor Navajo wishes to occur.

OCD requested specific information in its letter of November 17, 2011, because OCD must understand the volumes of waste water that Navajo generates and how the various waste water streams are treated and disposed of. This information is necessary for OCD to consider when deciding what discharges Navajo will be permitted under its WQCC discharge permit. Please note that the discharge permit for Navajo's UIC Class I injection wells is also a WQCC discharge permit.

OCD has reviewed its information request and has determined that the following information is necessary and Navajo must provide it to OCD pursuant to 20.6.2.3109A NMAC. OCD is

Mr. Lackey Page 2 of 2

primarily concerned with the quality and volume of the waste water that Navajo discharges to its "farm" and to its UIC Class I injection wells. Navajo's failure to provide OCD with this information in a timely manner may result in OCD taking appropriate enforcement action. Please note that Navajo must submit the requested information again, even if it is already part of the administrative record.

1. Please provide additional information on Navajo's waste streams (see Attachment 2 to Navajo's draft discharge permit). Please specify whether the water sent to the Reverse Osmosis Unit is commingled with any waste water streams and, if so, provide an revised diagram depicting that.

2. Please confirm that hazardous waste is not treated in Navajo's "Waste Water Treater" nor discharged to either Navajo's farms or UIC Class I wells.

3. Attachment 2 to Navajo's draft discharge permit indicates that Navajo is discharging "sanitary sewer" water (domestic liquid waste) to both of its UIC Class I injection wells and the City of Artesia's POTW. Please either confirm that this diagram is correct or, if it is not current, submit a revised diagram.

What OCD must understand before renewing Navajo's discharge permit is the quality and volume of the waste water (*waste* as defined at 20.6.2.7 NMAC) that it treats in its waste water treatment facility, and reverse osmosis unit, and/or disposes of in its Class I injection wells and its "farms."

As we have previously discussed, OCD will no longer permit Navajo to discharge reverse osmosis reject water to its "farms." Please propose a time schedule by which Navajo will cease discharging reverse osmosis reject water to its "farms" and will obtain a replacement method or process for handling its waste water. Please provide the requested information by January 13, 2012.

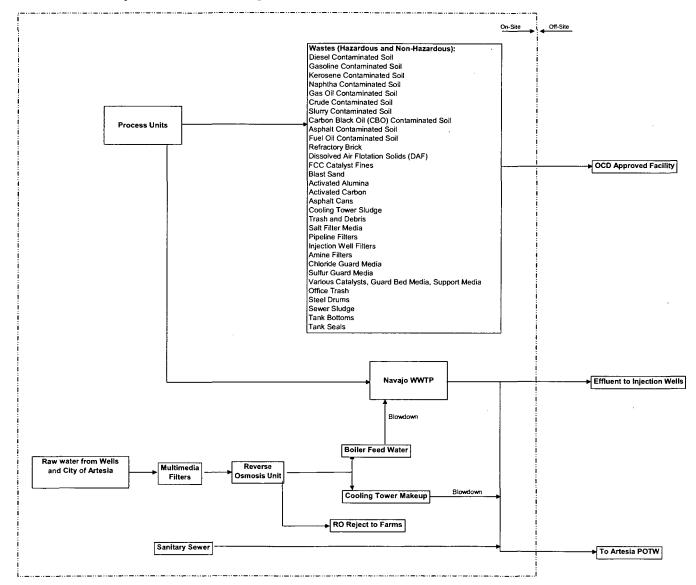
Sincerely,

Z-Jami Bailey

Director

JB/gvg

Cc: Daniel Sanchez, OCD Carl Chavez, OCD Sonny Swazo, OCD Artesia Facility Water and Waste Handling



PDF created with FinePrint pdfFactory trial version http://www.pdffactory.com

Chavez, Carl J, EMNRD

From: Sent: To: Cc: Subject: Attachments: Moore, Darrell [Darrell.Moore@hollyfrontier.com] Tuesday, November 01, 2011 1:48 PM Chavez, Carl J, EMNRD Lackey, Johnny Public Notice Affidavits Affidavit.pdf; Affidavit.pdf

Carl

Attached are the public notices and the signed affidavits for both of our Discharge Permits. The Artesia DP (GW-28) was published in the Artesia Daily Press on October 9, 2011 in both English and Spanish. The Lovington DP (GW-14) was published in the Lovington Leader on October 8, 2011 in both english and spanish.

Darrell Moore

Environmental Manager for Water and Waste The Holly Frontier Companies Navajo Refining Company, LLC 501 E Main PO Box 159 Artesia NM 88211-0159 Phone: 575-746-5281 Cell: 575-703-5058

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Affidavit of Publication	Copy of Publication:
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County of Eddy:	
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circulation, published in English at Artesia, said county	
and state, and that the hereto attached	
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was published in a regular and entire issue of the said	
Artesia Daily Press, a daily newspaper duly qualified	
for that purpose within the meaning of Chapter 167 of	
the 1937 Session Laws of the state of New Mexico for	
1 Consecutive weeks/days on the same	
day as follows:	
First Publication October 9, 2011	EVOCO 0.6.2.3 (NAMELAN COLOCIO 0.6.2.3 (NAMELAN COLOCIO 0.6.3
Second Publication	
Third Publication	
Fourth Publication	
Fifth Publication	
Subscribed and sworn to before me this	
11th day of October 2011	
OFFICIAL SEAL	
Latisha Romine NOTARY PUBLIC-STATE OF NEW MEXICO	
My commission expires: 5/12/2015	
Hatesho Romine	
10th Latisha Romine Notary Public, Eddy County, New Mexico	

Affidavit of Publication	Copy of Publication:
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STATE OF NEW MEXICO	
County of Eddy:	
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being duly sworn, says that he is the Publisher	
of the Artesia Daily Press, a daily newspaper of general	
circulation, published in English at Artesia, said county	
and state, and that the hereto attached	
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Artesia Daily Press, a daily newspaper duly qualified	
for that purpose within the meaning of Chapter 167 of	
the 1937 Session Laws of the state of New Mexico for	
1 Consecutive weeks/days on the same	
day as follows:	
First Publication October 9, 2011	
Second Publication	A Contract of the second secon
Third Publication	
Fourth Publication	* 25 8 * 13 **********
Fifth Publication	
Subscribed and sworn to before me this	
11th day of 2011	
OFFICIAL SEAL	
Latisha Romine NOTARY PUBLIC-STATE OF NEW MEXICO	
My commission expires: <u>5/12/2</u> 015	
Kata Raman	
10th Latisha Romine	
Notary Public, Eddy County, New Mexico	

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Energy, Minerals and Natural Resources Department New N exico

Jami Bailey

Division Director Oil Conservation Division

Susana Martinez Governor

John H. Bemis Cabinet Secretary-Designate

Brett F. Woods, Ph.D. Deputy Cabinet Secretary

May 12, 2011

Oil & Gas Facilities Questionnaire for Determination of a WQCC Discharge Permit

Only Water Quality Control Commission- regulated systems will be incorporated into the OCD's WQCC Permits, while OCD regulated systems will be handled under separate permit(s). A current discharge permit is valid until its normal expiration date or November 15, 2012, whichever is later. All facilities with processes subject to the Water Quality Act must have permits in place by November 16, 2012. H2S Contingency Plans; pits, ponds, above and/or below-grade tanks; waste treatment, storage and disposal; and landfarms and landfills may require separate permitting under the OCD Oil, Gas, and Geothermal regulations.

Proper completion and timely submission of this questionnaire is requested for all facilities with discharge permit expiration dates before November 15, 2012. Please complete and submit a separate questionnaire for each facility before July 15, 2011.

Name of the owner or operator of the facility

Navajo Refining Company, LLC

• Point of contact Name_Darrell Moore Telephone_575-746-5281 Email_darrell.moore@hollycorr Mailing address PO Box 159 Artes1a, NM 8821		
• Facility nameNavajo Refining	······	
• Facility location Unit Letter, Section, Township, Rang Street address (if any) 501 E. Mai Artes1a, N	in .	· · · · · · · · · · · · · · · · · · ·
• Facility type X Refinery Crude Oil Pump Static Geothermal Other (describe)	Gas Plant Dn Injection Well Abatement	Compressor
Current and Past Operations (please Impoundments Disposal Well	e check all that apply) X Treatment Plant Brine Well	☐ Waterflood ☐ Wash Bay
	ivision * 1220 South St. Francis a Fe, New Mexico 87505 (505) 476-3462* <u>http://www.e</u>	



Oil & Gas Facilities Inventory Questionnaire May 12, 2011 Page 2 of 3
Steam Cleaning Groundwater Remediation
• Facility Status
• Does this facility currently have a discharge permit? Yes
If so, what is the permit number? <u>GW-028</u>
 Are there any routine activities at the facility which intentionally result in materials other than potable water being released either onto the ground or directly into surface or ground water? (This includes process activities, equipment maintenance, or the cleanup of historic spills.) Xes No
If so, describe those activities including the materials involved, the frequency of discharge, and the estimated volume per discharge event. <u>There are numerous hydrocarbn plumes beneath the facility that are being</u> addressed by both OCD and NMED.
 What is the depth below surface to shallowest ground water in the area? 10-15 ft. Are there any water supply, groundwater monitoring, or recovery wells at the facility? Water supply A Monitoring A Recovery A
If these wells are registered with the Office of the State Engineer (OSE), what are the OSE well numbers? RA-768, RA-1892, RA-1097, RA-3832
Are abatement actions ongoing? Yes
• Are there any active or inactive UIC wells present as part of the federal Underground Injection Control program associated with this facility?
If so, what are the API numbers assigned to those wells? <u>30-015-27592, 30-015-20894, 30-015-26575 Permitted separately under</u> <u>UIC programs.offsite.</u>
Are there any sumps at the facility? X Yes No Number of sumps with volume less than 500 gallons 57 Use and contents Various incl. chemical, water, oily, sludge Is secondary containment incorporated into the design? Yes No Number of sumps with volume greater than 500 gallons 0 Use and contents Water draw Is secondary containment incorporated into the design? Yes No

•

Oil & Gas Facilities Inventory Questionnaire May 12, 2011 Page 3 of 3

• Does the facility incorporate any underground lines other than electrical conduits, freshwater, natural gas for heating, or sanitary sewers? X Yes No If so, what do those buried lines contain?

Various; incl. products, sewer water, process fluids.

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THIS FORM IS DUE TO THE OIL CONSERVATION DIVISION BY JULY 15, 2011.

Questions? Please contact Glenn VonGonten at 505-476-3488 or Carl Chavez at 505-476-3490.

Thank you for your cooperation.

JAMI BAILEY Director

Chavez, Carl J, EMNRD

From:Chavez, Carl J, EMNRDSent:Tuesday, January 10, 2012 4:18 PMTo:Lackey, Johnny; 'Moore, Darrell'Cc:Sanchez, Daniel J., EMNRD; VonGonten, Glenn, EMNRD; Swazo, Sonny, EMNRDSubject:December 14, 2011 Letter Returned to OCDAttachments:OCD Response Letter 12-14-2011.pdf

Gentlemen:

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The OCD apologizes for any inconvenience this may have caused you. Please respond to the attached letter on or before COB Monday, February 13, 2012.

Please contact me if you have questions. Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: CarlJ.Chavez@state.nm.us Website: <u>http://www.emnrd.state.nm.us/ocd/</u> "Why not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward with the Rest of the Nation?" To see how, go to "Pollution Prevention & Waste Minimization" at:

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http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental)

New Mexico Energy, Minerals and Natural Resources Department

Susana Martinez Governor

John H. Bemis Cabinet Secretary-Designate

Brett F. Woods, Ph.D. Deputy Cabinet Secretary Jami Bailey Division Director Oil Conservation Division



DECEMBER 14, 2011

Mr. Johnny Lackey Environmental Manager Navajo Refining Company, LLC 188 County Road 4900 Bloomfield, NM 87413

RE: REQUEST FOR ADDITIONAL INFORMATION

Dear Mr. Lackey:

The Oil Conservation Division (OCD) is in receipt of Navajo Refining Company, LLC's (Navajo) November 23, 2011 letter in which you responded to OCD's request for additional information of November 17, 2011. Thank you for responding so promptly. You began by correctly citing to 20.6.2.3109A NMAC which authorizes OCD to request additional information that it deems necessary for the evaluation of an application for a discharge permit. You offered Navajo's opinion that most of the information that OCD requested is either not necessary or has already been provided to OCD and declined to provide OCD with the requested information. While Navajo is certainly entitled to its own opinion about whether the information requested, pursuant to the Water Quality Control Commission (WQCC) Regulations, is necessary, it is OCD's opinion that most, but not all of the requested information is necessary. New Mexico Courts routinely hold that regulatory agencies have the authority to interpret the regulations that they are responsible for enforcing and give deference to an agency's interpretation of its own regulations. If Navajo does not provide OCD with the required information that OCD has determined that it needs to evaluate Navajo's discharge permit renewal application, then Navajo runs the risk of being subject to enforcement action, something that neither OCD nor Navajo wishes to occur.

OCD requested specific information in its letter of November 17, 2011, because OCD must understand the volumes of waste water that Navajo generates and how the various waste water streams are treated and disposed of. This information is necessary for OCD to consider when deciding what discharges Navajo will be permitted under its WQCC discharge permit. Please note that the discharge permit for Navajo's UIC Class I injection wells is also a WQCC discharge permit.

OCD has reviewed its information request and has determined that the following information is necessary and Navajo must provide it to OCD pursuant to 20.6.2.3109A NMAC. OCD is

Mr. Lackey Page 2 of 2

primarily concerned with the quality and volume of the waste water that Navajo discharges to its "farm" and to its UIC Class I injection wells. Navajo's failure to provide OCD with this information in a timely manner may result in OCD taking appropriate enforcement action. Please note that Navajo must submit the requested information again, even if it is already part of the administrative record.

1. Please provide additional information on Navajo's waste streams (see Attachment 2 to Navajo's draft discharge permit). Please specify whether the water sent to the Reverse Osmosis Unit is commingled with any waste water streams and, if so, provide an revised diagram depicting that.

2. Please confirm that hazardous waste is not treated in Navajo's "Waste Water Treater" nor discharged to either Navajo's farms or UIC Class I wells.

3. Attachment 2 to Navajo's draft discharge permit indicates that Navajo is discharging "sanitary sewer" water (domestic liquid waste) to both of its UIC Class I injection wells and the City of Artesia's POTW. Please either confirm that this diagram is correct or, if it is not current, submit a revised diagram.

What OCD must understand before renewing Navajo's discharge permit is the quality and volume of the waste water (*waste* as defined at 20.6.2.7 NMAC) that it treats in its waste water treatment facility, and reverse osmosis unit, and/or disposes of in its Class I injection wells and its "farms."

As we have previously discussed, OCD will no longer permit Navajo to discharge reverse osmosis reject water to its "farms." Please propose a time schedule by which Navajo will cease discharging reverse osmosis reject water to its "farms" and will obtain a replacement method or process for handling its waste water. Please provide the requested information by January 13, 2012.

Sincerely,

-Jami Bailey Director

JB/gvg

Cc: Daniel Sanchez, OCD Carl Chavez, OCD Sonny Swazo, OCD New Mexico Energy, Minerals and Natural Resources Department

Susana Martinez Governor

John H. Bemis Cabinet Secretary-Designate

Brett F. Woods, Ph.D. Deputy Cabinet Secretary Jami Bailey Division Director Oil Conservation Division



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Sincerely,

Jami Bailev

Jami Bailey Director

JB/gvg

Cc: Daniel Sanchez, OCD Carl Chavez, OCD Sonny Swazo, OCD



NEW MEXICO ENVIRONMENT DEPARTMENT

Ground Water Quality Bureau

SUSANA MARTINEZ Governor

JOHN A. SANCHEZ Lieutenant Governor Harold Runnels Building 1190 St. Francis Drive P.O. Box 5469, Santa Fe, NM 87502-5469 Phone (505) 827-2918 Fax (505) 827-2965 www.nmeny.state.nm.us



DAVE MARTIN Secretary

BUTCH TONGATE Deputy Secretary

CERTIFIED MAIL – RETURN RECEIPT REQUESTED

November 30, 2011

Robert E. Forrest, Infrastructure Director City of Artesia 1702 N. Haldeman Road Artesia, NM 88210

RE: Request For Information Concerning Navajo Refinery Discharges To The City Of Artesia Municipal Wastewater Treatment Facility, DP-258

Dear Mr. Forrest,

The New Mexico Environment Department (NMED) Ground Water Quality Bureau (GWQB) issued Discharge Permit DP-258 on July 29, 2010 to the City of Artesia pursuant to the New Mexico Water Quality Act (WQA), NMSA 1978 §§74-6-1 through 74-6-17, and the New Mexico Water Quality Control Commission (WQCC) Regulations (copy previously provided), 20.6.2 NMAC. DP-258 authorizes the City of Artesia to discharge up to 3.0 million gallons per day (MGD) of municipal wastewater to the City's wastewater treatment facility (WWTF), and reuse the treated wastewater (reclaimed wastewater) for irrigation of various parks, athletic fields, schools, etc. throughout the City. The City is also authorized to discharge treated wastewater to Pecos River pursuant to National Pollutant Discharge Elimination System (NPDES) permit NM0022268, issued by the United States Environmental Protection Agency (USEPA).

Information available to NMED indicates that the WWTF is currently receiving industrial cooling tower blow-down wastewater from the nearby Navajo Refinery, and that there may be plans to accept significantly more wastewater from the refinery in the near future. Please be advised that the Discharge Permit application (received December 2, 2009) describes the source of wastewater as domestic residential and some commercial business. Introducing significant amounts of industrial wastewater (such as Navajo Refinery blowdown or process wastewater) to the WWTF may violate the terms of DP-258 unless a modification of the Discharge Permit is authorized by NMED. Until more is understood about the nature of the discharge(s) from the Navajo Refinery, it is unclear whether or not the chemical/biological process of the City's

Robert Forrest, DP-258 November 30, 2011 Page 2

WWTF will be adversely affected or if a threat to ground water quality will result. This may also introduce jurisdictional issues between NMED and the Oil Conservation Division (OCD), which normally regulates discharges related to petroleum production and refining.

NMED is requesting clarification, including supporting documentation, regarding the current influent volume, character, and source of any industrial discharges from Navajo Refinery to the WWTF. NMED also requests information regarding any future plans to increase the volume of industrial wastewater from the Navajo Refinery discharged to the WWTF, or potential changes to the character or quality of the discharge to the WWTF.

Please submit the requested information by December 30, 2011. Your cooperation is appreciated. If you have any questions, you may reach me at (505) 827-2936.

Sincerely,

Vaomi Dava

Naomi Davidson Geoscientist Ground Water Pollution Prevention Section

RECEIVED OCD

2011 NOV 29 P 12: 49

cc: Steven Baumgard, NMED-SWQB
 Rich Powell, NMED-SWQB
 Carl Chavez, ENMRD-OCD
 Roy Robinson, Smith Engineering Company, PO Box 2565, Roswell, NM 88201



November 23, 2011

Carl J. Chavez Environmental Engineer Oil Conservation Division Energy, Minerals and Natural Resources Department 1220 South St. Francis Drive Santa Fe, NM 87505

Re: OCD Request for Additional Information; Discharge Permit Renewal (GW-028) Artesia Refinery

Dear Mr. Chavez:

Navajo Refining Company ("Navajo") has received your November 17, 2011 letter to Darrell Moore of Navajo requesting additional information concerning the renewal of Discharge Permit GW-028 for the Artesia Refinery. The following are Navajo's responses to those requests.

Initially, Navajo notes that the regulation cited in your letter as the basis for the request, 20.6.2.3106(C) NMAC, does not authorize OCD to request additional information from a permit applicant. The section merely specifies that an applicant may include additional information in the application as it deems appropriate. OCD's authority to request additional information is provided by 20.6.2.3109.A NMAC, which specifies that OCD "may request from the discharger, either before or after the issuance of any public notice, additional information *necessary for the evaluation of the application*." As discussed more particularly below, most of the information for renewal of the authorization to discharge reject water from the reverse osmosis system at the Artesia Refinery, or has already been provided to OCD. As a result, Navajo declines your request to submit that information.

Request No. 1: Environmental laboratory water quality data, flow rates with volume(s), and source(s) of all waste streams or effluent sent to the Artesia Waste Water Treatment Plant (WWTP).

Navajo's Response: There is no connection between the waste streams or effluent sent to the Artesia treatment plant and discharges from the RO Unit. Therefore, information concerning the water quality, flow rates and sources of those streams is not "necessary for the evaluation of the application." Navajo declines to submit the information.

Request No. 2: The flow rates with volume(s) and source(s) of all waste stream(s) or effluent discharged to the 3 Underground Injection Control Class I (Non-Hazardous) Disposal Wells and their maximum disposal capacities.

Navajo's Response: There is no connection between the waste streams or effluent discharged to the three (3) UIC Class I wells at Artesia and the discharge from the RO Unit. Therefore, information concerning the flow rates and sources of those streams is not "necessary for the evaluation of the application." Navajo declines to submit the information.

Request No. 3: The flow rates with volume(s) and source(s) (i.e., air stripped trench water containing PSHs) of all waste stream(s) or effluent from the Waste Water Treatment System (WWTS) discharged to the RO Reject Discharge Fields (provide all farm discharge locations in NM and Texas), and Eagle Creek or Draw. If the fields are used to grow farm crops, please disclose the type of crop(s), i.e., Rye, location(s).

Navajo's Response: Navajo does not use air stripped trench water or refinery effluent from the waste water treatment system for supply water to the RO Unit. The only source of supply water is the fresh water from Navajo's well, supplemented with fresh (drinking) water from the City of Artesia. Navajo does not discharge any RO reject water at locations other than those identified in the permit renewal application.

Request No. 4: Any chemical additives injected into the waste water stream(s) or effluent identified above by the operator.

Navajo's Response: As discussed above, Navajo does not use any waste water or effluent in the RO Unit and therefore, the use of chemical additives for those streams is not relevant to the review and decision on the permit renewal application. Navajo declines to submit the information.

Request No. 5: Environmental laboratory water quality data from fresh water supply wells and water purchased from the City and used in boilers for steam generation and/or any other application in the WWTS.

Navajo's Response: This information is included in Navajo's November 3, 2011 and November 15, 2011 submittals to the OCD. If OCD needs an additional copy of that data, please let me know.

Request No. 6: Provide chloride, fluoride, and sulfate isocon ground water contour maps over time based on the annual environmental water quality monitoring data for the facility.

Navajo's Response: Navajo's November 15, 2011 submittal to the OCD includes a potentiometric map and graphs of the data showing the decline in concentration of the relevant contaminants. Navajo included an Excel spreadsheet showing the raw data used to prepare the graphs. That submittal satisfies this request.

Request No. 7: Provide any background water quality data from the deeper aquifer below the shallow water table aquifer that down gradient environmental monitoring wells are screened into.

Navajo's Response: Navajo has no evidence that the discharge from the RO Unit is impacting the deeper aquifer down gradient from the monitoring wells. If the OCD has information showing such an impact, you should notify Navajo to allow a review and comment on OCD's position. Navajo notes that results of the data submitted on November 15, 2011 show a decline in concentrations for the relevant contaminants in the shallow water table. Navajo believes the analysis of the deeper aquifer will result in the same conclusion or show an even greater decline in concentrations.

Request No. 8: Provide the complete original and/or current regulatory reference ("20.6.2.3109(E) NMAC") cited in your most recent correspondence to the OCD.

Navajo's Response: 20.6.2.3109.E NMAC, as well as the entire WQCC ground water permitting regulations, may be found on the State Records Center website at:

http://www.nmcpr.state.nm.us/nmac/parts/title20/20.006.0002.htm

Request No. 9: Provide complete water quality environmental analytical data summary table information for the RO Reject Water from before 2004, i.e., beginning around 1993, including all locations where discharges occurred.

Navajo Response: The data requested has been submitted previously by Navajo to OCD in annual reports and other submittals, and is on the OCD website:

http://ocdimage.emnrd.state.nm.us/imaging/AEOrderFileView.aspx?appNo=pENV000GW00029

Please see files: PENV00GW00029_0033.tif, PENV00GW00029_0039.tif, PENV00GW00029_0046.tif, PENV00GW00029_0018.tif. Give me a call or email if you have questions regarding Navajo's response.

Sincerely,

Johnny Lackey Environmental Manager

Electronic cc: Randy Dade, OCD District II Office, Artesia David Cobrain, NMED- HWB John Hall, NMED, GWQB Jami Bailey, OCD, Santa Fe Glen VonGonten, OCD, Santa Fe Louis Rose, Santa Fe Darrell Moore, Navajo Michael McKee, Navajo Robert Combs, Navajo

> Navajo Refining Company, LLC PO Box 159 • Artesia, NM 88211-0159 • (575) 748-3311 http://www.hollyfrontier.com

New Mexico Energy, Minerals and Natural Resources Department

Susana Martinez Governor

John H. Bemis Cabinet Secretary-Designate Jami Bailey Division Director Oil Conservation Division



Brett F. Woods, Ph.D. Deputy Cabinet Secretary

NOVEMBER 17, 2011

Mr. Darrell Moore Environmental Manager for Water & Waste Navajo Refining Company- Artesia Refinery P.O. Box 159 Artesia, New Mexico 88211-0159

Re: Discharge Permit Renewal (GW-028) Artesia Refinery SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico

Dear Mr. Moore:

The Oil Conservation Division (OCD) has received Navajo Refining Company's public comments related to the discharge permit renewal for the Navajo Refining Company- Artesia Refinery located just northeast of the intersection of Hwy. 285 and Hwy. 82, in Artesia New Mexico. The OCD has evaluated your comments for consideration in completing the final permit and based on the Reverse Osmosis (RO) Reject Water issue, the OCD requires the following information pursuant to 20.6.2.3106(C) NMAC.

- 1) Environmental laboratory water quality data, flow rates with volume(s), and source(s) of all waste streams or effluent sent to the Artesia Waste Water Treatment Plant (WWTP).
- 2) The flow rates with volume(s) and source(s) of all waste stream(s) or effluent discharged to the 3 Underground Injection Control Class I (Non-Hazardous) Disposal Wells and their maximum disposal capacities.
- 3) The flow rates with volume(s) and source(s) (i.e., air stripped trench water containing PSHs) of all waste stream(s) or effluent from the Waste Water Treatment System (WWTS) discharged to the RO Reject Discharge Fields (provide all farm discharge locations in NM and Texas), and Eagle Creek or Draw. If the fields are used to grow farm crops, please disclose the type of crop(s), i.e., Rye, location(s).
- 4) Any chemical additives injected into the waste water stream(s) or effluent identified above by the operator.
- 5) Environmental laboratory water quality data from fresh water supply wells and water purchased from the City and used in boilers for steam generation and/or any other application in the WWTS.
- 6) Provide chloride, fluoride, and sulfate isocon ground water contour maps over time based on the annual environmental water quality monitoring data for the facility.
- 7) Provide any background water quality data from the deeper aquifer below the shallow water table aquifer that down gradient environmental monitoring wells are screened into.
- 8) Provide the complete original and/or current regulatory reference ("20.6.2.3109(E) NMAC") cited in your most recent correspondence to the OCD.

Mr. Darrell Moore November 17, 2011 Page 2 of 2

9) Provide complete water quality environmental analytical data summary table information for the RO Reject Water from before 2004, i.e., beginning around 1993, including all locations where discharges occurred.

Please respond within 7 days of receipt of this letter. If there are any questions regarding this matter, please do not hesitate to contact me at (505) 476-3490 or <u>CarlJ.Chavez@state.nm.us</u>. Thank you and your staff in advance for your cooperation during this discharge permit review.

Sincerely,

land. Chines

Carl J. Chavez Environmental Engineer

CJC/cjc

xc: OCD District II Office, Artesia David Cobrain, NMED- HWB John Hall, NMED- GWQB

Chavez, Carl J, EMNRD

From:	Lackey, Johnny [Johnny.Lackey@hollyfrontier.com]
Sent:	Tuesday, November 15, 2011 1:39 PM
То:	Chavez, Carl J, EMNRD
Cc:	Bailey, Jami, EMNRD; VonGonten, Glenn, EMNRD; Dade, Randy, EMNRD; 'Louis W. Rose';
	McKee, Michael; Whatley, Michael; Moore, Darrell; Combs, Robert
Subject:	Artesia Refinery (GW-032) RO Reject Water Revision
Attachments:	Navajo RefiningRO Reject info to OCD 14 Nov 2011.pdf; Navajo Refining groundwater data vs RO reject 14 Nov 2011.xls

Carl.

To further support Navajo's request to allow continued discharge of the RO Reject stream to the farm, please see the attached PDF and Excel file. The data presented in the PDF file graphically depicts the RO reject anion concentrations and the anion concentrations at selected monitor wells. The Excel file includes the raw data used to produce the graphs, as compiled from the 2010 Annual Groundwater Report (Arcadis) and historical data retrieved from the OCD website. The attachments and data show:

- The monitor well/refinery map and potentiometric map show the relative location of the wells with respect to the refinery, RO Reject discharge fields and natural groundwater flow. Two of the wells (MW-45 and KWB-1A) are down gradient from the discharge fields and actually indicate a decline in concentration for the three constituents of concern.
- The monitor well data displays a historical account representative of the anion concentrations in the shallow groundwater, including up-gradient, off-site locations that reflect groundwater anion concentrations independent of refinery operations and all three off site, up-gradient wells show concentrations much higher than the 20.6.2.3103 NMAC Standard.
- The trends provide a simple graphical means to show the relative change of the groundwater anion concentrations for wells with sufficient data to encompass the time span that RO reject has been discharged to the farm.

Navajo is confident that this information will assist the OCD in determining that the RO reject discharge to the farm is NOT substantially harmful to the shallow groundwater, therefore, Navajo requests that the OCD remove the requirement in the draft permit renewal (GW-028) to cease discharge to the environment (farm fields) and allow Navajo to continue this discharge as authorized by the OCD since 1993. The approval of this discharge is detailed in documentation submitted to the OCD via email on 11/3/11.

Thanks,

Johnny Lackey Sr. Environmental Manager The HollyFrontier Companies P.O. Box 159 501 E. Main St. Artesia, NM 88211-0159 Office - 575-746-5490 Cell - 972-261-8075 Fax - 575-746-5451 Johnny.Lackey@hollyfrontier.com

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attachments. Unless expressly stated, nothing contained in this message should be construed as a digital or electronic signature or a commitment to a binding agreement.

Overview—Navajo Refining RO Reject and Monitor Well Water Analyses (Abbr.)

Page 1: Overview

The purpose of this document is to present some of the historical Reverse Osmosis Reject anion concentrations and how that discharge stream may have impacted the shallow groundwater by utilizing the data available for some of our monitoring wells. Also included are maps of the refinery, locations of the monitoring wells, the potentiometric surface of the shallow groundwater, and up-gradient monitoring well data. All of this data was provided by data on the OCD website, the 2010 Annual Groundwater Report, and more recent analytical data collected for the 2011 Annual Groundwater Report.

Page 2: Map—Monitor well locations with respect to RO Reject Discharge Fields.

This figure shows the relative location of the monitor wells (circled, red) and the RO Reject discharge fields (blue, square) with respect to the refinery.

Page 3: Map—Monitor Well locations and RO Reject Discharge Fields with respect to ground water flow gradient.

The wells chosen were based on location and amount of available data. We wanted to ensure that the groundwater data presented here provided a good statistical basis and were located either in the discharge field or down gradient. The effects of the discharge should be evident in these type locations.

Page 4: Table—Up-gradient wells anion concentrations.

These wells are located outside the refinery and exhibit elevated sulfate concentrations. Due to the direction of groundwater flow (Page 3) the anion concentrations present are independent of refinery activities.

Page 5: Graph—NP-9 anion concentrations vs. RO Reject anion concentrations.

NP-9 monitor well is located within the discharge field. It is a relatively new installation, with only ~5 years of monitoring data. The data are plotted as a scatter in Excel, and the trend line was added by automatic fit by Excel, along with a trend line equation and R² to describe the fit of data to the trend. The slope of the equation provides a change of analyte concentration in (mg/L)/month. There is a positive trend for chloride and a very slight increasing trend for fluoride. However, the groundwater chloride concentration increased during DECREASED RO Discharge chloride concentrations. The large negative trend for groundwater guality. It is expected that equilibrium concentrations will be approached over time.

Page 6: Graph—MW-45 anion concentrations vs. RO Reject anion concentrations.

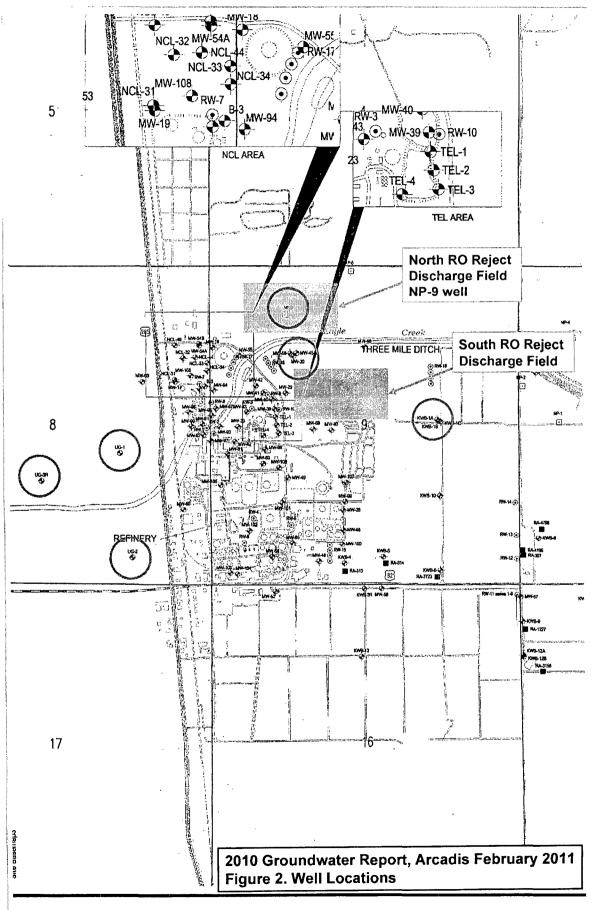
Monitor well 45 is located between the discharge fields, slightly down-gradient from the north discharge field. This well data was chosen due to the data quantity available. The linear fit of the data shows a very little change in the groundwater chloride concentration, but a exponential or polynomial fit would be more appropriate to show the overall decrease for data between ~June 1994 and present data. The fluoride concentration also has decreased, along with sulfate, both with more linear trends. However, the sulfate trend may be overstated, but as mentioned, was fit automatically by the graphics program.

Page 7: Graph—KWB-1A anion concentrations vs. RO Reject anion concentrations.

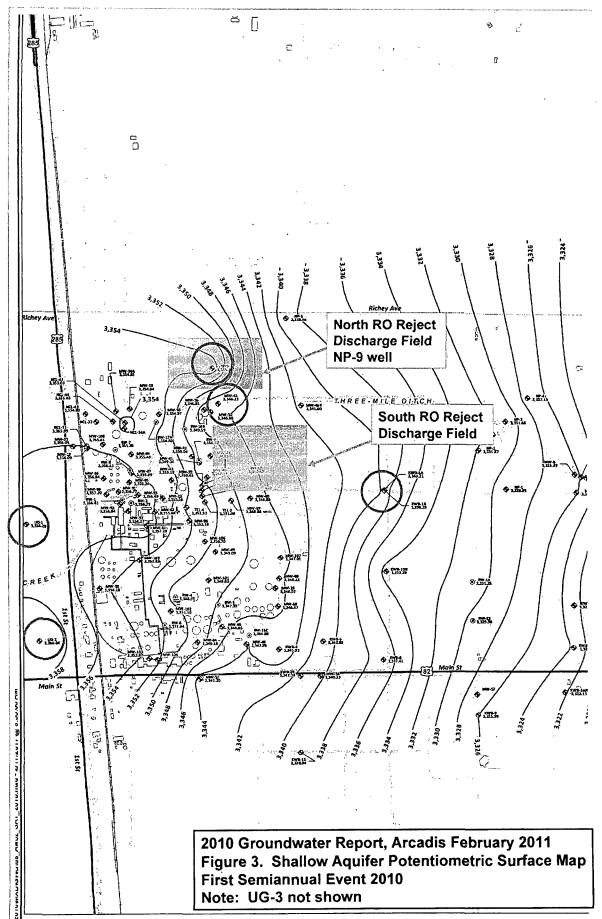
KWB-1A is located due east, down-gradient from the south discharge field. This location has many years of available data and shows decreasing groundwater concentrations for all three analytes.

. . . .

Refinery Map with Well Locations



Potentiometric Map with Well Locations



HOLLYFRONTIER Navajo Refining Company, L.L.C.

Up-Gradient Monitor Well Data

UG-1	Arcadis Rpt Feb 2011; *ALS data, Navajo Artesia Semi-Annual Sampling					
Sample Date	Chloride (mg/L)	Fluoride:(mg/L)	Sulfate (mg/L)			
20.6.2.3103 NMAC Standard	250	1:6	600			
Apr-09	177	0.5	1900			
Oct-09	166	0.691	1810			
Apr-10	159	0.627	1820			
Oct-10	151	0.68	1590			
Mar-11*	108	0.712	1300			

UG-2	Arcadis Rpt Feb 2011; *ALS data, Navajo Artesia Semi-Annual Sampling					
Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)			
20.6.2.3103 NMAC Standard	250	1.6	600			
Арг-09	62.1	1.25	1010			
Oct-09	53.0	1.30	961			
Apr-10	44.0	1.34	910			
Oct-10	45.4	1.34	809			
Mar-11*	42.0	1.32	689			

UG-3R

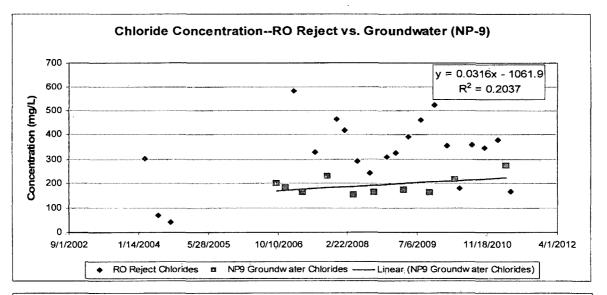
Arcadis Rpt Feb 2011; *ALS data, Navajo Artesia Semi-Annual Sampling

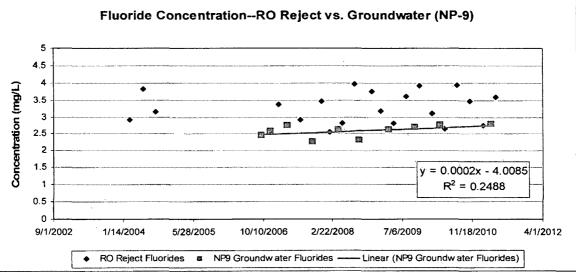
Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
20.6.2.3103 NMAC Standard	250	1.5	600
Apr-09	62.9	0.250	1390
Oct-09	68.0	0.565	1330
Apr-10	59.6	0.372	1360
Oct-10	46.0	0.500	1100
Mar-11*	26.8	0.492	834

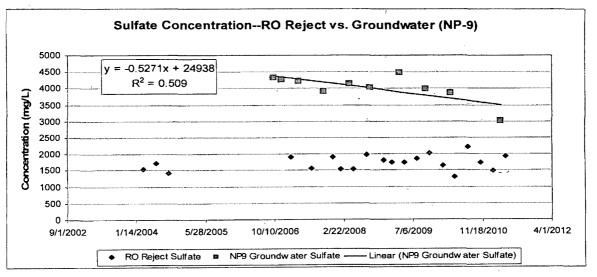


Impact on Ground Water RO Reject vs. NP-9

Well NP-9 is located directly in the north RO reject discharge field



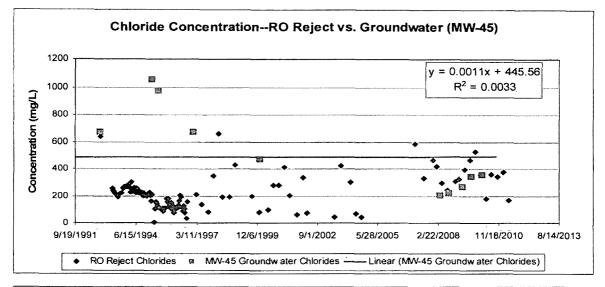


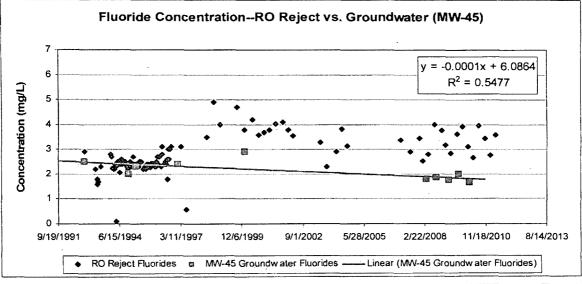


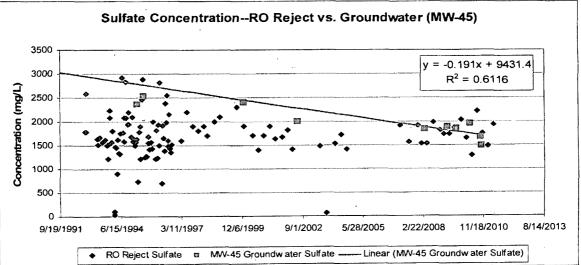


Impact on Ground Water RO Reject vs. MW-45

Well located between RO reject discharge fields



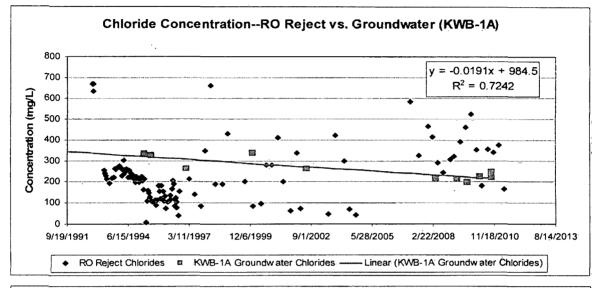


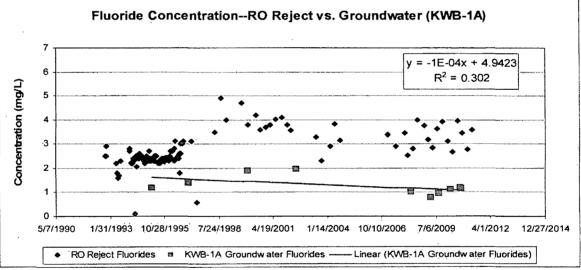


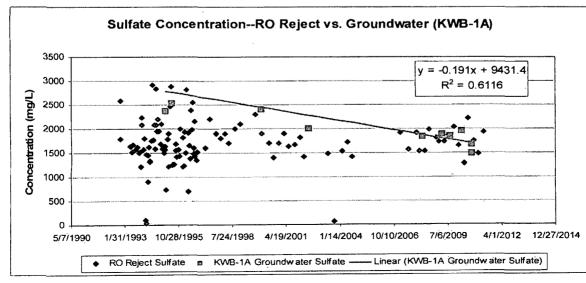


Impact on Ground Water RO Reject vs. KWB-1A

Well located due east (down-gradient) of south RO reject discharge field

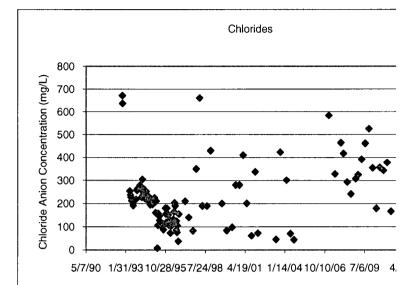


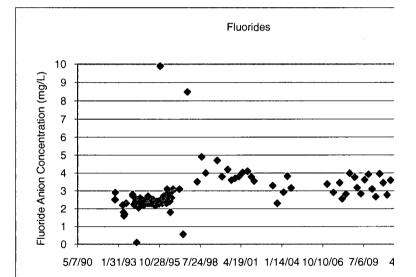


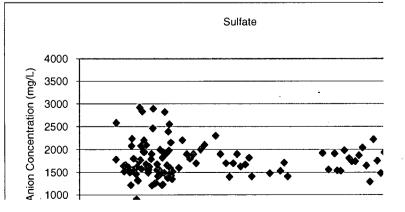


min	7.3	0.1	38
std dev	133.5	3.0	606.7
max	671	31	5897

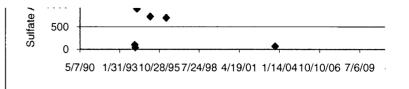
Sample Date	Chloride	Fluoride	Sulfate
•	mg/L	mg/L	mg/L
11/4/1992	671	2.5	1780
11/14/1992	671	2.5	1780
11/15/1992	636	2.9	2580
5/17/1993	254	2.2	1640
5/18/1993	254	2.2	1640
6/4/1993	237	1.8	1520
6/15/1993	227	1.6	1650
7/3/1993	212	1.7	1660
8/11/1993	192	2.3	1570
9/21/1993	214		1610
10/21/1993	218		1500
11/12/1993	261		1517
11/16/1993	261		1517
11/18/1993	257		1218
12/3/1993	266		2080
12/17/1993	266		2235
1/12/1994	269	2.8	1559
1/26/1994	278	2.7	1803
2/16/1994	267	2.24	102
2/28/1994	259	2.2	38
3/10/1994	227	2.2	1473
3/30/1994	304	2.4	1458
4/8/1994	234	2.3	899
4/21/1994	257	0.1	1622
5/6/1994	248	2.32	1328
5/16/1994	262	2.5	1314
6/9/1994	221	2.05	1747
6/30/1994	253	2.4	2916
7/19/1994	218.3	2.59	1772
7/29/1994	237	2.4	2078
8/11/1994	222.9	2.5	1577
8/30/1994	218	2.5	2830
9/9/1994	227.6	2.5	2080
9/26/1994	209	2.4	1953
10/12/1994	195	2.3	2202
10/20/1994	223	2.2	1944
11/30/1994	204	2.49	1682
12/7/1994			
12/9/1994	197	2.3	2096
12/10/1994			
12/30/1994	214	2.4	1578
1/12/1995	211	2.3	1641
1/26/1995	225	2.7	1495
2/10/1995	205	2.4	
2/25/1995	161	2.3	1626
			· · · · · · · · · · · · · · · · · · ·





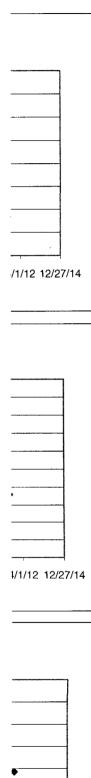


3/10/1995	210	2.4	729
4/10/1995	7.3	2.3	1791
4/21/1995	106	2.3	1901
5/1/1995	158	2.5	1211
5/22/1995	147	2.5	2460
6/5/1995	127	2.5	2890
7/6/1995	108	2.2	1257
7/24/1995	103	2.3	1260
8/9/1995	106	2.2	1268
8/31/1995	113	2.4	1551
9/7/1995	88	2.4	1679
9/26/1995	111	2.4	1417
10/26/1995	180	2.27	1560
11/9/1995	155	2.45	1440
11/22/1995	120	9.9	1995
12/5/1995	120	2.42	5897
1/9/1995			
	152	2.3	1216
1/18/1996	107	2.3	1824
1/30/1996	107	2.5	1235
2/14/1996	129	2.7	1938
2/28/1996	73	2.4	1492
3/22/1996	105	2.7	2821
4/23/1996	109	2.3	703
4/30/1996	115	2.8	1913
5/10/1996	133	3.1	1657
5/31/1996	165	2.4	1378
6/13/1996	203	2.4	2390
6/28/1996	190	2.5	1980
7/12/1996	114	2.4	2550
7/26/1996	85.5	1.8	1600
7/31/1996	125	2.6	1480
8/16/1996	76	3	2150
8/23/1996	105	2.6	1430
9/17/1996	37.4	3	1350
9/30/1996	155	3.1	1520
3/5/1997	210	3.1	1600
6/4/1997	140	0.57	2200
9/19/1997	83	8.5	1900
12/8/1997	350	11	1800
3/5/1998	660	31	1900
5/14/1998	190	3.5	1700
9/2/1998	190	4.9	2000
12/8/1998	430	4	2100
9/16/1999	200	4.7	2300
1/13/2000	84	3.8	1900
5/31/2000	98	4.2	1700
8/29/2000	280	3.6	1400
11/30/2000	280	3.7	1700
3/5/2001	410	3.8	1900
6/4/2001	201	4.03	1630
10/1/2001	61.2	4.03	1670
1/3/2002	337		
1/3/2002	33/	3.78	1820



0/11/00000	70 7	0.55	1110
3/11/2002	72.7	3.55	1410
12/10/2002		0.00	
6/10/2003	45	3.29	1480
9/29/2003	423	2.29	66.7
3/1/2004	301	2.92	1530
6/1/2004	69.5	3.82	1710
9/1/2004	44.1	3.16	1410
2/1/2007	583	3.38	1920
7/1/2007	328	2.91	1560
12/1/2007	464	3.46	1910
2/1/2008	417	2.55	1540
5/1/2008	293	2.82	1530
8/1/2008	241	3.98	1980
12/1/2008	307	3.76	1810
2/1/2009	325	3.17	1740
5/1/2009	392	2.83	1740
8/1/2009	461	3.62	1870
11/1/2009	525	3.92	2040
2/1/2010	355	3.1	1650
5/1/2010	180	2.66	1290
8/1/2010	357	3.95	2220
11/1/2010	344	3.46	1750
2/1/2011	378	2.76	1480
5/1/2011	167	3.59	1930

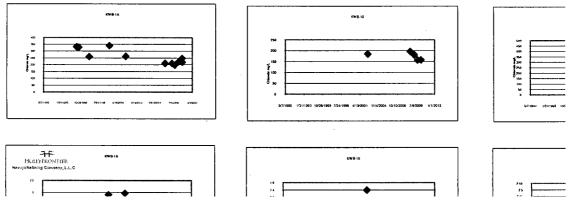
. . . .

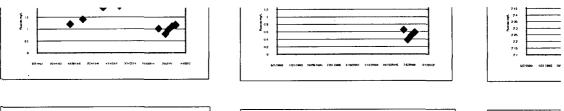


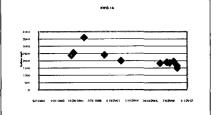
4/1/12 12/27/14

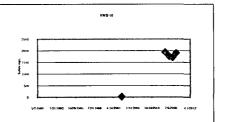
· ·

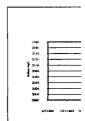
	KWB-1A Chloride mg/L	KWB-1A Fluoride mg/L	KWB-1A Sulfate mg/L	KWB-10 Chloride mg/L	KWB-10 Fluoride mg/L	KWB-10 Sulfate mg/L	MW-20 Chloride mg/L
Oct-90 11/14/1992							
11/15/1992							
11/12/1994							
11/14/1994 3/9/1995	333	1.2	2365				
3/10/1995	333	1.2	2305				
6/14/1995							
6/28/1995	328		2540				
6/29/1995	020		2010				
1/20/1997	260	1.4	3600				
1/13/2000	340						
1/21/2000							
6/15/2002	262	1.96	2000	185	1.4	26.3	
Apr-08	210	1.01	1830				431
Sep-08				196			398
Apr-09	210			181	0.384	1760	353
Sep-09	198	0.955	1850				
Sep-09							
Oct-09				157	0.501	1710	301
Mar-10 Apr 10	223	1.11	1950	1 5 0	0 500	1000	070
Apr-10 Oct-10	223			158	0.582	1900	279
Oct-10 Oct-10	248						
Nov-10	240	1.10	1000				
Nov-10							
min	198.0	0.8	1490.0	157.0	0.4	26.3	279.0
std dev	53.1	0.4	579.7	17.2	0.4	811.1	63.8
max	340.0	2.0	3600.0	196.0	1.4	1940.0	431.0





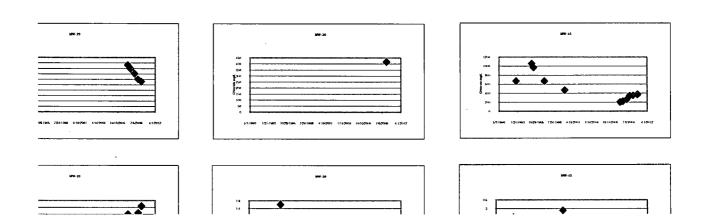


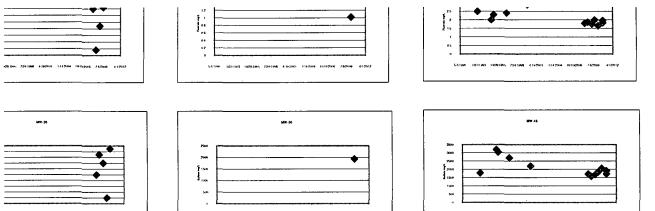




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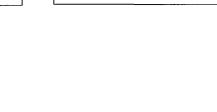
MW-20 Fluoride mg/L	MW-20 Sulfate mg/L	MW-30 Chloride mg/L	MW-30 Fluoride mg/L	MW-30 Sulfate mg/L	MW-45 Chloride mg/L	MW-45 Fluoride mg/L	MW-45 Sulfate mg/L
					283 671		
			_ 1.5	5		2	
			:		1057 972		3197 3040
					670	2.4	2700
					470	2.9	2200
2.45 2.14 2.32	4 3150				204 223 264 343	1.86 1.75	1580 1690
2.46	6 3000	4.4.6		1000	050	4.05	0000
2.5	1 3170	416	6 1.02	2 1930	353	1.65	2060
					377 368		
2.1 0.1 2.5	3000.0 67.3 3170.0	416.0 #DIV/0! 416.0	1.0 0.3 1.5	1930.0 #DIV/0! 1930.0	204.0 278.9 1057.0	1.7 0.4 2.9	1310.0 576.1 3197.0





0.25 1065 7.24 1069 4 192001 1114 2004 1930 2005 7 5 2006 4-1 2012

540 L \$7/146 (31/166 (320/166 120/01/66 416200) (149/06 10/16206 /62008 41/01/2

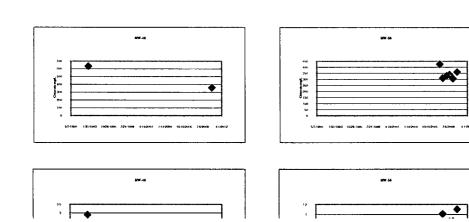


57/1660 1/31/1013 11/28 Huy 724 June 4 16/2011 11/4/2004 10/16/2016 7/6/2016 4/1/2012

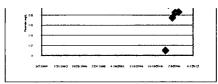
MW-46 Chloride mg/L	MW-46 Fluoride mg/L	MW-46 Sulfate mg/L	MW-56 Chloride mg/L	MW-56 Fluoride mg/L	MW-56 Sulfate mg/L
638	3.17	1250			
636	6 2.9	2580			

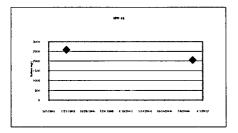
426	0.1	1700
310	1.01	1830
329	0.75	1920
337	0.854	1850
338	0.853	1830
306	0.863	1790
360	1.1	1800

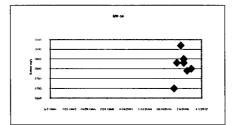
357	2.02	2050			
357.0	2.0	1250.0	306.0	0.1	1700.0
161.7	0.6	669.6	40.6	0.3	66.8
638.0	3.2	2580.0	426.0	1.1	1920.0











Analytical Results Summary

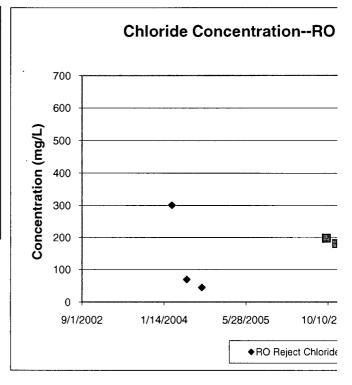
		RO Feed Result	RO Reject Result
		mg/kg	mg/kg
Metals	Aluminum	ND	ND
· ·	Arsenic	ND	ND
	Barium	0.0145	0.0614
	Beryllium	ND	ND
	Boron	0.0426	0.0633
	Cadmium	ND	ND
	Calcium	161	687
	Chromium	ND	ND
	Cobalt	ND	ND
	Copper	ND	ND
	Iron	ND	ND
	Lead	ND	ND
	Magnesium	39.7	169
	Manganese	ND	ND
	Molybdenum	ND	0.00930
	Nickel	ND	ND
	Potassium	0.87	3.40
	Selenium	0.0105	0.00972
	Silver	ND	ND
	Sodium	17.4	71.3
	Vanadium 	ND	0.00986
	Zinc	0.00521	0.0253
SEMIVOLATILES	Naphthalene 2,4,5-Trichlorophenol 2,4,6-Trichlorophenol 2,4-Dinitrotoluene Cresols, Total Hexachlorobenzene Hexachlorobenzene Hexachloropthane Nitrobenzene Pentachlorophenol Pyridine Surr: 2,4,6-Tribromophenol	ND 55.0	ND 60.1
	Surr: 2-Fluororbiphenyl	42.7	50.0
	Surr: 2-Fluororphenol	33.8	44.7
	Surr: 4-Terphenyl-d14	61.8	53.5
	Surr: Nitrobenzene-d5	42.4	55.3
	Surr: Phenol-d6	37.2	49.3
TCLP VOLATILES	1,1-Dichloroethane 1,2-Dichloroethane 1,4-Dichlorobenzene 2-Butanone		

	Benzene Ethylbenzene Carbon tetrachloride Chlorobenzene Chloroform	ND ND	ND ND
	Tetrachloroethane Trichloroethene Vinyl chloride	ND	ND
	Xylenes, total	ND	ND
	Surr: 1,2-Dichloroethane-d4	102	98.3
	Surr: 4-Bromofluorobenzene	94.5	94.2
	Surr: Dibromofluoromethane	99.8	98.5
	Surr: Toluene-d8	104	104
Anions	Chloride	27.2	125
	Fluoride	0.746	3.56
	Nitrogen, Nitrate (as N)	0.401	1.89
	Nitrogen, Nitrite (as N)	ND	ND
	Sulfate	437	2290
	Surr: Selenate (surr)	11.3	103
	Surr: Selenate (surr)	98.5	96.1
Alkalinity	Alkalinity, bicarbonate (as CaCO3)	194	781
	Alkalinity, carbonate (as CaCO3)	ND	ND
	Alkalinity, hydroxide (as CaCO3)	ND	ND
	Alkalinity, total (as CaCO3)	194	781
Ammonia	Nitrogen, ammonia (as N)	0.0620	0.0950
РН	pH	6.95	7.76
Dissolved Silica	Silica, dissolved (as SiO2)	3.74	2.99
Sulfide	Sulfide	ND	ND
Total Suspended Solids	Suspended solids (residue, non-filterable)	4.80	7.6

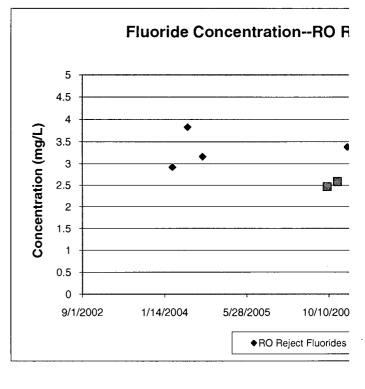
RO Reject	Arcadis Rpt Feb 2011		
Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
WQCC limit	250	1.6	600
Mar-04	301	2.92	1530
Jun-04	69.5	3.82	1710
Sep-04	44.1	3.16	1410
Feb-07	583	3.38	1920
Jul-07	328	2.91	1560
Dec-07	464	3.46	1910
Feb-08	417	2.55	1540
May-08	293	2.82	1530
Aug-08	241	3.98	1980
Dec-08	307	3.76	1810
Feb-09	325	3.17	1740
May-09	392	2.83	1740
Aug-09	461	3.62	1870
Nov-09	525	3.92	2040
Feb-10	355	3.1	1650
May-10	180	2.66	1290
Aug-10	357	3.95	2220
Nov-10	344	3.46	1750
Feb-11	378	2.76	1480
May-11	167	3.59	1930
avg	327	3.29	1731

NP-9
Sample I
WQCC I
Oct-06
Dec-06
Apr-07
Oct-07
Apr-08
Sep-08
Apr-09
Oct-09
Apr-10
Apr-11

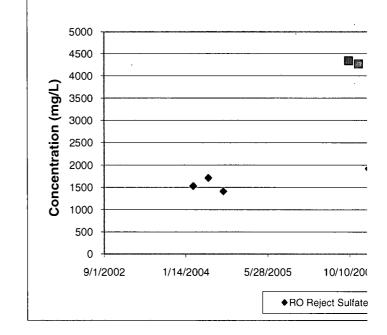
min std dev max

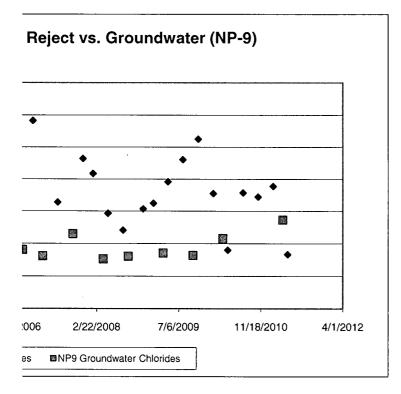


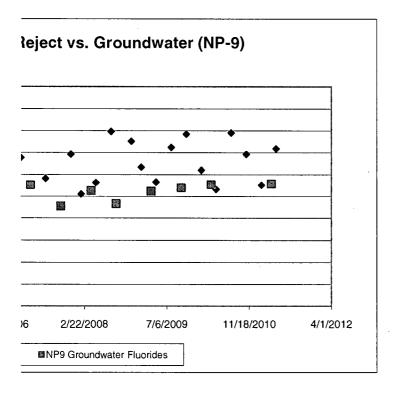
Arcadis Rpt Feb 2011			
Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	
250	1.6	600	
198	2.46	4340	
181	2.58	4270	
162	2.76	4220	
230	2.27	3910	
153	2.63	4160	
161	2.33	4040	
171	2.62	4470	
164	2.7	3980	
216	2.77	3860	
273	2.79	3010	
153	2.27	3010	
38.5	0.2	406.4	
273	2.79	4470	



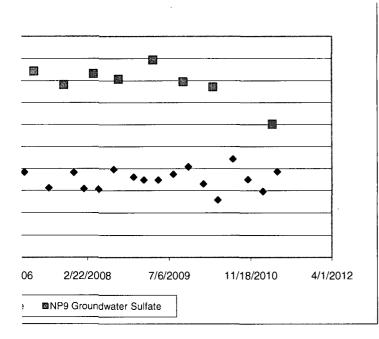
Sulfate Concentration--RO R







eject vs. Groundwater (NP-9)



RO Reject			
Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
WQCC limit	250	1.6	600
11/4/1992	671	2.5	1780
11/14/1992	671	2.5	1780
11/15/1992	636	2.9	2580
5/17/1993	254	2.2	1640
5/18/1993	254	2.2	1640
6/4/1993	237	1.8	1520
6/15/1993	227		
		1.6	1650
7/3/1993	212	1.7	1660
8/11/1993	192	2.3	1570
9/21/1993	214		1610
10/21/1993	218		1500
11/12/1993	261		1517
11/16/1993	261		1517
11/18/1993	257		1218
12/3/1993	266		2080
12/17/1993	266		2235
1/12/1994	269	2.8	1559
1/26/1994	278	2.7	1803
2/16/1994	267	2.24	102
2/28/1994 3/10/1994	259 227	2.2 2.2	<u>38</u> 1473
3/30/1994	304	2.2	1473
4/8/1994	234	2.3	899
4/21/1994	257	0.1	1622
5/6/1994	248	2.32	1328
5/16/1994	262	2.5	1314
6/9/1994	221	2.05	1747
6/30/1994	253	2.4	2916
7/19/1994	218.3	2.59	1772
7/29/1994	237	2.4	2078
8/11/1994	222.9	2.5	1577
8/30/1994	218	2.5	2830
9/9/1994	227.6	2.5	2080
9/26/1994	209 195	2.4	1953 2202
10/20/1994	223	2.3	1944
11/30/1994	223	2.2	1682
12/7/1994	201	2.70	
12/9/1994	197	2.3	2096
12/10/1994	· • ·		
12/30/1994	214	2.4	1578
1/12/1995	211	2,3	1641
1/26/1995	225	2.7	1495
2/10/1995	205	2.4	1562

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KWB 1A	Chloride (mg/L)
WQCC limit	250
10/1/90	
11/14/92	
11/15/92	
11/12/94	
11/14/94	
3/9/95	333
3/10/95	
6/14/95	
6/28/95	328
6/29/95	
1/20/97	260
1/13/00	340
1/21/00	
6/15/02	262
4/1/08	210
9/1/08	
4/1/09	210
9/1/09	198
9/1/09	
10/1/09	
3/1/10	
4/1/10	223
10/10/10	220
10/1/10	248

min	198
std dev	50.7
max	340

2/25/1995	161	2.3	1626
3/10/1995	210	2.4	729
4/10/1995	7.3	2.3	1791
4/21/1995	106	2.3	1901
5/1/1995	158	2.5	1211
5/22/1995	147	2.5	2460
6/5/1995	127	2.5	2890
7/6/1995	108	2.2	1257
7/24/1995	103	2.3	1260
8/9/1995	106	2.2	1268
8/31/1995	113	2.4	1551
9/7/1995	88	2.4	1679
9/26/1995	111	2.4	1417
10/26/1995	180	2.27	1560
11/9/1995	155	2.45	1440
11/22/1995	120	9.9	1995
12/5/1995	180	2.42	5897
1/9/1996	152	2.3	1216
1/18/1996	107	2.3	1824
1/30/1996	107	2.5	1235
2/14/1996	129	2.7	1938
2/28/1996	73	2.4	1492
3/22/1996	105	2.7	2821
4/23/1996	109	2.3	703
4/30/1996	115	2.8	1913
5/10/1996	133	3.1	1657
5/31/1996	165	2.4	1378
6/13/1996	203	2.4	2390
6/28/1996	190	2.5	1980
7/12/1996	114	2.4	2550
7/26/1996	85.5	1.8	1600
7/31/1996	125	2.6	1480
8/16/1996	76	3	2150
8/23/1996	105	2.6	1430
9/17/1996	37.4	3	1350
9/30/1996	155	3.1	1520
3/5/1997	210	3.1	1600
6/4/1997	140	0.57	2200
9/19/1997	83	8.5	1900
12/8/1997	350	11	1800
3/5/1998	660	31	1900
5/14/1998	190	3.5	1700
9/2/1998	190	4.9	2000
12/8/1998	430	4	2100
9/16/1999	200	4.7	2300
1/13/2000	84	3.8	1900
<u>5/3</u> 1/2000	98	4.2	1700
8/29/2000	280	3.6	1400
11/30/2000	280	3.7	1700
3/5/2001	410	3.8	1900
6/4/2001	201	4.03	1630
10/1/2001	61.2	4.1	1670

,

1/3/2002	337	3.78	1820
3/11/2002	72.7	3.55	1410
12/10/2002			
6/10/2003	45	3.29	1480
9/29/2003	423	2.29	66.7
3/1/04	301	2.92	1530
6/1/04	69.5	3.82	1710
9/1/04	44.1	3.16	1410
2/1/07	583	3.38	1920
7/1/07	328	2.91	1560
12/1/07	464	3.46	1910
2/1/08	417	2.55	1540
5/1/08	293	2.82	1530
8/1/08	241	3.98	1980
12/1/08	307	3.76	1810
2/1/09	325	3.17	1740
5/1/09	392	2.83	1740
8/1/09	461	3.62	1870
11/1/09	525	3.92	2040
2/1/10	355	3.1	1650
5/1/10	180	2.66	1290
8/1/10	357	3.95	2220
11/1/10	344	3.46	1750
2/1/11	378	2.76	1480
5/1/11	167	3.59	1930
min	7.3	0.1	38
std dev	133.5	3.0	606.7

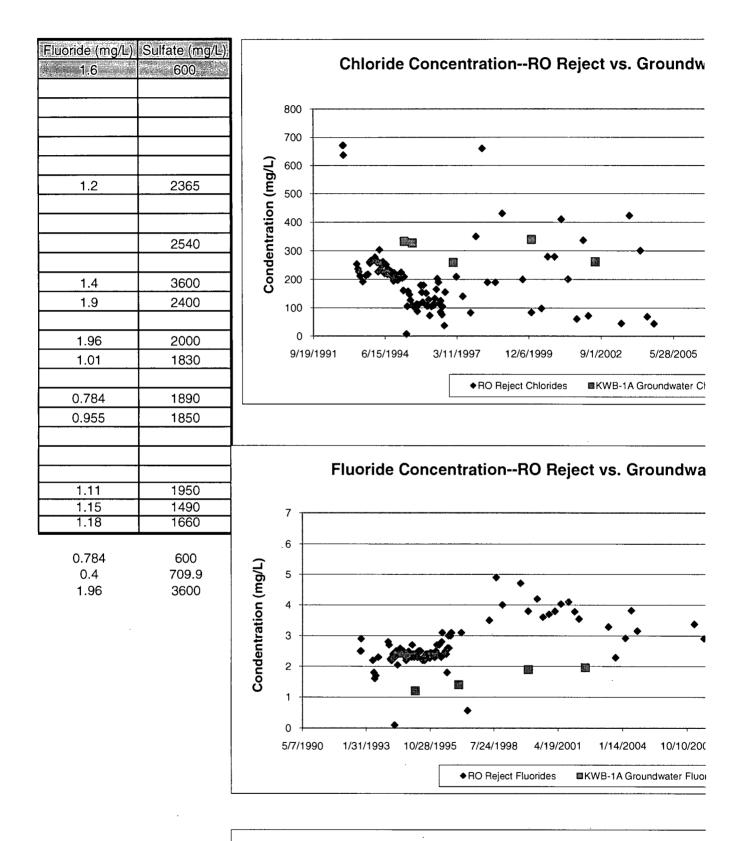
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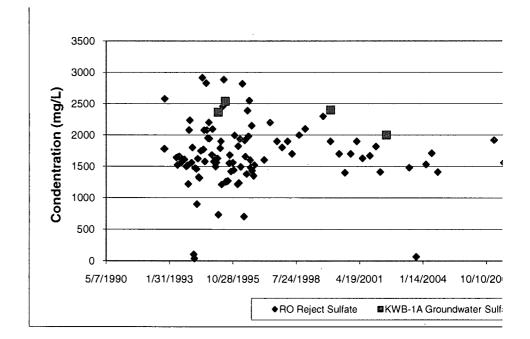
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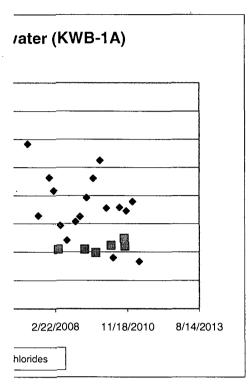
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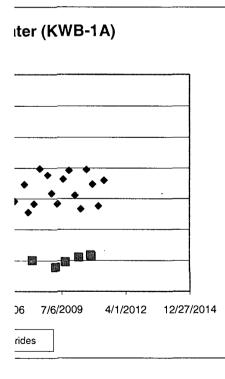
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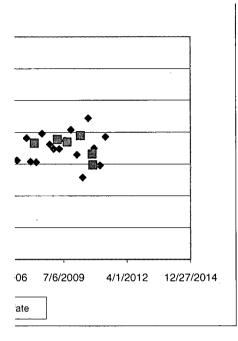
Sulfate Concentration--RO Reject vs. Groundwat







ter (KWB-1A)



Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
20 C / 9 D	250	1.6	600
11/4/1992	671	2.5	1780
11/14/1992	671	2.5	1780
11/15/1992	636	2.9	2580
5/17/1993	254	2.2	1640
5/18/1993	254	2.2	
			1640
6/4/1993	237	1.8	1520
6/15/1993	227	1.6	1650
7/3/1993	212	1.7	1660
8/11/1993	192	2.3	1570
9/21/1993	214		1610
10/21/1993	218		1500
11/12/1993	261		1517
11/16/1993	261		1517
11/18/1993	257		1218
12/3/1993	266		2080
12/17/1993	266		2235
1/12/1994	269	2.8	1559
1/26/1994	278	2.7	1803
2/16/1994	267	2.24	102
2/28/1994	259	2.2	38
3/10/1994	227	2.2	1473
3/30/1994	304	2.4	1458
<u>4/8/1994</u> 4/21/1994	234 257	<u>2.3</u> 0.1	899 1622
5/6/1994	237	2.32	1328
5/16/1994	262	2.5	1320
6/9/1994	221	2.05	1747
6/30/1994	253	2.4	2916
7/19/1994	218.3	2.59	1772
7/29/1994	237	2.4	2078
8/11/1994	222.9	2.5	1577
8/30/1994	218	2.5	2830
9/9/1994	227.6	2.5	2080
9/26/1994	209	2.4	1953
10/12/1994	195	2.3	2202
10/20/1994	223	2.2	1944
11/30/1994	204	2.49	1682
12/7/1994	107	0.0	0000
12/9/1994	197	2.3	2096
12/10/1994	014	0.4	1570
12/30/1994 1/12/1995	<u>214</u> 211	2.4 2.3	1578 1641
1/26/1995	225	2.3	1495
2/10/1995	205	2.4	1495

MW-45	Chloride (mg/L)
WQCC limit	250
10/1/1990	283
11/14/1992	671
11/15/1992	
11/12/1994	
11/14/1994	
3/9/1995	
3/10/1995	1057
6/14/1995	972
6/28/1995	
6/29/1995	
1/20/1997	670
1/13/2000	
1/21/2000	470
6/15/2002	
4/1/2008	204
9/1/2008	223
4/1/2009	264
9/1/2009	343
9/1/2009	
10/1/2009	
3/1/2010	353
4/1/2010	
10/10/2010	
10/1/2010	377
11/1/2010	368
L	L

min	204
std dev	278.9
max	1057

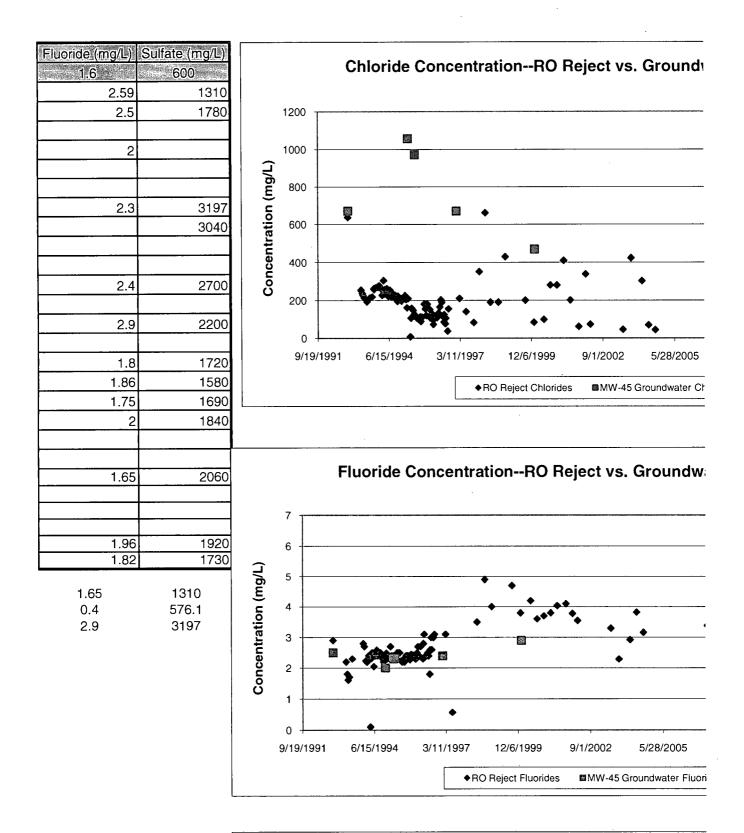
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0/05/1005	101	0.0	1000
2/25/1995	161	2.3	1626
3/10/1995	210	2.4	729
4/10/1995	7.3	2.3	1791
4/21/1995	106	2.3	1901
5/1/1995	158	2.5	1211
5/22/1995	147	2.5	2460
6/5/1995	127	2.5	2890
7/6/1995	108	2.2	1257
7/24/1995	103	2.3	1260
8/9/1995	106	2.2	1268
8/31/1995	113	2.4	1551
9/7/1995	88	2.4	1679
9/26/1995	111	2.4	1417
10/26/1995	180	2.27	1560
11/9/1995	155	2.45	-
			1440
11/22/1995	120	9.9	1995
12/5/1995	180	2.42	5897
1/9/1996	152	2.3	1216
1/18/1996	107	2.3	1824
1/30/1996	107	2.5	1235
2/14/1996	129	2.7	1938
2/28/1996	73	2.4	1492
3/22/1996	105	2.7	2821
4/23/1996	109	2.3	703
4/30/1996	115	2.8	1913
5/10/1996	133	3.1	1657
5/31/1996	165	2.4	1378
6/13/1996	203		
		2.4	2390
6/28/1996	190	2.5	1980
7/12/1996	114	2.4	2550
7/26/1996	85.5	1.8	1600
7/31/1996	125	2.6	1480
8/16/1996	76	3	2150
8/23/1996	105	2.6	1430
9/17/1996	37.4	3	1350
9/30/1996	155	3.1	1520
3/5/1997	210	3.1	1600
6/4/1997	140	0.57	2200
9/19/1997	83	8.5	1900
12/8/1997	350	11	1800
3/5/1998	660	31	1900
5/14/1998	190	3.5	1700
9/2/1998	190	4.9	2000
12/8/1998	430	4	2100
9/16/1999	200	4.7	2300
1/13/2000	84	3.8	1900
5/31/2000	98	4.2	1700
8/29/2000	280	3.6	1400
11/30/2000	280	3.7	1700
3/5/2001	410	3.8	1900
6/4/2001	201	4.03	1630
10/1/2001	61.2	4.1	1670

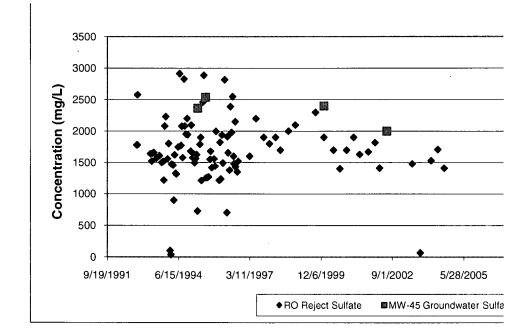
1/3/2002	337	3.78	1820
3/11/2002	72.7	3.55	1410
12/10/2002			
6/10/2003	45	3.29	1480
9/29/2003	423	2.29	66.7
3/1/04	301	2.92	1530
6/1/04	69.5	3.82	1710
9/1/04	44.1	3.16	1410
2/1/07	583	3.38	1920
7/1/07	328	2.91	1560
12/1/07	464	3.46	1910
2/1/08	417	2.55	1540
5/1/08	293	2.82	1530
8/1/08	241	3.98	1980
12/1/08	307	3.76	1810
2/1/09	325	3.17	1740
5/1/09	392	2.83	1740
8/1/09	461	3.62	1870
11/1/09	525	3.92	2040
2/1/10	355	3.1	1650
5/1/10	180	2.66	1290
8/1/10	357	3.95	2220
11/1/10	344	3.46	1750
2/1/11	378	2.76	1480
5/1/11	167	3.59	1930

min	7.3	0.1	38
std dev	133.5	3.0	606.7
max	671	31	5897

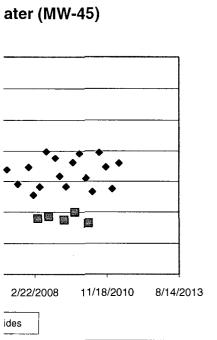
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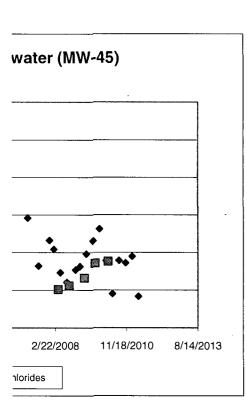


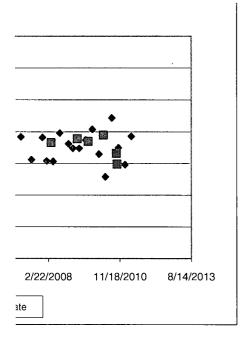
Sulfate Concentration--RO Reject vs. Groundwa



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UG-1 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
WQCC limit	250	1.6	600
Apr-09	177	0.5	1900
Oct-09	166	0.691	1810
Apr-10	159	0.627	1820
Oct-10	151	0.68	1590
avg	163	0.62	1780

	UG-2	Arcadis Rpt Feb 2011
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Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
WQCC limit	250	1.6	600
Apr-09	62.1	1.25	1010
Oct-09	53.0	1.30	961
Apr-10	44.0	1.34	910
Oct-10	45.4	1.34	809
avg	51.1	1.31	923

	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
WQCC limit	250	1.6	600
Apr-09	62.9	0.250	1390
Oct-09	68.0	0.565	1330

Apr-10	59.6	0.372	1360
Oct-10	46.0	0.500	1100
avg	59.1	0.422	1295
RO Reject Avg	228	3.19	1725

MW 18 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.0
Apr-08	163	0.90	1220	16.3
Sep-08	168	1.06	1410	21.4
Apr-09	177	0.72	1240	13.7
Sep-09	173	0.71	1160	11.2
Mar-10	178	1.03	1330	14.7
Oct-10	207	0.98	1110	14
avg	178	0.90	1245	15

MW 23 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.0
Apr-08	448	0.59	28.7	0.1
Sep-08	488	0.42	6.24	. 0.5
Apr-09	467	0.59	15.9	0.15
Sep-09	555	1.06	29.7	0.5
Mar-10	507	1.46	37.1	0.5
Oct-10	503	1.33	24.1	0.255
avg	495	0.91	24	0.33

MW 28

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1:6	600	10.000
Apr-08	180	1.10	816	0.100
Apr-09	179	0.92	567	0.150
Sep-09	182	1.10	460	1.000
Apr-10	182	1.01	614	0.500
Oct-10	230	1.10	740	1.000
avg	191	1.05	639	0.550

MW 29 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Apr-08	495	2.54	2650	1.720
Sep-08	481	2.07	2140	0.500
Apr-09	398	1.97	1890	0.150
Sep-09	454	1.69	2140	1.000
Mar-10	348	2.23	1760	0.500
Oct-10	332	2.47	1670	1.000
avg	418	2.16	2042	0.812

MW 29	ALS		
Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
WQCC limit	250	1.6	600
Oct-04	395	1.68	1160
Apr-05	634	4.24	2950
Oct-06	610	3.52	2480

Dec-06	564	3.68	2440
Mar-07	204	2.57	1.39
Apr-07	574	3.39	2620
Oct-07	373	2.04	1540
Apr-08	495	2.54	2650
Sep-08	481	2.07	2140
Apr-09	398	1.97	1890
Sep-09	454	1.69	2140
Apr-10	348	2.23	1760
Jun-10	110	0	0
Aug-10	456	0.753	167
Nov-10	332	2.47	1670
Mar-11	119	0.819	101
Apr-11	376	1.48	1740
Jul-11	135	0.707	71.6
avg	392	2.10	1529

MW 30 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.0
Mar-10	416	1.02	1930	0.891
avg	416	1.02	1930	0.891

MW 40 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.0
Mar-10	123	1.45	912	0.5
avg	123	1.45	912	1

MW 41 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
	250	1.6	600	10.0
Apr-08	438	0.715	1120	0.1
Sep-08	855	0.628	1170	0.5
Apr-09	995	0.522	1250	1.08
Sep-09	736	0.546	1210	1.0
Mar-10	595	0.667	1170	0.5
Oct-10	875	0.730	886	1.0
avg	749	0.635	1134	0.7

MW 42 Arcadis Rpt Feb 2011

Sample Date.	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit		1.6	600	10.0
Apr-08	598	0.1	Ý 959	0.1
Sep-08	601	0.753	840	0.5
Apr-09	693	0.502	991	0.15
Apr-09	641	0.595	874	1.07
Sep-09	750	0.605	979	1.0
Mar-10	278	0.655	359	0.5
Oct-10	670	0.740	730	1.0
avg	604	0.564	819	0.6

MW 43 Arcadis Rpt Feb 201

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WQCC limit	250	1.6	600	Nitrate/Nitrite as N (mg/L) 10.0
Apr-08	721	0.627	215	0.1
Sep-08	726	0.881	188	0.5
Apr-09	652	0.624	140	0.15
Sep-09	626	0.69	128	0.5
Mar-10	623	0.958	65.8	0.5

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Öct-10	610	0.930	39	1.0
avg	660	0.785	129	0.5

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NCL 31	Arcadis Rpt Feb 2	011		
Sample Da	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L
WQCC lim	250	1.6	600	10.0
Mar-10	176	1.34	1480	0.5
Oct-10	179	1.52	859	0.1
avg	178	1.43	1170	0.30

Sample Da	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (m
WQCC lim	250	1.6	600	10.0
Apr-08	176	1.74	1060	1
Sep-08	234	1.57	1280	0.5
Sep-08	231	1.71	1210	0.5
Apr-09	204	1.49	1130	0.5
Sep-09	198	2.54	1100	1
Mar-10	97.5	1.95	715	0.5
Oct-10	43.4	2.4	840	4.9
avg	169	1.91	1048	1.27

NCL 33	ALS Data			
Sample Da	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC lim	250	1.6	600	10.0
Apr-07	372	2.36	821	0.1
Oct-07	356	2.31	908	1.15
Apr-08	473	2.25	824	1.03
Sep-08	516	1.94	767	1
Apr-09	511	2.22	937	0.5
Sep-09	468	2.4	882	0.12
avg	449	2.25	857	0.65

NCL 34	ALS Data/Arcadis Rpt Feb 201	1
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Sample Da	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC lim		1.6		10.0
Jan-04	369	1.32	178	
Apr-04	324	1.32	181	
Jul-04	364	1.45	154	
Nov-04	377	1.03	139	
May-05	487	1.54	150	
Nov-05	291	1.29	146	
Mar-06	231	1.29	139	
Dec-06	237	1.02	146	
Apr-07	224	1.31	124	
Oct-07	248	1.36	117	
Apr-08	268	1.27	155	0.1
Sep-08	213	1.03	142	0.5

Apr-09	434	2.22	134	1.03
Sep-09	379	1.28	128	1
Apr-10	187	1.3	121	0.5
Oct-10	410	1.52	148	0.29
avg	315	1.35	144	0.57

NCL 44	Arcadis	Rpt	Feb	2011	

NCL 44	Arcadis Rpt Feb 2	011		
		Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC lim	250	1.6	600	10.0
Apr-08	181	1.54	487	1.0
Sep-08	169	1.49	485	0.5
Apr-09	171	1.35	496	0.5
Sep-09	185	1.4	469	1.0
Mar-10	166	1.55	476	0.5
Oct-10	168	1.67	443	0.1
avg	173	1.50	476	0.6

		Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L
WQCC lim	250	1.6	600	10.0
Apr-08	170	0.404	1760	12.4
Sep-08	166	0.567	1720	10.1
Sep-08	164	0.583	1700	9.65
Apr-09	165	0.5	1720	9.65
Apr-09	163	0.5	1720	9.29
Oct-09	152	0.561	1630	9.33
Apr-10	134	0.486	1720	8.94
Oct-10	134	0.641	1590	5.42
avg	156	0.53	1695	9.3

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*Nitrate data fm Arcadis Report

*Nitrate data fm Arcadis Report

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ALS Data

NP5	ALS Data		
Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
WQCC limit	250	1.6	600
Oct-06	198	2.46	4340
Dec-06	181	2.58	4270
Apr-07	162	2.76	4220
Oct-07	230	2.27	3910
Apr-08	153	2.63	4160
Sep-08	161	2.33	4040
Apr-09	171	2.62	4470
Oct-09	164	2.7	3980
Apr-10	216	2.77	3860
Apr-11	273	2.79	3010
avg	191	2.59	4026

NP5 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
WQCC limit	250	1.6	600
Apr-08	153	2.63	4160
Sep-08	161	2.33	4040
Apr-09	171	2.62	4470
Apr-10	164	2.7	3980
Nov-10	216	2.77	3860
avg	173	2.61	4102

NP9			
Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
WQCC limit	250	1.6	600
Oct-06	280	3.02	2310
Dec-06	218	2.96	2180
Apr-07	234	2.9	2210
Apr-08	641	2.84	2460
Oct-08	393	2.37	2130
Apr-09	403	2.7	. 2180
Sep-09	420	2.72	2270
avg	370	2.79	2249

Nitra	e/Nitrite as N (m	g/L)
	10.000	
	4.230	
	4.850	
	0.150	
	5.750	
	6.390	
	4.274	

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RO Reject			
Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
WQCC limit	250	1.6	600
Mar-04	301	2.92	1530
Jun-04	69.5	3.82	1710
Sep-04	44.1	3.16	1410
Feb-07	583	3.38	1920
Jul-07	328	2.91	1560
Dec-07	464	3.46	1910
Feb-08	417	2.55	1540
May-08	293	2.82	1530
Aug-08	241	3.98	1980
Dec-08	307	3.76	1810
Feb-09	325	3.17	1740 ·
May-09	392	2.83	1740
Aug-09	461	3.62	1870
Nov-09	525	3.92	2040
Feb-10	355	3.1	1650
May-10	180	2.66	1290
Aug-10	357	3.95	2220
Nov-10	344	3.46	1750
Feb-11	378	2.76	1480
May-11	167	3.59	1930
avg	327	3.29	1731

RW 1 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Apr-08	336	0.914	701	0.100
Sep-08	266	0.85	595	0.500
Apr-09	312	0.573	736	0.150
Oct-09	324	0.597	671	0.500
Nov-10	296	0.755	905	10.000
avg	307	0.738	722	2.250

RW 2 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Oct-10	271	0.966	34.3	10.000
avg	271	0.97	34.3	10.000

RW 4 Arcadis Rpt Feb 2011

Sample Date Chloride (mg/L) Fluoride (mg/L) Sulfate (mg/L) Nitrate/Nitrite as N (mg/L)

WQCC limit	250	1.6	600	10.000
Apr-10	297	0.667	404	0.500
avg	297	0.67	404.0	0.500

RW 7 Arcadis Rpt F	eb 2011
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			1	Nitrate/Nitriteras N (mg/U)
WOCCTIMI		1.6	600	10.000
Apr-10	280	0.709	164	0.500
avg	280	0.71	164.0	0.500

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Apr-10	296	1.22	878	0.500
Apr-10	251	1.33	750	0.500
avg	274	1.275	814	0.500

RW 10 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Apr-10	183	2.74	1430	0.500
avg	183	2.740	1430	0.500

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCCIlimit	250	1.6	600	10.000
Nov-10	189	0.605	766	10.000
avg	189	0.605	766	10.000

Sample Dat	e Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Apr-10	535	4.92	3000	1.460
avg	535	4.92	3000	1.460

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Mar-10	494	2.61	3320	
avg	494	2.61	3320	#DIV/0!

RW 18

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
WQCC limit	250	1.6	600
Apr-08	261	2.31	3400
Sep-08	283	1.95	3190
Apr-09	321	, 1.98	3140
Sep-09	309	1.93	2920
Apr-10	362	2.3	3190
avg	307	2.09	3168

RW-18 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Apr-08	261	2.31	3400	1.000
Sep-08	283	1.95	3190	0.925
Apr-09	321	1.98	3140	1.070
Sep-09	309	1.93	2920	1.530
Apr-10	362	2.3	3190	0.822
avg	307	2.094	3168	1.069

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RA-313 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Mar-08	28.4	0.843	483	1.000
Sep-08	16	0.775	441	0.636
Sep-08	15.6	0.776	436	0.639
Oct-09	15.2	0.711	429	1.140
Apr-10	33.6	0.698	494	0.500
Apr-10	34.3	0.698	496	0.992
avg	24	0.750	463	0.818

RA-1227 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Nov-10	135	0.373	1340	10.000
Nov-10	140	0.344	1340	10.000
avg	138	0.359	1340	10.000

RA-3156 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Mar-08	233	0.136	1570	5.690
Sep-08	235	0.181	1540	5.640
Apr-09	218	0.25	1490	5.280
Apr-10	209	0.1	1570	5.120

Nov-10	215	0.235	1460	10.000	7
avg	222	0.180	1526	6.346	

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Mar-08	677	0.486	1280	0.100
Sep-08	268	0.2	1190	0.500
Apr-09	875	0.25	1230	0.150
Sep-09	329	0.5	1280	0.500
Apr-10	187	0.115	1120	0.500
Nov-10	201	0.274	1150	10.000
avg	423	0.304	1208	1.958

RA-4798 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Mar-08	77.4	0.293	875	1.000
Sep-08	84.8	0.23	876	0.500
Apr-09	70	0.25	768	0.500
Sep-09	165	0.5	1560	0.758
Apr-10	73	0.154	842	1.200
Nov-10	139	0.251	1210	10.000
avg	102	0.280	1022	2.326

KWB 2R Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Suitate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Oct-10	363	1.73	13.2	0.100
avg	363	1.73	13.2	0.100

KWB-3AR Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Suffate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.00
Apr-08	206	0.213	2600	22.60
Sep-08	243	0.28	2770	19.70
Sep-08	248	0.261	2790	19.90
Apr-09	176	0.25	2780	12.10
Sep-09	176	0.5	3050	11.90
Apr-10	292	0.284	3200	18.00
Oct-10	216	0.511	2810	8.78
Oct-10	237	0.501	2720	9.14
avg	224	0.35	2840	15.27

KWB-7 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit		1.6		10.000
Apr-08	393	0.566	722	3.630
Sep-08	585	0.645	1120	14.800
Apr-09	474	0.5	860	5.740
Oct-09	517	0.789	1010	7.150
Apr-10	419	0.771	895	1.270
Oct-10	468	0.87	830	0.518
avg	476	0.690	906	5.518

KWB-9 Arcadis Rpt Feb 2011

Sample Date:	Chloride (mg/L)	Fluoride (mg/U)	Suffate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250		600	10.000
Apr-08	189	0.259	1290	1.000
Apr-08	197	0.252	1330	1.000
Sep-08	196	0.308	1340	0.500
Apr-09	205	0.25	1370	0.564
Sep-09	242	0.5	1450	1.170
Apr-10	269	0.198	1570	1.650
Oct-10	259	0.358	1510	0.508
avg	228	0.311	1428	0.899

KWB 10 ALS Data

	ALC Data		
Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
WQCC limit	250	1.6	600
Oct-06	181	0.776	1820
Dec-06	201	0.797	1810
Apr-07	176	0.728	1760
Sep-07	186	0.219	1640
Apr-08	160	0.64	1760
Sep-08	196	0.653	1940
Apr-09	181	0.384	1760
Oct-09	157	0.501	1710
Apr-10	158	0.582	1900
Apr-11	147	0.619	1630
avg	174	0.59	1773

KWB-11A Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sullate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit 🕷	250	1,6	600	10.000
Apr-08	1060	0.615	1500	5.94
Sep-08	591	0.584	647	22
Apr-09	864	0.5	814	30.1
Oct-09	890	0.84	954	33.7
Apr-10	909	0.633	879	27.4
Oct-10	960	1.01	903	26.9
avg	879	0.70	950	24.3

KWB-11B Arcadis Rpt Feb 2011

Sample Date:	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit 2	250	1:6	600	10.000
Oct-10	288	0.483	1180	1.26
avg	288	0.48	1180	1.26

KWB-12A Arcadis Rpt Feb 2011

Sample Date:	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC:limit @	250	1.6	600	10.000
Sep-08	114	0.436	2260	5.99
Sep-09	130	0.5	2290	5.47
Oct-10	126	0.447	2200	5.61
avg	123	0.46	2250	5.69

KWB-12B Arcadis Rpt Feb 2011

	HONGE (HIG/L)	Huonde (mg/L)	Suitate (mg/L)	«Nitrate/Nitrite as N (mg/L)»
WQCC limit 🕷 📖	250	1:6	800	10.000
Oct-10	116	0,305	2090	4.42
avg	116	0.31	2090	4.42

KWB13 ALS Data

Sample Date:	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)
WQCC limit 38	250	1.6	600
Oct-06	181	0.776	1820
Dec-06	201	0.797	1810
Apr-07	176	0.728	1760
Sep-07	186	0.219	1640
Apr-08	160	0.64	1760
Sep-08	196	0.653	1940
Apr-09	181	0.384	1760
Oct-09	157	0.501	1710
Apr-10	158	0.582	1900
Apr-11	147	0.619	1630
avg	174	0.59	1773

KWB-13 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluonde (mg/L)	Sultate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.000
Apr-08	160	0.64	1760	14.5
Sep-08	196	0.653	1940	17.9
Apr-09	181	0.5	1760	13
Apr-09	181	0.5	1760	13.8
Sep-09	157	0.501	1710	14,4
Apr-10	158	0.582	1900	14.5
avg	172	0.56	1805	14.68

Comple Date				
Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.0
Apr-08	231	1.99	1610	0.1
Sep-08	147	2.75	1850	0.5
Apr-09	249	1.96	919	0.15
Apr-09	251	1.93	908	0.5
Sep-09	126	2.14	507	1.0
Apr-10	170	2.59	2150	0.5
Oct-10	256	2.24	967	10.0
avg	204	2.23	1273	1.8

TEL 1 Arcadis Rpt Feb 2011

TEL 2 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.0
Apr-08	378	0.75	464	0.1
Apr-08	373	0.74	462	0.1
Sep-08	380	0.90	872	0.5
Apr-09	392	0.56	825	0.15
Sep-09	411	0.90	737	1.0
Apr-10	278	0.83	1130	0.5
Oct-10	188	1.07	746	0.293
avg	343	0.82	748	0.4

TEL 3 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.0
Apr-08	263	2.46	1560	0.1
Apr-09 Sep-09	597	2.06	580	0.5
Sep-09	34.2	2.93	1520	1.0
Apr-10	14.2	2.92	1640	0.5
Apr-10	14	2.89	1530	0.5
Oct-10	8.82	3.14	1300	10.0
avg	155	2.73	1355	2.1

TEL 4 Arcadis Rpt Feb 2011

Sample Date	Chloride (mg/L)	Fluoride (mg/L)	Sulfate (mg/L)	Nitrate/Nitrite as N (mg/L)
WQCC limit	250	1.6	600	10.0
Apr-08	435	0.61	472	0.1
Sep-08	375	0.79	495	0.5
Apr-09	508	<0.50	680	0.15
Sep-09	595	0.62	844	1.0
Apr-10 Oct-10	523	0.60	957	0.5
Oct-10	414	0.79	556	0.1
avg	475	0.68	667	0.4

Chavez, Carl J, EMNRD

From:	proofpoint-pps@HOLLYCORP.COM
Sent:	Thursday, November 03, 2011 3:08 PM
То:	Chavez, Carl J, EMNRD; Bailey, Jami, EMNRD; VonGonten, Glenn, EMNRD; Sanchez,
	Daniel J., EMNRD; Dade, Randy, EMNRD
Subject:	HollyFrontier Email Policy Violation - Max Email Size Exceeded

A message was sent to you from <u>Johnny.Lackey@hollyfrontier.com</u> containing the subject of RE: Artesia Refinery (GW-032) RO Reject Water Revision, with a size of 0 which exceeded the HollyFrontier Email Max Size limit of 20MB or 20000000KB. This message was rejected by the HollyFrontier mail system and was not delivered.

To resolve this issue, please contact the sender and have them split the email up into smaller separate emails less than 20MB.

Please contact the HollyFrontier IT Department if you have any questions.

Chavez, Carl J, EMNRD

From: Sent:	Lackey, Johnny [Johnny.Lackey@hollyfrontier.com] Thursday, November 03, 2011 3:14 PM
То:	Chavez, Carl J, EMNRD
Cc:	Bailey, Jami, EMNRD; VonGonten, Glenn, EMNRD; Sanchez, Daniel J., EMNRD; Dade, Randy, EMNRD
Subject:	RE: Artesia Refinery (GW-032) RO Reject Water Revision
Attachments:	RO Reject April 8 1996 Navajo to Roger Anderson.pdf; Proposed DP revision and comments (2).DOC; RO Reject July 7 2006 Email NMED to OCD.pdf; RO Reject April 17 2003 OCD to Darrell Moore.pdf; RO Reject March 27 1999 OCD to Darrell Moore.pdf; RO Reject January 26 1999 Navajo to Wayne Price.pdf

Carl.

Attached are Navajo's comments to the "revised subject language" you provided on October 25th. (I'm having to send in batches due to email size restrictions).

I am also attaching several documents that clearly show that the OCD **<u>DID</u>** authorize discharge of the RO Reject stream for ground application, dating back to 1993. I realize there are quite a few documents attached but I have highlighted the passages that pertain to the RO Reject so you won't have to search through the entire document(s). This authorization is included in approved/issued Discharge Permits and includes constituent limits that are above the State's groundwater limits. Most of these documents were downloaded from the OCD's web site.

Navajo request's that the OCD remove the condition(s) from the Draft Discharge Permit requiring Navajo to cease discharge of the RO Reject stream to our property allowing continued discharged as authorized by the OCD.

Thanks,

Johnny Lackey Sr. Environmental Manager The HollyFrontier Companies P.O. Box 159 501 E. Main St. Artesia, NM 88211-0159 Office - 575-746-5490 Cell - 972-261-8075 Fax - 575-746-5451 Johnny Lackey@hollyfrontier.com

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From: Chavez, Carl J, EMNRD [mailto:CarlJ.Chavez@state.nm.us]
Sent: Tuesday, October 25, 2011 4:51 PM
To: Lackey, Johnny
Cc: VonGonten, Glenn, EMNRD
Subject: RE: Artesia Refinery (GW-032) RO Reject Water Revision

Johnny:

Ok. November 4, 2011. Thanks.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: Carl J. Chavez@state.nm.us Website: <u>http://www.emnrd.state.nm.us/ocd/</u> "Why not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward with the Rest of the Nation?" To see how, go to "Pollution Prevention & Waste Minimization" at: <u>http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental</u>)

From: Lackey, Johnny [mailto:Johnny.Lackey@hollyfrontier.com]
Sent: Tuesday, October 25, 2011 4:34 PM
To: Chavez, Carl J, EMNRD
Subject: RE: Artesia Refinery (GW-032) RO Reject Water Revision

Carl. Darrell is on vacation this week and will not get a chance to review before next week. I would like his input/comments on the suggested revisions. Would November 4th be acceptable to get our reply to you?

Johnny Lackey Sr. Environmental Manager The HollyFrontier Companies P.O. Box 159 501 E. Main St. Artesia, NM 88211-0159 Office - 575-746-5490 Cell - 972-261-8075 Fax - 575-746-5451 Johnny.Lackey@hollyfrontier.com

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From: Chavez, Carl J, EMNRD [mailto:CarlJ.Chavez@state.nm.us]
Sent: Tuesday, October 25, 2011 4:24 PM
To: Moore, Darrell; Lackey, Johnny
Subject: Artesia Refinery (GW-032) RO Reject Water Revision

Hey guys.

Please find attached the revised subject language that I promised to send you.

Please reply with any comments, suggested revisions, etc. on or before this Friday, October 28, 2011.

Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: CarlJ.Chavez@state.nm.us Website: <u>http://www.emnrd.state.nm.us/ocd/</u> "Why not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward with the Rest of the Nation?" To see how, go to "Pollution Prevention & Waste Minimization" at: http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental)

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attachments. Unless expressly stated, nothing contained in this message should be construed as a digital or electronic signature or a commitment to a binding agreement.

H. OTHER REQUIREMENTS:

1. Effluent Monitoring System: The Owner/Operator shall prevent the discharge(s) of Reverse Osmosis (RO) reject fluids and/or any other waste water effluent discharge(s) from the facility treatment system to the environment (*i.e.*, farm fields, Eagle Draw, etc.) so that toxic pollutant(s) as defined in Section 20.6.2.7(WW) NMAC shall not move directly or indirectly into ground water to cause degradation of the ground water beyond the limits of the standards of Section 20.6.2.3103 NMAC. If the existing concentration of any water contaminant in background ground water exceeds the standard of Section 20.6.2.3103 NMAC, no degradation of the ground water beyond the allowed.

Navajo Comment: The proposed condition is merely a restatement of the discharge permit approval criteria. The RO reject water discharge has been approved by OCD for approximately 18 years. There is no indication or explanation that the OCD no longer believes that the discharge is approvable. Therefore, this condition is unnecessary. If the OCD believes that the discharge is causing exceedances of the ground water standards, it has a remedy under 20.2.3109.E NMAC.

Navajo is attaching documentation (via email) from April 27, 1993 to present that clearly shows that OCD authorized this discharge and included limits in the permit(s) issued that are above 20.6.2.3103 NMAC standards.

NOTE: The water being used as makeup water to the RO unit is fresh well water from Navajo's water wells (from the same aquifer the city gets it's drinking water from), mixed with purchased city water. The RO makeup water is then used to feed the refinery's steam generating boiler's which produce steam used throughout the refinery. <u>At NO point</u> in this operation is process water or wastewater used as makeup water to the RO Unit.

a. From the date of permit issuance, the Owner/Operator shall sample and/or monitor background monitoring wells and RO reject fluid effluent on a monthly basis for 3 months for the above listed constituents. The environmental sampling and analytical laboratory data results shall meet OCD data quality objectives (DQOs) and quality assurance/quality control (QA/QC) standards. Environmental data sheets with raw analytical data results from the Environmental laboratory shall be attached to any report.

Navajo Comment: There are sufficient analytical results from the last 18 years to make the determination. There is no need for this additional sampling and Navajo requests that it be removed. Additionally, the OCD's DOQs and QA/QC standards are not regulations and cannot be imposed as requirements in discharge permits.

b. Within 4 - months of permit issuance, the owner/operator shall submit a "Effluent Monitoring Report" (Report) with an evaluation of the environmental analytical data monitoring results, data summary sheets, and any observations and conclusions based on the analytical data derived from environmental sampling and monitoring. The report shall indicate any exceedance of the constituents. If the analyses confirm

an exceedance, then the report shall also include an OCD C-141 Form documenting the release and comply with Condition 2F.

Navajo Comment: Based on documentation from the OCD authorizing this discharge for at least the last 18 years, Navajo requests that this requirement be removed from the permit.

- c. Within 6 months of permit issuance, and if an OCD C-141 Form is submitted with the Report, the owner/operator shall submit a "Waste Water Effluent Remediation Plan" (Plan) to the OCD for review. The Plan shall identify, describe and propose the recommended environmental engineering remedy (ies) that are feasible; will adequately address the environmental violation(s); and provide a timetable for submitting an engineering design plan with work schedule for implementation. The final remedial action plan must be approved by the OCD. OCD shall consider the cause of any project management delays that may affect H(1)(d) below. *Navajo Comment*: Based on documentation from the OCD authorizing this discharge for at least the last 18 years, Navajo requests that this requirement be removed from the permit. Further, the process outlined in this paragraph is inconsistent with the process specified in the WQCC regulations, 20.6.2.3103.E NMAC.
- **d.** Within 1- year of permit issuance, the approved remedial action shall be designed, substantially constructed, and monitored to confirm compliance with the above regulations.

Navajo Comment: Based on documentation from the OCD authorizing this discharge for at least the last 18 years, Navajo requests that this requirement be removed from the permit. Moreover, the timetable specified in this paragraph is unreasonable and insufficient to effectively implement any remedial action required.

Chavez, Carl J, EMNRD

From:	Lackey, Johnny [Johnny.Lackey@hollyfrontier.com]
Sent:	Thursday, November 03, 2011 3:15 PM
То:	Chavez, Carl J, EMNRD
Cc:	Bailey, Jami, EMNRD; VonGonten, Glenn, EMNRD; Sanchez, Daniel J., EMNRD; Dade,
	Randy, EMNRD
Subject:	RE: Artesia Refinery (GW-032) RO Reject Water Revision
Attachments:	RO Reject March 27 1999 Letter from OCD to Navajo.pdf; Ro Reject August 1994 Navajo to
	Roger Anderson.pdf; Ro Reject February 25 1994 Navajo to Roger Myers.pdf; RO Reject
	June 8 1993 Navajo to Roger Anderson.pdf; RO Reject April 21 1993 Letter form OCD to
	Roger Anderson pdf; RO Reject April 17 2003 GW-028 Issued Permit pdf

Vol. 2

Johnny Lackey Sr. Environmental Manager The HollyFrontier Companies P.O. Box 159 501 E. Main St. Artesia, NM 88211-0159 Office - 575-746-5490 Cell - 972-261-8075 Fax - 575-746-5451 Johnny.Lackey@hollyfrontier.com

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NEW MEXICO ENERGY, MINERALS & NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION 2040 South Pacheco Street Santa Fe, New Mexico 97605 (506) 927-7131

March 27, 1999

CERTIFIED MAIL RETURN RECEIPT NO. Z 357 870 114

Mr. Darrell Moore Environmental Manager for Water and Waste Navajo Refining Company P.O. Box 159 Artesia, New Mexico 88211-0159

Re: Minor Permit Modification to GW-28, Navajo Refining Co., Eddy County, NM

Dear Mr. Moore:

The New Mexico Oil Conservation Division (NMOCD) is in receipt of Navajo Refining Company's (NRC) letter dated January 26, 1999 requesting that permit GW-28 be modified to include using "RO Reject" water to be used as irrigation water on additional property owned and operated by Navajo which is adjacent to the existing farm property. This request is hereby approved.

Please be advised that NMOCD approval of this site does not relieve NRC of liability should their operations pose a threat to ground water, surface water, human health or the environment. In addition, NMOCD approval does not relieve NRC of responsibility for compliance with any other federal, state, or local laws and/or regulations.

If you have any questions, please contact Wayne Price of my staff at (505)827-7155.

Sincerely Yours,

Roger C. Anderson Environmental Bureau Chief

xc: OCD Artesia District Office

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REFINING COMPANY

501 EAST MAIN STREET © P. O. BOX 159 ARTESIA, NEW MEXICO 88211-0159

February 25, 1994

Robert L. Myers II Petroleum Engineering Specialist Oil Conservation Division-Environmental Bureau P.O. Box 2088 State Land Office Bldg. Santa Fe, NM 87504

RECEND

EASYLINK 62905278

FAX (505) 746-6410 ACCTG (505) 746-6155 EXEC

(505) 748-9077 ENGR

(505) 746-4438 P / L

FEB 2 8 1994

OIL CONSERVATION DIV. SANTA FE

RE: Discharge Plan GW-28 Navajo Refining, Eddy County, New Mexico

Dear Mr. Myers:

Enclosed are Navajo's responses to your letter of November 9, 1993. We regret the delay in responding to this request. Your comments are listed below with Navajo's response in bold type.

- A. <u>Discharge Plan (and modifications) Reporting Requirements:</u>
- 1. <u>Annual Sampling</u> of the pipeline effluent for BTEX, major cations/anions, fluoride, WQCC metals and PAH's.

This sampling was done on January 12, 1994 and the results were forwarded to OCD.

¹². <u>Annual split sampling (with OCD)</u> of monitoring wells for water level, pH and conductivity from field measurements, and for BTEX, major cations/anions and fluoride from laboratory analysis. Monitor wells MW-4 and MW-6 will also be analyzed for naphthalene and mononaphthalene.

This sampling was done December 20, 1993 and the report sent to OCD on January 12, 1994. Our understanding, based on OCD's letter of October 21, 1991, is that these wells are on a staggered schedule with basically half of the wells done in January and half in June, except that MW-4 and MW-5 are monitored semiannually.

- Semi-annual monitoring of wells MW-4 and MW-5 for water level, pH and conductivity from field measurements, and for BTEX, major cations/anions and fluoride from laboratory analysis;
 See #2 above.
- 4. <u>Quarterly sampling of the RO reject water for those constituents listed in the 4/27/93 discharge plan modification (and amended fluoride standard-OCD 6/29/93);</u>

An Independent Refinery Serving ... NEW MEXICO • ARIZONA • WEST TEXAS

TELEPHONE (505) 748-3311 The RO reject water was sampled for the quarterly constituents on January 12, 1994. Those results were forwarded to OCD.

5. <u>Bi-weekly sampling of the Reverse Osmosis (RO) reject water for major</u> cations/anions and heavy metals (request with OCD to relax this to quarterly based on analysis results);

This sampling is being done on a bi-weekly basis with results forwarded to OCD as they are received. Navajo still believes that there is no analytical reason for continuing the bi-weekly sampling of this reject water. The results have been consistent with very little fluctuation.

- 6. <u>Daily monitoring and recording</u> of the pipeline effluent discharge flow quantities; Navajo is monitoring the RO reject effluent to Eagle Draw and our farm on a daily basis but we are not aware of any requirement to monitor the pipeline effluent. The RO reject flow is reported quarterly when the quarterly RO samples are reported.
- 7. Copies of all reports and correspondence with EPA and NMED referencing refinery SWMU's.

The SWMU's that the refinery is aware of are the Truck-By-Pass Landfarm, the Evaporation Ponds and Three Mile Ditch. <u>All</u> reports and correspondence with EPA and NMED concerning these units would cover several shelves. Navajo would like to suggest that you come to the refinery and go over these volumes and decide what you think is important. We could then make copies of those select documents. You could do this at the next quarterly sampling when we split samples. If you do want the complete list, Navajo will send that.

- B. <u>Unresolved Questions Based on File Review</u>
- 1. What is the progress status of the closure of the oil and tank bottoms in the earthen sludge pit adjacent to Tank 835?

We are currently working the pit and recovering product using a contractor, Talon Industries. However, the cold weather has hampered the progress. The pit is approximately 85% completed.

2. A time table for the completion of integrity testing of all below grade waste piping was to be submitted after verification, which was submitted in February, 1991. The timetable is to be submitted and testing performed prior to renewal of the current discharge plan, which expires October 21, 1996. This is to include the three mile long effluent pipeline from the main refinery complex to the disposal ponds.

It is Navajo's understanding that this request is limited to piping and sewers over 25 years old. The only piping or sewers that are over 25 years old are in the North Plant. Navajo will evaluate and test these sewers as needed to accomplish the task by 10/21/96. Also, Navajo will test the effluent pipeline to the ponds before the October 21, 1996 deadline.

3. What is the progress status of closure of Pond #1?

The soil in pond #1 is being turned over regularly by trac-hoes belonging to Sweat Construction and contracted to Navajo. In addition, the pond is tilled on a regular basis. These measures enhance biological activity

2

and at this time approximately 80% of the pit is degraded with patches in the corners needing additional attention. Navajo estimates the remaining 20% of the pit will require 6 months to a year to be completed. EPA has requested a more structured closing of the pond and we have also done additional testing of the TPH in the pond #1 soils at EPA's request.

4. Has the catchment and drainage for tanks 130, 132, 133, and 135 been installed as per the drawings submitted to OCD in July 1990?

The catchment and drainage for these tanks was never installed. These tanks are not in use now and they will be removed in the near future.

- C. Cleanup and Containment Needs
- 1. The muratic acid saddle tank and the oil /water drum in the Asphalt Loading Area need cleaned up and contained.

The muratic acid tank has not been used for several years and is on schedule to be taken out and disposed of. The drums at the Asphalt Loading Rack are used to hold discarded test asphalt and any spills in the area that are picked up. Navajo's position on these barrels is that since they contain asphalt, no containment is warranted. However, we will be happy to work with OCD on this question.

2. Transfer pumps and open drums containing oil at the Asphalt Tank Farm need cleaned up and contained.

Again, these pumps and drums are used to hold and move asphalt which is used to pave roads. Navajo feels no containment is needed. Again, we would be glad to discuss this with you.

3. Pumps at the South Plant Cooling Tower area, and transfer pumps and spills throughout the Vacuum Tower area need cleaned up and contained. The dicsel saddle tank in this area needs cleaned up and curbs added to pad to contain spills. Drip trays for pumps and compressors should be monitored and drained before they spill over.

Navajo will schedule these through our maintenance department to be taken care of.

4. At the South Plant Water Treating Area, numerous pump pads need cleaned up and leaks contained, and spill trays are overflowing.

These will be taken care of as #3 above.

5. The pad containing treatment chemicals at the South Plant Distillation Tower needs some type of containment to prevent leaks or spills from running off the pad.

This area contains I-pac containers which are on cement without lips. Lips will be added to the pad.

6. The area north of the Distillation Tower has contaminated soils which need to be cleaned up and the source determined.

Navajo will clean up the soil and determine the source of the contamination.

The old oil/water Separator in the South Plant should be closed out.
 Talon Industries, which is the company that is cleaning the pit at Tank 835,

will move to this separator when the pit at 835 is finished. This pit has heavy oil in it which will be recovered and put back through our processes. Navajo would like to keep this separator available for future use. Therefore, we would like to refrain from closing it at this time.

8. Drums in the Product Tank Farm need to be contained and empty drums stored properly.

This is being taken care of plant wide as part of our Storm Water Pollution Prevention Plan (SWPPP).

9. Cleanup and improved containment is needed for the Hazardous Waste Press storage area for the temporary storage of the hazardous waste drums.

The plate press is no longer here at the refinery and the area referenced has been cleaned up. As for the barrels you referred to, Navajo has never stored hazardous waste in drums. These are probably the chemicals that were used by the plate press which are polymers used in the dewatering process. These are also cleaned up.

10. The area around the frac tanks storing sludge needs cleaned up and leaks contained.

This was taken care of and the waste that was picked up was put in a roll-off bin and sent for incineration.

11. The chemical additive saddle tanks in the Gasoline Loading Area need cleaned up and leaks contained.

Navajo agrees and will comply.

- 12. Leaks from the pumps in the Reverse Osmosis Unit are overflowing the pads. See #11 above.
- 13. The compressor dryers in the North Plant Process Area need to be cleaned up and containment installed.

Navajo agrees and containment will be installed.

14. Drums placed throughout the North Plant Process Area to capture drips need to be emptied before they overflow.

This is being taken care of as part of our SWPPP.

15. Soils under the FCC Area pipes and valves just north of the cooling tower need to be cleaned up.

This area has been targeted to be cleaned and paved as part of our Storm Water Pollution Prevention Plan (SWPPP).

16. The pump building in the tank farm area at the northwest end of the facility needs cleaned up and containment installed for the pumps sitting on gravel. Also, the drums at this site should be placed on containment.

Our maintenance department will schedule this area for clean-up and the drums will be taken care of under the SWPPP.

- 17. The transfer pumps west of the tank farm need containment. Navajo agrees and this will be scheduled.
- 18. The Truck Loading Area, the Rail Loading Area and the Diesel Tank Transfer Area all need cleaned up and containment.

4

The Truck Loading Area and Rail Loading Area have containment and those drawings are enclosed. The day before this inspection, we had a spill at the Rail Loading Rack and that has been cleaned up.

19. The storage tanks around the Maintenance Shop need surrounding soils cleaned up and leaks contained.

This will be cleaned up. These units are not storage tanks, but clay filters for the product in the adjacent tank farm.

D. <u>Cleanups Around Tanks</u>

The Following tanks (by area) were noted to have excessive spillage and/or oilstained soils around the structures, valves and transfer pumps, and may also need improved containment for the overflow sumps.

-Tanks 132, 133, and 135

-Tanks 417 and 418

-Tanks 110, 411 and 438

-Tanks 437 and 439

-Tank 54

-Tank 810

-Tank 838

These will be cleaned up.

E. Annual Inspections for Below-Grade Sumps and Tanks

During the May 1993 OCD inspection, it was noted that numerous below-grade sumps and tanks were not equipped with secondary containment or leak detection. Navajo should submit a method(s) and schedule for testing the integrity of <u>ALL</u> sumps and tanks. If any of the sumps or tanks require replacement in the future, or new ones are installed, leak detection must be integrated into the design. The particular sumps and tanks identified during the inspection include:

-Asphalt Loading Area loading pad sump,

-South Plant TCC Tower sumps,

-South Plant Water Treating Area sumps,

-South Plant Distillation Tower sump,

-Tank sumps at the tank farm north of the South Plant,

-Product Tank Farm Tank 110 sump and Tank 438 below-grade tank,

-North Plant Process Area sumps,

-FCC Area Wastewater Separator below-grade tank,

-Northwest tank farm pump house sumps,

-Rail Loading Area sump,

-Diesel Tank 837 below-grade tank,

-Below-grade separator north of Tank 838, and

-Maintenance Shop sumps.

Due to my inexperience in the refinery when this inspection took place, I misidentified several sewer boxes as sumps when Bill Olson asked me about them. Of the above mentioned locations, only the Asphalt Loading Area, tank farm North of the South Plant, Tank 110, Tank 438, Northwest tank farm Slinger House, Rail Loading Area, Tank 837, and Tank 838 actually have sumps. The other "sumps" are actually sewer boxes. Navajo will test these sumps and tanks by filling with water and checking levels over a 24 hour period to see if it falls. This will be done as needed to accomplish by October 21, 1996.

F. Truck By-Pass Landfarm

Roger Anderson has confirmed the verbal permission for the one-time disposal of cooling tower sludge from the Lovington refinery at the Truck-By-Pas Landfarm. However, my file review shows no record of this landfarm being permitted to accept any wastes, whether from the Artesia refinery or the Lovington refinery. In order to bring this landfarm into compliance with WQCC regulations, Navajo shall submit an application to modify Discharge Plan GW-28 to include operation of this landfarm. This application shall include:

1. Initial date of operation of the landfarm;

2. An inventory of all wastes placed on the landfarm, including origin, quantity and date of emplacement of each batch, and records of any tests confirming the non-hazardous nature of each batch;

3. A description of the landfarming procedures being practiced, including spreading rates, lift thicknesses and discing frequencies; and

4. Results of any monitoring data to demonstrate that contaminants are not migrating from the landfarm area.

To assist in the submittal of this application, I have enclosed a copy of OCD's <u>Guidelines for Permit Application, Design, and Operation of Centralized &</u> <u>Commercial Landfarms.</u>

Navajo is in the process of contracting with Waste Management in Rio Rancho to take our non-hazardous waste and landfill it. This should be accomplished by the end of March and further use of the Truck-By-Pass-Landfarm will be discontinued. We will continue to fertilize and disc the landfarm but no additional waste will be applied. For your information, EPA is investigating the Truck-By-Pass Landfarm as part of our RFI into the ponds and ditch. We have done sampling and verification sampling on this unit during the last 6 months.

I hope this adequately answers your concerns about the facility. We are working diligently on these matters and a lot of them dove-tail in with our SWPPP. If you have any questions, please feel free to call me at 748-3311. Thank you for your time in this matter.

Regards,

mull Mme

Darrell Moore Environmental Specialist

encl.



State of New Mexico

JUDITH M. ESPINOSA

ENVIRONMENT DEPARTMENT

RON CURRY DEPUTY SECRETARY

BRUCE KING GOVERNOR 193 AP + 28 AM 9 57

April 21, 1993

Roger Anderson New Mexico Oil Conservation Division P.O. Box 2088 Santa Fe, New Mexico 87504

Re: Navajo Refinery - Discharge Limits Foger Dear Mr. Apderson:

This letter is in response to your request that this office develop effluent limits for the referenced facility. In particular, limits necessary to protect surface water quality standards (WQS) and implement other appropriate requirements of State law regarding surface water quality protection (e.g., WQCC regulation Part 2 and the Water Quality Management Plan). You indicated these effluent limits will be incorporated into the Discharge Plan (DP) being issued by OCD. These limits are necessary because it will be sometime before the U.S. Environmental Protection Agency issues a National Pollutant Discharge Elimination System permit and the company wishes to commence the discharge. You further indicated in your request that OCD preferred effluent limits for all parameters for which there are water quality standards

The following is a table of effluent limits to protect surface water quality; OCD may find it necessary to add to or strengthen these limits to protect ground water:

Total Aluminum	87	ug/l
Total Arsenic	271	ug/l
Total Beryllium	18	ug/l
Total Boron	1441	ug/l
Total Cadmium	96	ug/l
Total Chlordane	0.015	ug/l
Total Chlorine	0.03	mg/l
Total Chromium	2144	ug/l
Total Cobalt	50	ug/l
Total Copper	3373	ug/l
Total Cyanide	18	ug/l
Total Lead	6	ug/l
Total Mercury	0.042	ug/l
Total Nickel	60096	ug/l
NH3-Unionized as N	N 0.07	mg/l



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 13
 (505) 827-2850
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Roger Anderson April 21, 1993 Page 2

Radium 226+228	104	pCi/l
Total Selenium	12	ug/l
Total Silver	0.4	ug/l
Total Vanadium	-585	ug/l
Total Zinc	44030	ug/l
Total Dissolved Solids	644442	mg/l
Total Sulfate	75037	mg/l
Total Chloride	245709	mg/l
Chemical Oxygen Demand ()	COD) 125	mg/l
pH between	6.6 and 8.6	S.U.
flow monitor	and report	MGD

Each limit is a "daily maximum" with the exception of pH.

Suggested Implementation

The following requirements are common to NPDES permits and are suggested for OCD's consideration. It is understood that OCD may already have requirements to the same end.

Analysis for all parameters should be restricted to federally approved methods found in 40 CFR 136, which is standard in NPDES permits. Attached is a list of analytical minimum quantification limits (MQLs) determined by EPA Region VI. In the event that analytical results are less than the MQL, the permittee may report that result as "zero". Sampling and analytical QA/QC records must be kept for all samples. It is especially important to document proper procedure and attainment of MQL detection limits in cases where "zero" is reported as described above.

I recommend that the monitoring frequency should be no less than once per 2 weeks for metals, ammonia, chlorine, chloride, COD, TDS, Sulfate, and radium 226+228. Chlordane or cyanide are less likely to be present from an reverse osmosis (RO) unit, therefore, a once per calendar quarter frequency is suggested. All samples should be "grab". Effluent flow should be monitored no less than once per day instantaneously.

I suggest consideration of a clause allowing reduction, on a parameter-by-parameter basis, of the once per 2 weeks frequency after one year's time. Frequency could be reduced to once perquarter provided all data collected for the parameter in the previous (full) year was no greater than seventy-five percent of the effluent limit. In the case of a reduced schedule if future sampling indicated exceedance of the seventy-five percent of the Roger Anderson April 21, 1993 Page 3

effluent limit value, the monitoring for that parameter would have to return to the once per 2 week frequency. All samples collected must be reported (i.e., if more than the prescribed number are collected) in a monitoring period. Sampling/flow measurement must be representative of the volume and nature of the discharge. Sample data should be summarized and reported to OCD on a quarterly basis and should be due prior to the 15th day of the month following the calendar quarter (e.g., 1st quarter results would be due by April 15th).

- -- -

During the course of this project the U.S. Fish & Wildlife Service also contacted us about this discharge with the common concern of protecting surface water quality, therefore I am also providing them with a copy of this letter. If you have any questions, please contact me at 827-0187 or Glenn Saums at (505) 827-2827.

Sincerely,

Jim Piatt Chief Surface Water Quality Bureau

cc: Mark Wilson, USF&WS

ATTACHMENT TO DISCHARGE PLAN GW-28 MODIFICATION NAVAJO REFINING COMPANY ARTESIA REFINERY DISCHARGE PLAN REQUIREMENTS (April 27, 1993)

- 1. The \$50 filing fee and the \$3910 flat fee (either total payment or installment) will be paid upon receipt of this approval.
- 2. The discharge of reject water from the reverse osmosis treatment facility to Eagle Draw shall not exceed the following standards:

Aluminum	87	ug/l
Arsenic	100	ug/1
Beryllium	18	ug/1
Barium	1000	ug/l
Boron	750	ug/1
Cadmium	10	ug/1
- Chlordane	0.015	
Chlorine	30	ug/l
Chromium	50	ug/l
Cobalt	50	ug/l
Copper	1000	ug/1
Cyanide	18	ug/1
Fluoride 🖉 🧟	· · · · · · · · · · · · · · · · · · ·	- ug/1%
Iron	1000	ug/1
Manganese	200	ug/l
Lead	6	ug/l
Mercury	0.042	ug/l
Nickel	200	uq/1
-NH3 as N	0.07	ug/l
Radium 226+228	30	pČi/l
Selenium	12	ug/1
Silver	0.4	ug/l
Vanadium	282	ug/l
Zinc	10	mc/1
Sulfate		፦ መረሻ / ነ 👘
Chloride	275	mg/1
Total Dissolved	Solids 4555	mg/l
Chemical Oxygen	Demand 125	mg/l
Ph betwee	en 6.6 and 8.6	s.U.

3. Cons stan

Constituents not listed in 2. above for which there are standards established pursuant to WQCC Regulation 3-103 will not exceed the set numerical standard in that regulation.

v 4.

No toxic pollutant listed in WQCC Regulation 1-101 UU. will be present in the discharge.

- 5. SAMPLING: Samples of the discharge will be taken and analyzed on the following schedule:
 - · 1. For major cations/anions and heavy metals on a biweekly (once every two weeks).
 - V 2. All other constituents on a quarterly basis.
 - з. Analysis for all parameters will be pursuant to EPA approved methods.
 - 4. Sampling and analytical QA/QC records will be retained for all sampling events.
 - 5. All samples will be "grab" samples.
 - Discharge flow will be monitored and recorded on a 6. daily basis.
 - × 7. Major cations/anions and heavy metal analysis frequency can be reduced to quarterly, on a parameter-by parameter basis, upon application and OCD approval provided all analytical data in the previous year was no greater than seventy-five (75) percent of the effluent limit.
 - 8. All samples collected in a monitoring period will be reported.
 - 9. Sampling and flow measurement will be representative of the volume and nature of the discharge.
 - 10. Sample data and analytical results will be reported to the OCD on a quarterly basis and are due prior to the 15th day of the month following the calendar quarter. (e.g. 1st quarter results are due prior to April 15).
- 6. The OCD will be notified of any break, spill, blow out, or fire or any other circumstance that could constitute a hazard or contamination.



REFINING COMPANY

EASYLINK 62905278 FAX (505) 746-6410 ACCTG (505) 746-6155 EXEC (505) 748-9077 ENGR (505) 746-4438 P / L

501 EAST MAIN STREET ° P. O. BOX 159 ARTESIA, NEW MEXICO 88211-0159

August 16, 1994

RECEIVED

Mr. Roger Anderson Oil Conservation Division Environmental Bureau Land Office Bldg. P.D. Box 2088 Santa Fe, NM 87501

JUL 1 9 1994

OIL CONSERVATION DIV. SANTA FE

RE: Modification to GW-28, Navajo Refining Co. Eddy County, New Mexico

Dear Roger,

TELEPHONE

(505) 748-3311

In separate letters dated April 27, 1993 and July 25, 1994, OCD approved, with conditions, for Navajo Refifting Company to discharge our RO reject water and our air stripped trench water to an adjacent farm, that is owned by Navajo. This farm has been planted in rye and has used the water for a beneficial purpose.

Navajo is now seeking a modification to our discharge plan (GW-28) to allow us to discharge the above referenced waters to other farms that Navajo owns near our Artesia refinery. Those farms are shown on the enclosed map. In addition, we would like the option to build a holding tank on the west side of the farm so the farmer can use the water in a more controlled fashion. As you are aware, Navajo is actively pursuing options that will allow us to discontinue the use of the evaporation ponds in the near future. The recovered water from our trenches makes up approximately 20% or more of our total. Since this water can be put to beneficial use on these farms, we feel this is an excellent application for this resource.

Let me know if there is anything we can do to speed this process along. Thank you for your time in this matter.

Sincerely,

muell Moore

Darrell Moore Environmental Specialist

Encl.

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TELEPHONE (505) 748-3311



REFINING COMPANY

501 EAST MAIN STREET . P.O. DRAWER 159

62905278 FAX Y (505) 746-6410 ACCTG (505) 746-6155 EXEC 159 (505) 746-4138 P / L RECEIVED

JUN 2 2 1993

OIL CONSERVATION DIV.

EASYLINK

ARTESIA, NEW MEXICO 88211-0159

June 08, 1993 🔧

Roger Anderson Environmental Bureau Oil Conservation Division P.O. Box 26110 Santa Fe, NM 87502

Re: Water Quality Control Commission (WQCC) Regulation 3-105

Dear Mr. Anderson:

As you are aware the Oil Conservation Division (OCD) has issued Discharge Plan GW-28 with modification to allow R.O. Reject water to be discharged into Eagle Creek. Navajo Refining Co. (Navajo) plans to retain and comply with all aspects of that permit for purposes of discharge into Eagle Creek. In maintaining compliance with GW-28 all WQCC Regulations concerning water contaminants are being met either in terms of absolute standards as contained in WQCC Regulations or in terms of standards allowed by regulation through existing conditions.

Due to the fact that Navajo is in compliance with the WQCC Regulations and will continue to test and report discharge contaminants pursuant to Discharge Plan GW-28. The use of the water for irrigated agriculture allows that use to be exempt from Sections 3-104 and 3-106 of the WQCC Regulations. Section 3-104 would, except for the exemption, require a discharge plan modification. Section 3-106 would, except for the exemption, require approval of the director of a discharge plan or modification. The WQCC Regulations require Navajo's R.O. Reject water to meet the criteria of the regulations for purposes of irrigation but do not require a discharge plan or approval because of the use of the water.

The first test results of the R.O. Reject water indicate that Navajo is in compliance with the WQCC regulations for discharges onto or below the surface of the ground. Continued monitoring under GW-28 will allow OCD to monitor the quality of the irrigation water when used for that purpose or when discharged directly into Eagle Creek.

Mr. Anderson Page 2

To be specific, Navajo is not claiming an exemption from regulation by WQCC or OCD authority. Navajo does claim that WQCC Regulation Section 3-105 does apply to the R.O. Reject water in terms of the discharge plan and approval requirements. Based upon this claim Navajo plans to use the R.O. Reject water discharge for irrigation purposes without applying for a modification of Discharge Plan GW-28.

In order to facilitate verification of compliance with the WQCC Regulations, Navajo is enclosing ground water tests of the farm irrigation area showing contaminant levels of the local ground water.

If you find Navajo's interpretation of the WQCC Regulation to be in error please advise the undersigned as soon as possible and direct Navajo in the requirements as interpreted by OCD. Absent notice from you to the contrary Navajo plans to continue irrigation of agricultural land upon expiration of the current emergency discharge permit.

Sincerely,

Ron S. Lova

Regulatory Compliance Auditor

RSL/rh

enclosures



JUN 3 0 2003

OIL CONSERVATION DIVISION

والمجيج المؤلمان بالمراقع والا

April 17, 2003

CERTIFIED MAIL RETURN RECEIPT NO. 5357 7133

Mr. Darrell Moore Environmental Manager for Water and Waste Navajo Refining Company L.P. P.O. Box 159 Artesia, New Mexico 88211-0159

CARL! SEE PAGES 6 AND 7

RE: Discharge Permit GW-028 Artesia Refinery Eddy County, New Mexico

Dear Mr. Moore:

The groundwater discharge permit renewal, GW-028, for the Navajo Refining Company L.P. (Navajo) Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico, is hereby approved under the conditions contained in the enclosed attachment. Enclosed are two copies of the conditions of approval. Please sign and return one copy to the New Mexico Oil Conservation Division (OCD) Santa Fe Office within 30 working days of receipt of this letter.

The original discharge permit was approved on October 21, 1991 with an expiration date of October 21, 1996. The discharge permit renewal application dated June 20, 2001 including attachments, and subsequent information dated March 15, 2002, discharge permit addendum dated May 31, 2002 submitted pursuant to Section 3106 of the New Mexico Water Quality Control Commission (WQCC) Regulations also includes all earlier applications and all conditions later placed on those approvals.

The discharge permit is renewed pursuant to Section 3109.C. Please note Section 3109.G, which provides for possible future amendment of the permit. Please be advised that approval of this permit does not relieve Navajo Refining Company L.P. of responsibility should operations result in pollution of surface water, ground water or the environment. Nor does it relieve Navajo Refining Company L.P. of its responsibility to comply with any other governmental authority's rules and regulations. Please be advised that all exposed pits, including lined pits and open top tanks (exceeding 16 feet in diameter) shall be screened, netted, or otherwise rendered nonhazardous to wildlife including migratory birds.

Please note that Section 3104. of the regulations requires that "when a permit has been approved, discharges must be consistent with the terms and conditions of the permit." Pursuant to Section 3107.C., Navajo Refining Company L.P. is required to notify the Director of any facility expansion, production increase, or process modification that would result in any change in the discharge of water quality or volume.

Pursuant to Section 3109.H.4., this approval is for a period of five years. This approval will expire October 21, 2006 and an application for renewal should be submitted in ample time before that date. Pursuant to Section 3106.F. of the regulations, if a discharger submits a discharge permit renewal application at least 120 days before the discharge permit expires and is in compliance with the approved permit, then the existing discharge permit will not expire until the application for renewal has been approved or disapproved.

The discharge permit application for the Navajo Refining Company L.P., Artesia Refinery is subject to the WQCC Regulation 3114. Every billable facility submitting a discharge permit will be assessed a fee equal to the filing fee of \$100.00 plus flat fee of \$8400.00 for Oil Refineries. The OCD has not received the \$8400.00 flat fee.

÷	Please make all checks payable to: N	Water Quality Management Fund
i		C/o: Oil Conservation Division
1		2040 South Pacheco
i		Santa Fe, New Mexico 87505.
;		

If you have any questions, please contact Wayne Price of my staff at (505-476-3487) or E-mail WPRICE@state.nm.us. On behalf of the staff of the OCD, I wish to thank you and your staff for your cooperation during this discharge permit review.

Sincerely,

Roger C. Anderson Environmental Bureau Chief RCA/lwp Attachment-1 xc: OCD Artesia Office

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ATTACHMENT TO THE DISCHARGE PERMIT GW-028 APPROVAL Navajo Refining Company L.P., Artesia Refinery DISCHARGE PERMIT APPROVAL CONDITIONS April 17, 2003

- Payment of Discharge Permit Fees: The \$100.00 filing fee has been received by the OCD. There is a required flat fee of \$8400.00 for Oil Refineries. The fee may be paid in a single payment due at the time of approval, or in equal annual installments over the duration of the discharge plan, with the first payment due upon receipt of this approval. OCD recommends that Navajo pay the required flat fee 30 days after permit approval. If Navajo chooses to make annual payments then OCD will require documentation of payment to be included in the annual report.
- 2. Commitments: Navajo Refining Company L.P. will abide by all commitments submitted in the discharge permit renewal application dated June 20, 2001 including attachments, subsequent information dated March 15, 2002, discharge permit addendum dated May 31, 2002 and these conditions for approval.
- 3. Drum Storage: All drums containing materials other than fresh water must be stored on an impermeable pad with curbing. All empty drums should be stored on their sides with the bungs in place and lined up on a horizontal plane. Chemicals in other containers such as sacks or buckets must also be stored on an impermeable pad with curbing.
- 4. <u>Process Areas:</u> All process and maintenance areas which show evidence that leaks and spills are reaching the ground surface must be either paved and curbed or have some type of spill collection device incorporated into the design.
- 5. Above Ground Tanks: All above ground tanks which contain fluids other than fresh water must be bermed to contain a volume of one-third more than the total volume of the largest tank or of all interconnected tanks. All new facilities or modifications to existing facilities must place the tank on an impermeable type pad within the berm.
- 6. <u>Above Ground Saddle Tanks</u>: Above ground saddle tanks must have impermeable pad and curb type containment unless they contain fresh water or fluids that are gases at atmospheric temperature and pressure.

- 7. Labeling: All tanks, drums, and other containers should be clearly labeled to identify their contents and other emergency information necessary if the tank were to rupture, spill, or ignite. OCD will allow master plans to be used that identifies all tanks, location, size and contents with a numbering system marked on the tanks which corresponds to plot plans contained in the plan.
- 8. Below Grade Tanks/Sumps/Pits/Ponds: All below grade tanks, sumps, pits and ponds must be approved by the OCD prior to installation or upon modification and must incorporate secondary containment and leak-detection into the design. All below grade tanks, sumps and pits must be tested annually or as specified below (Additional Conditions), except systems that have secondary containment with leak detection. These systems with leak detection shall have a monthly inspection of the leak detection to determine if the primary containment is leaking. Results of tests and inspections shall be maintained at the facility covered by this discharge plan and available for NMOCD inspection. Any system found to be leaking shall be reported pursuant to Item # 12. Permit holders may propose various methods for testing such as pressure testing to 3 pounds per square inch above normal operating pressure and/or visual inspection of cleaned out tanks and/or sumps, or other OCD approved methods. The OCD will be notified at least 72 hours prior to all testing.

APL Separators: A closure plan for OCD approval shall be filed by February 28, 2004 for the Old API separator (South Plant), the North and South Plant current API Separators and the Wastewater Plant Separator.

New Wastewater (Total Plant) API Separator: Navajo must conform to permit condition Item #8. above.

Additional Conditions: Navajo shall develop a spreadsheet that contains all underground tanks/sumps/pits. Each device or system shall have an identification number, drawing reference, date installed, test dates, test method, pass/fail/repair information with signature, and investigation results if applicable. Navajo shall test at a minimum 20% of the total below grade devices each year.

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9. Underground Process/Wastewater Lines: All underground process/wastewater pipelines including the effluent pipeline between the main refinery complex and the disposal wells, must be approved by the OCD prior to installation and must be tested to demonstrate their mechanical integrity every five (5) years. Results of such tests shall be maintained at the facility covered by this discharge plan and available for NMOCD inspection. Permit holders may propose various methods for testing such as pressure testing to 3 pounds per square inch above normal operating pressure or other means acceptable to the OCD. The OCD will be notified at least 72 hours prior to all testing.

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Additional Conditions: Navajo shall develop a spreadsheet that contains all underground process and wastewater lines. Each line shall have an identification number, drawing reference, date installed, test dates, test method, pass/fail/repair information with signature, and investigation results if applicable. Navajo shall test at a minimum 20% of the underground process/wastewater pipelines each year.

- 10. Class V Wells: No Class V wells that inject non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes will be approved for construction and/or operation unless it can be demonstrated that groundwater will not be impacted in the reasonably foreseeable future. Leach fields and other wastewater disposal systems at OCD regulated facilities which inject non-hazardous fluid into or above an underground source of drinking water are considered Class V injection wells under the EPA UIC program. Class V wells that inject domestic waste only must be permitted by the New Mexico Environment Department.
- 11. Housekeeping: All systems designed for spill collection/prevention, and leak detection will be inspected monthly to ensure proper operation and to prevent over topping or system failure. All open to atmosphere spill collection devices will be emptied of fluids, other than rainwater, within 48 hours of discovery. Enclosed secondary containment devices shall be emptied of all fluids within 48 hours to ensure that the primary device is not leaking. A record of inspection will be retained on site for a period of five years.
- 12. Spill Reporting: All spills/releases shall be reported pursuant to OCD Rule 116. and WQCC 1203. to the OCD Artesia District Office.
- 13. Waste Disposal: All wastes will be disposed of at an OCD approved facility. Only oilfield exempt wastes shall be disposed of down Class II injection wells. Non-exempt oilfield wastes that are non-hazardous may be disposed of at an OCD approved facility upon proper waste determination per 40 CFR Part 261. Any waste stream that is not listed in the discharge permit will be approved by OCD on a case-by-case basis.

OCD is attaching a copy of the Non-Hazardous Material Flow Diagram supplied in the discharge plan addendum dated May 31, 2002.

Rule 712 Waste: Pursuant to Rule 712, disposal of certain non-domestic waste is allowed at solid waste facilities permitted by the New Mexico Environment Department as long as the waste stream is identified in the discharge permit, and existing process knowledge of the waste stream does not change without notification to the Oil Conservation Division. The following waste is hereby approved: Solid Waste (Trash/Refuse).

- 14. <u>OCD Inspections</u>: Additional requirements may be placed on the facility based upon results from OCD inspections.
- 15. Storm Water Plan: Navajo Refining Company L.P. shall maintain stormwater runoff controls. As a result of operations if any water contaminant that exceeds the WQCC standards listed in 20 NMAC 6.2.3101 is discharged in any stormwater run-off then Navajo shall notify the OCD within 24 hours, modify the permit within 15 days and submit for OCD approval. Navajo shall also take immediate corrective actions pursuant to Item 12 of these conditions.

Unlined Stormwater Retention Basins: These basins shall be lined, monitored, and records maintained pursuant to Item #8 of these conditions of approval or Navajo may propose an alternate method subject to OCD approval.

- 16. Reverse Osmosis Reject Water:
 - A. The discharge of reject water from the reverse osmosis treatment facility to Navajo Farms shall not exceed the following standards: <u>Discharge to Eagle</u> <u>Draw is prohibited</u>.

Constituent	Concentration	Unit
Aluminum	87	ug/l
Arsenic	100	ug/l
Beryllium	18	ug/l
Barium	1000	ug/l
Boron	750	ug/l

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Cadmium	10	ug/l
Chlordane	0.015	ug/l
Chlorine	30	ug/l
Chromium	50	ug/l
Cobalt	50	ug/l
Copper	1000	ug/l
Cyanide	18	ug/l
Eluoride: Antesar	2500 ***	:==: <u>ug/l:</u>
Iron	1000	ug/l
Manganese	200	ug/l
Lead	6	ug/l
Mercury	0.042	ug/l
Nickel	200	ug/l
NH3 as N	0.07	ug/l
Radium 226+228	30	pCi/l
Selenium	12	ug/l
Silver	0.4	ug/l
Vanadium	282	ug/l
Zinc	10	mg/l
Sulfate	2661.50.000	mg/l
Chloride	Sec. 275 (Sec. 11)	≈∵mg/l∷∷
Total Dissolved Solids	4555	mg/l
Chemical Oxygen Demand	125	mg/l
рН	6.6 to 8.6	S.U.

Bod	< 30	mg/l
TSS	<.5	mg/l
Fecal Coloform Bacteria	<500 organisms	Per/ 100 ml

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*Amended June 29, 1993

- B. Constituents not listed in A. above for which there are standards established pursuant to WQCC Regulation 3103 will not exceed the set numerical standard in that regulation.
- C. No toxic pollutant listed in WQCC regulation 1101 TT. will be present in the discharge.
- D. SAMPLING: samples of the discharge will be taken and analyzed on the following schedule:
 - i. Major cations/anions and heavy metals will be sampled at a minimum of semi-annually.
 - ii. All other constituents will be sampled annually, including the constituents in the above table and Volatile, Semi-Volatile Organic Compounds including Pesticides using EPA methods 624,625 and 608 respectively.
 - iii. Analysis for all parameters will be pursuant to EPA approved methods.
 - iv. Sampling and analytical QA/QC records will be retained for all sampling events.
 - v. All samples will be "grab" samples.
 - vi. Discharge flow will be monitored and recorded on a daily basis.
 - vii. Sampling frequency can be reduced, on a parameter-by-parameter basis, upon application and OCD approval provided all analytical data in the previous year was no greater than seventy-five (75) percent of the effluent limit.
 - viii. All samples collected in a monitoring period will be reported.
 - ix. Sampling and flow measurement will be representative of the volume and

nature of the discharge.

- x. Any constituent that exceeds the standards listed above shall be cause for Navajo to stop discharging to the farm area and provide OCD immediate notification. Navajo may not resume discharging until the problem has been corrected.
- xi. Sample data, analytical results and flow measurements shall be reported to the OCD in the annual report.
- 17. <u>Vadose Zone and Water Pollution</u>: The previously submitted investigation(s) and remediation permits were submitted pursuant to the discharge permit and all future discoveries of contamination will be addressed through the discharge permit process.

Ground Water and Treatment System Monitoring:

- A. Navajo shall collect perimeter groundwater samples on a semi-annual basis from monitoring wells MW-52, KWB-2R, KWB-13, KWB-9, KWB-3A, KWB-11A, KWB-7, NP-1, NP-2 (KWB-45, and MW-18). The samples shall be analyzed for concentrations of benzene, toluene, ethylbenzene and xylene (BTEX), and methyl tertiary butyl ether (MTBE) pursuant to EPA approved methods.
- B. Navajo shall collect groundwater samples on an annual basis from monitoring wells KWB-1A, KWB-1C, KWB-2R, KWB-3A, KWB-4, KWB-5, KWB-6, KWB-8, KWB-9, KWB-10, MW- 18, MW-28, MW-29, MW-45, MW-48, MW-49 and from the following recovery trenches that do not have measurable phase-separated hydrocarbons (PSH's); RW-1 through RW-15, and Bolton Road # 1-4. These samples shall be analyzed for Volatiles, Semi-Volatiles, WQCC Metals, General Chemistry including Major Anions and Cations, nitrate/nitrite, dissolved oxygen and oxidation-reduction potential (ORP) all pursuant to EPA approved methods.
- C. All Recovery Trenches and all wells (including North Colony Landfarm and Tetraethyl-lead wells) with phase-separated hydrocarbons (PSH's) shall be checked at a minimum of once per month and recorded on a spreadsheet. The sheet shall be in table form containing all of the recovery wells, date inspected, product thickness measured to .01 inch, amount of product/water recovered. If product is observed then appropriate steps will be taken to recover product as reasonably possible using the best available technology.

- D. Navajo shall collect groundwater samples from the following irrigation wells at the beginning and end of the irrigation season; RA 313, RA 314, RA3723, RA3156, RA 3353, RA 1331, RA 4196, RA 4798 and Larue well. The samples shall be analyzed for concentrations of benzene, toluene, ethylbenzene and xylene (BTEX), methyl tertiary butyl ether (MTBE), Volitale Organic Compounds (VOC's), Semi-Volatile Compounds, WQCC Metals, General Chemistry including Major Anions and Cations all pursuant to EPA approved methods.
- E. Evaporation Ponds near Pecos River (Out-of-Service): Navajo shall collect perimeter groundwater samples on a bi-annual basis with at least one half of these wells being analyzed each year. The samples shall be analyzed for concentrations of benzene, toluene, ethylbenzene and xylene (BTEX), and methyl tertiary butyl ether (MTBE), Semi-Volatiles, WQCC Metals and General Chemistry including anions and cations pursuant to EPA approved methods. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report.
- F. RCRA Solid Waste Management Units (SMUS) or AREAS OF CONCERN:

Navajo shall collect groundwater samples on a quarterly basis from monitoring wells NCL-32, 33, 34, 44, 49, TEL-1, 2, 3, 4, and from the following monitor wells MW-53, 54A, 55. These samples shall be analyzed for Volatiles, Semi-Volatiles, WQCC Metals, General Chemistry including Major Anions and Cations, nitrate/nitrite, dissolved oxygen and oxidation-reduction potential (ORP) all pursuant to EPA approved methods. Navajo shall incorporate these findings into a summary table with all other monitor points on-site. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report.

- G. ANNUAL REPORT: An annual report will be submitted to the OCD by February 28 of each year. The annual reports will contain:
 - i. A description of the monitoring and remediation activities which occurred during the year including conclusions and recommendations.
 - ii. Summary tables listing past and present laboratory analytic results of all water quality sampling for each monitoring point and plots of concentration vs. time for contaminants of concern from each monitoring point. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report. Copies of the most recent years laboratory analytical data sheets will also be submitted
 - iii. An annual water table potentiometric elevation map using the water table

elevation of the ground water in all refinery monitor wells. A corrected water table elevation shall be determined for all wells containing phase-separated hydrocarbons. This map shall show well locations, pertinent site features, and the direction and magnitude of the hydraulic gradient.

- iv. Plots of water table elevation vs. time for each ground water monitoring point.
- v. A annual product thickness map based on the thickness of free phase product on ground water in all refinery monitor wells. This map shall include isopleth lines for products and contaminants of concern.
- vi. The volume of product recovered in the remediation/treatment system during each quarter and the total recovered to date.
- vii. The volume of total fluids pumped from all recovery wells and trenches during each quarter and the total volume recovered to date.
- viii. <u>Electronic filing:</u> OCD would like to encourage Navajo to file this report in an acceptable electronic format.
- H. Additional Requirements:
 - i. Up-date all on-site and off-site maps, showing the current status of all recovery/monitor/ domestic, irrigation wells and pertinent features including the stormwater basins.
 - ii. Navajo shall investigate the area between monitor well KWB-2R and the refinery to determine if a new remediation recovery trench system is required in this area. The results of this investigation shall be submitted to the OCD by July 15, 2003.
 - iii. Replace MW-1 at the evaporation ponds.
 - iv. If phase separated hydrocarbons are found east of the Bolton Road recovery system, then a new recovery system shall be installed in this area including down-gradient monitor wells. Any wells that reveal contaminants that exceed WQCC groundwater standards shall be reason to install addition wells to determine the extent of contamination. All new

wells shall be added to the maps and included in the annual report.

- v. Bolton Road recovery trench #1 and 2 were noted to be dry. OCD is concerned that contaminants may be flowing under and past these trenches. Please modify these trenches or install monitor wells directly east of these devices by November 15, 2003.
- vi. Navajo shall investigate the area between RW-10 and RW-5 and the refinery to determine if a new remediation recovery trench system is required in this area. The results of this investigation shall be submitted to the OCD by November 15, 2003.
- vii. Navajo shall install an additional monitor well northeast of MW-45. OCD is concerned about contamination migrating off of Navajo property in this area by November 15, 2003.
- viii. Navajo shall notify the OCD Santa Fe and local district office at least 2 weeks in advance of all scheduled activities such that the OCD has the opportunity to witness the events and split samples. For large facilities, i.e. referinies, an annual notification will suffice.
- ix. Navajo shall notify the NMOCD of the discovery of separated-phase hydrocarbons or the exceedance of a WQCC standard in any down gradient monitor well where separate-phase hydrocarbons were not present or where contaminant concentrations did not exceed WQCC standards during the preceding monitoring event pursuant to NMOCD Rule 116.
- 18. Transfer of Discharge permit: The OCD will be notified prior to any transfer of ownership, control, or possession of a facility with an approved discharge permit. A written commitment to comply with the terms and conditions of the previously approved discharge permit must be submitted by the purchaser and approved by the OCD prior to transfer.
- 19. <u>Closure:</u> The OCD will be notified when operations of the facility are discontinued for a period in excess of six months. Prior to closure of the facility a closure permit will be submitted for approval by the Director. Closure and waste disposal will be in accordance with the statutes, rules and regulations in effect at the time of closure.

20. Certification: Navajo Refining Company L.P. by the officer whose signature appears below, accepts this and agrees to comply with all terms and conditions contained herein. Navajo Refining Company L.P. further acknowledges that these conditions and requirements of this may be changed administratively by the Division for good cause shown as necessary to protect fresh water, human health and the environment.

Conditions accepted by:

Navajo Refining Company L.P.

Company Representative- print name 1/1- pate 6/25/03 Company Representative- Si

Title 6/1 DIRECTUR DE ENMRONMENTAL AFFAIRS

Chavez, Carl J, EMNRD

From:	Lackey, Johnny [Johnny.Lackey@hollyfrontier.com]
Sent:	Thursday, November 03, 2011 3:14 PM
To:	Chavez, Carl J, EMNRD
Cc:	Bailey, Jami, EMNRD; VonGonten, Glenn, EMNRD; Sanchez, Daniel J., EMNRD; Dade, Randy, EMNRD
Subject:	RE: Artesia Refinery (GW-032) RO Reject Water Revision
Attachments:	RO Reject April 8 1996 Navajo to Roger Anderson.pdf; Proposed DP revision and comments (2).DOC; RO Reject July 7 2006 Email NMED to OCD.pdf; RO Reject April 17 2003 OCD to Darrell Moore.pdf; RO Reject March 27 1999 OCD to Darrell Moore.pdf; RO Reject January 26 1999 Navajo to Wayne Price.pdf

Carl.

Attached are Navajo's comments to the "revised subject language" you provided on October 25th. (I'm having to send in batches due to email size restrictions).

I am also attaching several documents that clearly show that the OCD <u>DID</u> authorize discharge of the RO Reject stream for ground application, dating back to 1993. I realize there are quite a few documents attached but I have highlighted the passages that pertain to the RO Reject so you won't have to search through the entire document(s). This authorization is included in approved/issued Discharge Permits and includes constituent limits that are above the State's groundwater limits. Most of these documents were downloaded from the OCD's web site.

Navajo request's that the OCD remove the condition(s) from the Draft Discharge Permit requiring Navajo to cease discharge of the RO Reject stream to our property allowing continued discharged as authorized by the OCD.

Thanks,

Johnny Lackey Sr. Environmental Manager The HollyFrontier Companies P.O. Box 159 501 E. Main St. Artesia, NM 88211-0159 Office - 575-746-5490 Cell - 972-261-8075 Fax - 575-746-5451 Johnny.Lackey@hollyfrontier.com

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From: Chavez, Carl J, EMNRD [mailto:CarlJ.Chavez@state.nm.us]
Sent: Tuesday, October 25, 2011 4:51 PM
To: Lackey, Johnny
Cc: VonGonten, Glenn, EMNRD
Subject: RE: Artesia Refinery (GW-032) RO Reject Water Revision

Johnny:

Ok. November 4, 2011. Thanks.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: CarlJ.Chavez@state.nm.us Website: <u>http://www.emnrd.state.nm.us/ocd/</u> "Why not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward with the Rest of the Nation?" To see how, go to "Pollution Prevention & Waste Minimization" at: <u>http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental</u>)

From: Lackey, Johnny [mailto:Johnny.Lackey@hollyfrontier.com]
Sent: Tuesday, October 25, 2011 4:34 PM
To: Chavez, Carl J, EMNRD
Subject: RE: Artesia Refinery (GW-032) RO Reject Water Revision

Carl. Darrell is on vacation this week and will not get a chance to review before next week. I would like his input/comments on the suggested revisions. Would November 4th be acceptable to get our reply to you?

Johnny Lackey Sr. Environmental Manager The HollyFrontier Companies P.O. Box 159 501 E. Main St. Artesia, NM 88211-0159 Office - 575-746-5490 Cell - 972-261-8075 Fax - 575-746-5451 Johnny.Lackey@hollyfrontier.com

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From: Chavez, Carl J, EMNRD [mailto:CarlJ.Chavez@state.nm.us]
Sent: Tuesday, October 25, 2011 4:24 PM
To: Moore, Darrell; Lackey, Johnny
Subject: Artesia Refinery (GW-032) RO Reject Water Revision

Hey guys.

Please find attached the revised subject language that I promised to send you.

Please reply with any comments, suggested revisions, etc. on or before this Friday, October 28, 2011.

Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505

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attachments. Unless expressly stated, nothing contained in this message should be construed as a digital or electronic signature or a commitment to a binding agreement.

Chavez, Carl J, EMNRD

From: Monzeglio, Hope, NMENV

Sent: Friday, July 07, 2006 8:01 AM

To: Chavez, Carl J, EMNRD

Cc: Cobrain, Dave, NMENV

Subject: RE: Navajo Refinery NPDES Permit Issued by EPA

Carl

Thanks for the update and clarifications.

Hope

From: Chavez, Carl J., EMNRD Sent: Thursday, July 06, 2006 4:17 PM To: Monzeglio, Hope, NMENV Cc: Cobrain, Dave, NMENV; Price, Wayne, EMNRD Subject: RE: Navajo Refinery NPDES Permit Issued by EPA

Hope:

Navajo Artesia applied for a permit through the EPA to discharge Reverse Osmosis (RO) water via an NPDES Discharge Permit into the Pecos River because there is an incentive for dischargers of fresh water into Intrastate Waters in NM. However, subsequent to the NPDES permit application, Navajo indicated to the OCD that the water right recharge credits through the OSE were more beneficial than the \$400K/yr incentive to discharge into Intrastate waters; thus, Navajo was no longer interested in discharging to the Pecos River. However, it did not rescind the NPDES permit application through the EPA and the EPA has issued a permit not to discharge. However, if for some reason Navajo discharges to the Pecos River, it will be limited to about 207 gpm discharge with the monitoring requirements specified within the permit.

Page 1 of 3

The RO discharge monitoring required under OCD's discharge planus as follows:

Section 16: Reverse Osmosis Reject Water:

A. The dischg. of reject water from RO treatment facility to Navajo Farms shall not exceed the following stds. in the table (Discharge to Eagle Draw is prohibited): Aluminum (87 ppb); Arsenic (100 ppb); Beryllium (18 ppb); Barium (1000 ppb); Boron (750 ppb); Cadmium (10 ppb); Chlordane (0.015 ppb); Chlorine (30 ppb); Chromium (50 ppb); Cobalt (50 ppb); Copper (1000 ppb); Cyanide (18 ppb); Eluoride (2500 ppb);); Iron (1000 ppb); Manganese (200 ppb); Lead (6 ppb); Mercury (0.042 ppb); Nickel (200 ppb); NH3 as N (0.07 ppb); Radium 226+228 (30 pCi/L); Selenium (12 ppb); Silver (0.4 ppb); Vanadium (282 ppb); Zinc (10 ppm); Sulfate (2661 ppm); Chloride (275 ppm); TDS (4555 ppm); COD (125 ppm); pH (6.6 - 8.6); BOD (,30 ppm); TSS (<0.5 ppm); and Fecal Colliform Bacteria (<500 organisms/100 ml).

Note: * Amended June 29, 1993

B. Constituents not listed in A. above for which there are stds, established pursuant to WQCC Regulation 3103 will not exceed the set numerical std. in that regulation.

C. No toxic pollutant listed in WQCC regulation 1101 TT, will be present in the discharge.

D. Sampling: samples of he dischg. will be taken and analyzed on the following schedule:

i. Major cations/anions and heavy metals will be sampled at a min. of semi-annually.

ii. All other constituents will be sampled annually, including the constituents in the above table and VOCs/SVOCs including Pesticides using EPA methods 624, 625, and 608 respectively.

iii. Analysis for all parameters will be pursuant to EPA approved methods.

iv. Sampling and analytical QA/QC records will be retained for all sampling events.

7/7/2006

v. All samples will be 'grab" samples.

vi. Discharge flow will be monitored and recorded on a daily basis.

vii. Sampling freq. can be reduced, on a parameter-by-parameter basis, upon application and OCD approval provided all analytical data in the previous year was no greater than 75% of the effluent limit.

vili. All samples collected in a monitoring period will be reported.

ix. Sampling and flow measurement will be representative of the volume and nature of the dischg.

x. Any constituent that exceeds the stds. listed above shall be cause for Navajo to stop dischg, to the farm area and provide OCD immediate notification. Navajo may not resume discharging until the problem has been corrected.

xi. Sample data analytical results and flow measurements shall be reported to the OCD in the annual report.

To date, Navajo has been using their injection wells; and are planning to construct another Class I UIC well; and they ve also been able to discharge some of their RO water onto farmland down gradient from the refinery in NM and TX.

Please contact me if you have questions. Thnx.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3491. Fax: (505) 476-3462 E-mail: <u>CarlJ:Chavez@state.nm.us</u> Website: <u>http://www.emhrd:state.nm.us/ocd/</u> (Pollution Prevention Guidance is under "Publications")

From: Monzeglio, Hope, NMENV Sent: Thursday, July 06, 2006 3:13 PM To: Chavez, Carl J, EMNRD Cc: Cobrain, Dave, NMENV; Price, Wayne, EMNRD Subject: RE: Navajo Refinery NPDES Permit Issued by EPA

Carl

Do you know what Navajo is discharging under the NPDES permit? Is Navajo no longer using the injection wells?

Thanks

Hope

From: Chavez, Carl J, EMNRD Sent: Wednesday, July 05, 2006 5:06 PM To: Monzeglio, Hope, NMENV; Cobrain, Dave, NMENV Subject: FW: Navajo Refinery NPDES Permit Issued by EPA

Hope & Dave:

FYI.

Carl J. Chavez, CHMM

New Mexico Energy, Minerals & Natural Resources Dept.

Oil Conservation Division, Environmental Bureau

1220 South St. Francis Dr., Santa Fe, New Mexico 87505

Office: (505) 476-3491

Fax: (505) 476-3462

E-mail: <u>CarlJ.Chavez@state.nm.us</u> Website: <u>http://www.emnrd.state.nm.us/ocd/</u>

7/7/2006

(Pollution Prevention Guidance is under "Publications")

From: Saums, Glenn, NMENV
Sent: Wednesday, July 05, 2006 2:56 PM
To: Price, Wayne, EMNRD
Cc: Powell, Richard, NMENV; Leavitt, Marcy, NMENV; Chavez, Carl J, EMNRD
Subject: Navajo Refinery NPDES Permit Issued by EPA

FYI, see attached.

Glenn

Glenn Saums New Mexico Environment Dept. Surface Water Quality Bureau Point Source Regulation Section P.O. Box 26110 Santa Fe, NM 87502-6110 ph. (505) 827-2827 fax. (505) 827-0160 e-mail: glenn.saums@state.nm.us Page 3 of 3



NEW MEXICO ENERGY, MINERALS & NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION 2040 South Pacheco Street Santa Pe, New Mexico 87505 (505) 827-7131

March 27, 1999

CERTIFIED MAIL RETURN RECEIPT NO. Z 357 870 114

Mr. Darrell Moore Environmental Manager for Water and Waste Navajo Refining Company P.O. Box 159 Artesia, New Mexico 88211-0159

Re: Minor Permit Modification to GW-28, Navajo Refining Co., Eddy County, NM

Dear Mr. Moore:

The New Mexico Oil Conservation Division (NMOCD) is in receipt of Navajo Refining Company's (NRC) letter dated January 26, 1999 requesting that permit GW-28 be modified to include using "RO Reject" water to be used as irrigation water on additional property owned and operated by Navajo which is adjacent to the existing farm property. This request is hereby approved.

Please be advised that NMOCD approval of this site does not relieve NRC of liability should their operations pose a threat to ground water, surface water, human health or the environment. In addition, NMOCD approval does not relieve NRC of responsibility for compliance with any other federal, state, or local laws and/or regulations.

If you have any questions, please contact Wayne Price of my staff at (505)827-7155.

Sincerely Yours,

Roger C. Anderson Environmental Bureau Chief

xc: OCD Artesia District Office

1 11



NEW MEXICO ENERGY, MINERALS and NATURAL RESOURCES DEPARTMENT

BILL RICHARDSON

Governor Joanna Prukop Cabinet Secretary

April 17, 2003

Lori Wrotenbery Director Oil Conservation Division

CERTIFIED MAIL RETURN RECEIPT NO. 5357 7133

Mr. Darrell Moore Environmental Manager for Water and Waste Navajo Refining Company L.P. P.O. Box 159 Artesia, New Mexico 88211-0159

RE: Discharge Permit GW-028 Artesia Refinery Eddy County, New Mexico

Dear Mr. Moore:

The groundwater discharge permit renewal, GW-028, for the Navajo Refining Company L.P. (Navajo) Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico, is hereby approved under the conditions contained in the enclosed attachment. Enclosed are two copies of the conditions of approval. Please sign and return one copy to the New Mexico Oil Conservation Division (OCD) Santa Fe Office within 30 working days of receipt of this letter.

The original discharge permit was approved on October 21, 1991 with an expiration date of October 21, 1996. The discharge permit renewal application dated June 20, 2001 including attachments, and subsequent information dated March 15, 2002, discharge permit addendum dated May 31, 2002 submitted pursuant to Section 3106 of the New Mexico Water Quality Control Commission (WQCC) Regulations also includes all earlier applications and all conditions later placed on those approvals.

The discharge permit is renewed pursuant to Section 3109.C. Please note Section 3109.G, which provides for possible future amendment of the permit. Please be advised that approval of this permit does not relieve Navajo Refining Company L.P. of responsibility should operations result in pollution of surface water, ground water or the environment. Nor does it relieve Navajo Refining Company L.P. of its responsibility to comply with any other governmental authority's rules and regulations. Please be advised that all exposed pits, including lined pits and open top tanks (exceeding 16 feet in diameter) shall be screened, netted, or otherwise rendered nonhazardous to wildlife including migratory birds.

Oil Conservation Division * 1220 South St. Francis Drive * Santa Fe, New Mexico 87505 Phone: (505) 476-3440 * Fax (505) 476-3462 * <u>http://www.emnrd.state.nm.us</u>

Please note that Section 3104. of the regulations requires that "when a permit has been approved, discharges must be consistent with the terms and conditions of the permit." Pursuant to Section 3107.C., Navajo Refining Company L.P. is required to notify the Director of any facility expansion, production increase, or process modification that would result in any change in the discharge of water quality or volume.

Pursuant to Section 3109.H.4., this approval is for a period of five years. This approval will expire October 21, 2006 and an application for renewal should be submitted in ample time before that date. Pursuant to Section 3106.F. of the regulations, if a discharger submits a discharge permit renewal application at least 120 days before the discharge permit expires and is in compliance with the approved permit, then the existing discharge permit will not expire until the application for renewal has been approved or disapproved.

The discharge permit application for the Navajo Refining Company L.P., Artesia Refinery is subject to the WQCC Regulation 3114. Every billable facility submitting a discharge permit will be assessed a fee equal to the filing fee of \$100.00 plus flat fee of \$8400.00 for Oil Refineries. The OCD has not received the \$8400.00 flat fee.

	Please make all checks payable to: Water Quality Management Fund
	C/o: Oil Conservation Division
İ	2040 South Pacheco
	Santa Fe, New Mexico 87505.

If you have any questions, please contact Wayne Price of my staff at (505-476-3487) or E-mail WPRICE@state.nm.us. On behalf of the staff of the OCD, I wish to thank you and your staff for your cooperation during this discharge permit review.

Sincerely,

Roger^CC. Anderson Environmental Bureau Chief RCA/lwp Attachment-1 xc: OCD Artesia Office

ATTACHMENT TO THE DISCHARGE PERMIT GW-028 APPROVAL Navajo Refining Company L.P., Artesia Refinery DISCHARGE PERMIT APPROVAL CONDITIONS April 17, 2003

- Payment of Discharge Permit Fees: The \$100.00 filing fee has been received by the OCD. There is a required flat fee of \$8400.00 for Oil Refineries. The fee may be paid in a single payment due at the time of approval, or in equal annual installments over the duration of the discharge plan, with the first payment due upon receipt of this approval. OCD recommends that Navajo pay the required flat fee 30 days after permit approval. If Navajo chooses to make annual payments then OCD will require documentation of payment to be included in the annual report.
- <u>Commitments:</u> Navajo Refining Company L.P. will abide by all commitments submitted in the discharge permit renewal application dated June 20, 2001 including attachments, subsequent information dated March 15, 2002, discharge permit addendum dated May 31, 2002 and these conditions for approval.
 - Drum Storage: All drums containing materials other than fresh water must be stored on an impermeable pad with curbing. All empty drums should be stored on their sides with the bungs in place and lined up on a horizontal plane. Chemicals in other containers such as sacks or buckets must also be stored on an impermeable pad with curbing.

4. <u>Process Areas:</u> All process and maintenance areas which show evidence that leaks and spills are reaching the ground surface must be either paved and curbed or have some type of spill collection device incorporated into the design.

5. Above Ground Tanks: All above ground tanks which contain fluids other than fresh water must be bermed to contain a volume of one-third more than the total volume of the largest tank or of all interconnected tanks. All new facilities or modifications to existing facilities must place the tank on an impermeable type pad within the berm.

6. <u>Above Ground Saddle Tanks</u>: Above ground saddle tanks must have impermeable pad and curb type containment unless they contain fresh water or fluids that are gases at atmospheric temperature and pressure.

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3.

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- 7. Labeling: All tanks, drums, and other containers should be clearly labeled to identify their contents and other emergency information necessary if the tank were to rupture, spill, or ignite. OCD will allow master plans to be used that identifies all tanks, location, size and contents with a numbering system marked on the tanks which corresponds to plot plans contained in the plan.
- 8. Below Grade Tanks/Sumps/Pits/Ponds: All below grade tanks, sumps, pits and ponds must be approved by the OCD prior to installation or upon modification and must incorporate secondary containment and leak-detection into the design. All below grade tanks, sumps and pits must be tested annually or as specified below (Additional Conditions), except systems that have secondary containment with leak detection. These systems with leak detection shall have a monthly inspection of the leak detection to determine if the primary containment is leaking. Results of tests and inspections shall be maintained at the facility covered by this discharge plan and available for NMOCD inspection. Any system found to be leaking shall be reported pursuant to Item # 12. Permit holders may propose various methods for testing such as pressure testing to 3 pounds per square inch above normal operating pressure and/or visual inspection of cleaned out tanks and/or sumps, or other OCD approved methods. The OCD will be notified at least 72 hours prior to all testing.

APL Separators: A closure plan for OCD approval shall be filed by February 28, 2004 for the Old API separator (South Plant), the North and South Plant current API Separators and the Wastewater Plant Separator.

New Wastewater (Total Plant) API Separator: Navajo must conform to permit condition Item #8. above.

Additional Conditions: Navajo shall develop a spreadsheet that contains all underground tanks/sumps/pits. Each device or system shall have an identification number, drawing reference, date installed, test dates, test method, pass/fail/repair information with signature, and investigation results if applicable. Navajo shall test at a minimum 20% of the total below grade devices each year.

9. Underground Process/Wastewater Lines: All underground process/wastewater pipelines including the effluent pipeline between the main refinery complex and the disposal wells, must be approved by the OCD prior to installation and must be tested to demonstrate their mechanical integrity every five (5) years. Results of such tests shall be maintained at the facility covered by this discharge plan and available for NMOCD inspection. Permit holders may propose various methods for testing such as pressure testing to 3 pounds per square inch above normal operating pressure or other means acceptable to the OCD. The OCD will be notified at least 72 hours prior to all testing.

Additional Conditions: Navajo shall develop a spreadsheet that contains all underground process and wastewater lines. Each line shall have an identification number, drawing reference, date installed, test dates, test method, pass/fail/repair information with signature, and investigation results if applicable. Navajo shall test at a minimum 20% of the underground process/wastewater pipelines each year.

- 10. Class V Wells: No Class V wells that inject non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes will be approved for construction and/or operation unless it can be demonstrated that groundwater will not be impacted in the reasonably foreseeable future. Leach fields and other wastewater disposal systems at OCD regulated facilities which inject non-hazardous fluid into or above an underground source of drinking water are considered Class V injection wells under the EPA UIC program. Class V wells that inject domestic waste only must be permitted by the New Mexico Environment Department.
- 11. Housekeeping: All systems designed for spill collection/prevention, and leak detection will be inspected monthly to ensure proper operation and to prevent over topping or system failure. All open to atmosphere spill collection devices will be emptied of fluids, other than rainwater, within 48 hours of discovery. Enclosed secondary containment devices shall be emptied of all fluids within 48 hours to ensure that the primary device is not leaking. A record of inspection will be retained on site for a period of five years.
- 12. Spill.Reporting: All spills/releases shall be reported pursuant to OCD Rule 116. and WQCC 1203. to the OCD Artesia District Office.
- 13. Waste Disposal: All wastes will be disposed of at an OCD approved facility. Only oilfield exempt wastes shall be disposed of down Class II injection wells. Non-exempt oilfield wastes that are non-hazardous may be disposed of at an OCD approved facility upon proper waste determination per 40 CFR Part 261. Any waste stream that is not listed in the discharge permit will be approved by OCD on a case-by-case basis.

OCD is attaching a copy of the Non-Hazardous Material Flow Diagram supplied in the discharge plan addendum dated May 31, 2002.

Rule 712 Waste: Pursuant to Rule 712, disposal of certain non-domestic waste is allowed at solid waste facilities permitted by the New Mexico Environment Department as long as the waste stream is identified in the discharge permit, and existing process knowledge of the waste stream does not change without notification to the Oil Conservation Division. The following waste is hereby approved: Solid Waste (Trash/Refuse).

14. <u>OCD Inspections:</u> Additional requirements may be placed on the facility based upon results from OCD inspections.

15. Storm Water Plan: Navajo Refining Company L.P. shall maintain stormwater runoff controls. As a result of operations if any water contaminant that exceeds the WQCC standards listed in 20 NMAC 6.2.3101 is discharged in any stormwater run-off then Navajo shall notify the OCD within 24 hours, modify the permit within 15 days and submit for OCD approval. Navajo shall also take immediate corrective actions pursuant to Item 12 of these conditions.

Unlined Stormwater Retention Basins: These basins shall be lined, monitored, and records maintained pursuant to Item #8 of these conditions of approval or Navajo may propose an alternate method subject to OCD approval.

16. Reverse Osmosis Reject Water:

A. <u>The discharge of reject water from the reverse osmosis treatment facility to</u> Navajo Farms shall not exceed the following standards: <u>Discharge to Eagle</u> <u>Draw is prohibited</u>.

Constituent	Concentration	Unit
Aluminum	87	ug/l
Arsenic	100	ug/l
Beryllium	18	ug/l
Barium	1000	ug/l
Boron	750	ug/l

Cadmium	10	ug/l
Chlordane	0.015	ug/l
Chlorine	30	ug/l
Chromium	50	ug/l
Cobalt	50	ug/l
Copper	1000	ug/l
Cyanide	18	ug/l
Eluoride	@2500.*	ug/l
Iron	1000	ug/l
Manganese	200	ug/l
Lead	6	ug/l
Mercury	0.042	ug/l
Nickel	200	ug/l
NH3 as N	0.07	ug/l
Radium 226+228	30	pCi/l
Selenium	12	ug/l
Silver	0.4	ug/l
Vanadium	282	ug/l
Zinc	10	mg/l
Sulfate: A. Car	<u>e 2661 3-, -</u>	mg/1
Chloride	275	mg/l
Total Dissolved Solids	4555	mg/l
Chemical Oxygen Demand	125	mg/l
	6.6 to 8.6	S.U.

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Mr. Darrell Moore

April 17, 2003

Page 8

Bod	< 30	mg/l
TSS	<.5	mg/l
Fecal Coloform Bacteria	<500 organisms	Per/ 100 ml

*Amended June 29, 1993

- B. Constituents not listed in A. above for which there are standards established pursuant to WQCC Regulation 3103 will not exceed the set numerical standard in that regulation.
- C. No toxic pollutant listed in WQCC regulation 1101 TT. will be present in the discharge.
- D. SAMPLING: samples of the discharge will be taken and analyzed on the following schedule:
 - i. Major cations/anions and heavy metals will be sampled at a minimum of semi-annually.
 - ii. All other constituents will be sampled annually, including the constituents in the above table and Volatile, Semi-Volatile Organic Compounds including Pesticides using EPA methods 624,625 and 608 respectively.
 - iii. Analysis for all parameters will be pursuant to EPA approved methods.
 - iv. Sampling and analytical QA/QC records will be retained for all sampling events.
 - v. All samples will be "grab" samples.
 - vi. Discharge flow will be monitored and recorded on a daily basis.
 - vii. Sampling frequency can be reduced, on a parameter-by-parameter basis, upon application and OCD approval provided all analytical data in the previous year was no greater than seventy-five (75) percent of the effluent limit.
 - viii. All samples collected in a monitoring period will be reported.
 - ix. Sampling and flow measurement will be representative of the volume and

nature of the discharge.

- x. Any constituent that exceeds the standards listed above shall be cause for Navajo to stop discharging to the farm area and provide OCD immediate notification. Navajo may not resume discharging until the problem has been corrected.
- xi. Sample data, analytical results and flow measurements shall be reported to the OCD in the annual report.
- 17. Vadose Zone and Water Pollution: The previously submitted investigation(s) and remediation permits were submitted pursuant to the discharge permit and all future discoveries of contamination will be addressed through the discharge permit process.

Ground Water and Treatment System Monitoring:

- A. Navajo shall collect perimeter groundwater samples on a semi-annual basis from monitoring wells MW-52, KWB-2R, KWB-13, KWB-9, KWB-3A, KWB-11A, KWB-7, NP-1, NP-2, KWB-45, and MW-18. The samples shall be analyzed for concentrations of benzene, toluene, ethylbenzene and xylene (BTEX), and methyl tertiary butyl ether (MTBE) pursuant to EPA approved methods.
- B. Navajo shall collect groundwater samples on an annual basis from monitoring wells KWB-1A, KWB-1C, KWB-2R, KWB-3A, KWB-4, KWB-5, KWB-6, KWB-8, KWB-9, KWB-10, MW- 18, MW-28, MW-29, MW-45, MW-48, MW-49 and from the following recovery trenches that do not have measurable phase-separated hydrocarbons (PSH's); RW-1 through RW-15, and Bolton Road # 1-4. These samples shall be analyzed for Volatiles, Semi-Volatiles, WQCC Metals, General Chemistry including Major Anions and Cations, nitrate/nitrite, dissolved oxygen and oxidation-reduction potential (ORP) all pursuant to EPA approved methods.
- C. All Recovery Trenches and all wells (including North Colony Landfarm and Tetraethyl-lead wells) with phase-separated hydrocarbons (PSH's) shall be checked at a minimum of once per month and recorded on a spreadsheet. The sheet shall be in table form containing all of the recovery wells, date inspected, product thickness measured to .01 inch, amount of product/water recovered. If product is observed then appropriate steps will be taken to recover product as reasonably possible using the best available technology.

- D. Navajo shall collect groundwater samples from the following irrigation wells at the beginning and end of the irrigation season; RA 313, RA 314, RA3723, RA3156, RA 3353, RA 1331, RA 4196, RA 4798 and Larue well. The samples shall be analyzed for concentrations of benzene, toluene, ethylbenzene and xylene (BTEX), methyl tertiary butyl ether (MTBE), Volitale Organic Compounds (VOC's), Semi-Volatile Compounds, WQCC Metals, General Chemistry including Major Anions and Cations all pursuant to EPA approved methods.
- E. Evaporation Ponds near Pecos River (Out-of-Service): Navajo shall collect perimeter groundwater samples on a bi-annual basis with at least one half of these wells being analyzed each year. The samples shall be analyzed for concentrations of benzene, toluene, ethylbenzene and xylene (BTEX), and methyl tertiary butyl ether (MTBE), Semi-Volatiles, WQCC Metals and General Chemistry including anions and cations pursuant to EPA approved methods. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report.
- F. RCRA Solid Waste Management Units (SMUS) or AREAS OF CONCERN:

Navajo shall collect groundwater samples on a quarterly basis from monitoring wells NCL-32, 33, 34, 44, 49, TEL-1, 2, 3, 4, and from the following monitor wells MW-53, 54A, 55. These samples shall be analyzed for Volatiles, Semi-Volatiles, WQCC Metals, General Chemistry including Major Anions and Cations, nitrate/nitrite, dissolved oxygen and oxidation-reduction potential (ORP) all pursuant to EPA approved methods. Navajo shall incorporate these findings into a summary table with all other monitor points on-site. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report.

- G. <u>ANNUAL REPORT</u>: An annual report will be submitted to the OCD by February 28 of each year. The annual reports will contain:
 - i. A description of the monitoring and remediation activities which occurred during the year including conclusions and recommendations.
 - ii. Summary tables listing past and present laboratory analytic results of all water quality sampling for each monitoring point and plots of concentration vs. time for contaminants of concern from each monitoring point. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report. Copies of the most recent years laboratory analytical data sheets will also be submitted
 - iii. An annual water table potentiometric elevation map using the water table

> elevation of the ground water in all refinery monitor wells. A corrected water table elevation shall be determined for all wells containing phaseseparated hydrocarbons. This map shall show well locations, pertinent site features, and the direction and magnitude of the hydraulic gradient.

- iv. Plots of water table elevation vs. time for each ground water monitoring point.
- v. A annual product thickness map based on the thickness of free phase product on ground water in all refinery monitor wells. This map shall include isopleth lines for products and contaminants of concern.
- vi. The volume of product recovered in the remediation/treatment system during each quarter and the total recovered to date.
- vii. The volume of total fluids pumped from all recovery wells and trenches during each quarter and the total volume recovered to date.
- viii. <u>Electronic filing:</u> OCD would like to encourage Navajo to file this report in an acceptable electronic format.

H. Additional Requirements:

- i. Up-date all on-site and off-site maps, showing the current status of all recovery/monitor/ domestic, irrigation wells and pertinent features including the stormwater basins.
- Navajo shall investigate the area between monitor well KWB-2R and the refinery to determine if a new remediation recovery trench system is required in this area. The results of this investigation shall be submitted to the OCD by July 15, 2003.
- iii. Replace MW-1 at the evaporation ponds.
- iv. If phase separated hydrocarbons are found east of the Bolton Road recovery system, then a new recovery system shall be installed in this area including down-gradient monitor wells. Any wells that reveal contaminants that exceed WQCC groundwater standards shall be reason to install addition wells to determine the extent of contamination. All new

wells shall be added to the maps and included in the annual report.

- v. Bolton Road recovery trench #1 and 2 were noted to be dry. OCD is concerned that contaminants may be flowing under and past these trenches. Please modify these trenches or install monitor wells directly east of these devices by November 15, 2003.
- vi. Navajo shall investigate the area between RW-10 and RW-5 and the refinery to determine if a new remediation recovery trench system is required in this area. The results of this investigation shall be submitted to the OCD by November 15, 2003.
- vii. Navajo shall install an additional monitor well northeast of MW-45. OCD is concerned about contamination migrating off of Navajo property in this area by November 15, 2003.
- viii. Navajo shall notify the OCD Santa Fe and local district office at least 2 weeks in advance of all scheduled activities such that the OCD has the opportunity to witness the events and split samples. For large facilities, i.e. referinies, an annual notification will suffice.
- ix. Navajo shall notify the NMOCD of the discovery of scparated-phase hydrocarbons or the exceedance of a WQCC standard in any down gradient monitor well where separate-phase hydrocarbons were not present or where contaminant concentrations did not exceed WQCC standards during the preceding monitoring event pursuant to NMOCD Rule 116.
- 18. Transfer of Discharge permit: The OCD will be notified prior to any transfer of ownership, control, or possession of a facility with an approved discharge permit. A written commitment to comply with the terms and conditions of the previously approved discharge permit must be submitted by the purchaser and approved by the OCD prior to transfer.
- 19. Closure: The OCD will be notified when operations of the facility are discontinued for a period in excess of six months. Prior to closure of the facility a closure permit will be submitted for approval by the Director. Closure and waste disposal will be in accordance with the statutes, rules and regulations in effect at the time of closure.

20. Certification: Navajo Refining Company L.P. by the officer whose signature appears below, accepts this and agrees to comply with all terms and conditions contained herein. Navajo Refining Company L.P. further acknowledges that these conditions and requirements of this may be changed administratively by the Division for good cause shown as necessary to protect fresh water, human health and the environment.

Conditions accepted by:

Navajo Refining Company L.P.

Company Representative- print name

Date

Company Representative- Sign

Title

TELEPHONE (505) 748-3311

62905278

EASYLINK

REFINING COMPANY

FAX (505) 746-6410 ACCTG (505) 746-6155 EXEC (505) 748-9077 ENGR (505) 746-4438 P / L

501 EAST MAIN STREET . P. O. BOX 159 ARTESIA, NEW MEXICO 88211-0159

January 26, 1999

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Mr. Wayne Price New Mexico Oil Conservation Division Environmental Bureau 2040 S. Pacheco St. Santa Fe, NM 87505-5472

RE: Minor Permit Modification to GW-28, Navajo Refining Co., Eddy County, NM

Dear Wayne,

"As we discussed on the phone, Navajo currently irrigates a farm that we own with a stream of water that we call our "RO Reject" Navajo has recently acquired another farm that we would like to irrigate with this "RO Reject" water also.

Enclosed is a map that shows the current location of the outfall of this stream (blue), along with a proposed additional outfall (red). Navajo would pipe this stream and add valves to allow us to put this RO Reject on either farm at any time. This would give us some flexibility during planting and harvesting seasons.

As we discussed, a minor modification to our Discharge Permit GW-28 should take care of this problem. If I can answer any questions, please feel free to call me at 505-748-3311. Thank you for your time in this matter.

Sincerely, NAVAJO REFINING COMPANY

DO MA

Darrell Moore Environmental Manager for Water and Waste

Encl.

An Independent Refinery Serving . . . NEW MEXICO • ARIZONA • WEST TEXAS • NORTHERN MEXICO

Chavez, Carl J, EMNRD

From:	Lackey, Johnny [Johnny.Lackey@hollyfrontier.com]
Sent:	Thursday, November 03, 2011 3:16 PM
То:	Chavez, Carl J, EMNRD
Cc:	Bailey, Jami, EMNRD; VonGonten, Glenn, EMNRD; Sanchez, Daniel J., EMNRD; Dade,
	Randy, EMNRD
Subject:	RE: Artesia Refinery (GW-032) RO Reject Water Revision
Attachments:	RO Reject April 27 1993 Letter from OCD.pdf; RO Reject January 26 1999 Letter from Navajo
	to OCD.pdf; RO Reject November 13 1996 Letter from OCD to Navajo.pdf; RO Reject
	February 25 1994 Letter from Navajo to OCD.pdf; RO Reject July 12 1993 Letter from Navajo
	to OCD.pdf

Vol. 3

Johnny Lackey Sr. Environmental Manager The HollyFrontier Companies P.O. Box 159 501 E. Main St. Artesia, NM 88211-0159 Office - 575-746-5490 Cell - 972-261-8075 Fax - 575-746-5451 Johnny.Lackey@hollyfrontier.com

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STATE OF NEW MEXICO



ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION

'G FREE 🚞

BRUCE KING GOVERNOR April 27, 1993

POST OFFICE BOX 2088 STATE LAND OFFICE BUILDING SANTA FE, NEW MEXICO 87504 (505) 827-5800

ANITA LOCKWOOO CABINET SECRETARY

> CERTIFIED MAIL RETURN RECEIPT NO. P-667-242-156

Mr. Virgil R. Langford, Vice President Navajo Refining Company P.O. Drawer 159 Artesia, New Mexico 88210

CARL, PLEASE SEE REE3

RE: Discharge Plan GW-28 Artesia Refinery Eddy County, New Mexico

Dear Mr. Langford:

The modification of groundwater discharge plan GW-28 for the Navajo Refining Company Artesia Refinery located in the SE/4, Section 1, E/2 Section 8, W/2 Section 9, N/2 Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico **1s hereby approved** under the conditions contained in the enclosed attachment. The discharge plan modification consists of the application dated December 10, 1992 and information dated January 7, 1993 submitted as supplements to the application.

The discharge plan modification was submitted pursuant to Section 3-106 of the Water Quality Control Commission Regulations. It is approved pursuant to section 3-109.A. Please note Section 3-109.F., which provides for possible future amendments of the plan.

Please note that section 3-104 of the regulations requires that "When a plan has been approved, discharges must be consistent with the terms and conditions of the plan". Pursuant to Section 3-107.C. you are required to notify the Director of any facility expansion, production increase, or process modification that would result in any change in the discharge quality or volume.

Please be advised that approval of this plan does not relieve you of liability should your operation result in actual pollution of surface or ground waters or the environment which may be actionable under other laws and/or regulations. In addition, this approval does not relieve you of the requirement to comply with other local, state or federal rules and/or regulations. Mr Virgil R. Langford April 27, 1993 Page -2-

The discharge plan modification for the Navajo Refining Company Artesia Refinery is subject to the WQCC Regulation 3-114 discharge plan fee. Every billable facility submitting a discharge plan modification will be assessed a fee equal to the filing fee of fifty (50) dollars plus the flat rate of three-thousand ninehundred and ten (3910) dollars for refineries.

The OCD has not received your \$50 filing fee. The flat fee for an approved discharge plan may be paid in a single payment due at the time of approval, or in equal annual installments over the duration of the plan, with the first payment due upon receipt of this approval.

Please make all checks payable to: NMED-Water Quality Management and addressed to the OCD Santa Fe Office.

On behalf of the staff of the Oil Conservation Division, I wish to thank you and your staff for your cooperation during this discharge plan review.

Sincerely, William J. ⁽LeMay Director

WJL/rca

xc: OCD Artesia Jim Piatt - NMED State Engineer US Fish & Wildlife Service USEPA Region IV

ATTACHMENT TO DISCHARGE PLAN GW-28 MODIFICATION NAVAJO REFINING COMPANY ARTESIA REFINERY DISCHARGE PLAN REQUIREMENTS (April 27, 1993)

- 1. The \$50 filing fee and the \$3910 flat fee (either total payment or installment) will be paid upon receipt of this approval.
- 2. The discharge of reject water from the reverse osmosis treatment facility to Eagle Draw shall not exceed the following standards:

Aluminum	87	ug/l
Arsenic	100	ug/l
Beryllium	18	ug/l
Barium	1000	ug/l
Boron	750	ug/l
Cadmium	10	ug/l
- Chlordane	0.015	ug/l
Chlorine	30	ug/l
Chromium	50	ug/l
Cobalt	50	ug/l
Copper	1000	ug/l
Cyanide	18	ug/l
Fluoride	1600	
Iron	1000	ug/l
Manganese	200	ug/l
Lead	6	ug/l
Mercury	0.042	ug/l
Nickel	200	ug/l
-NH3 as N	0.07	ug/l
Radium 226+228	30	pCi/l
Selenium	12	ug/l
Silver	0.4	ug/l
Vanadium	282	ug/l
Zinc	10	mg/l
Sulfate	767 2661	mg/l
Chloride	275	™mg/l
Total Dissolved Solids	4555	mg/l
- Chemical Oxygen Demand		mg/l
Ph between 6.6 a		s.u.

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Constituents not listed in 2. above for which there are standards established pursuant to WQCC Regulation 3-103 will not exceed the set numerical standard in that regulation.

v 4.

No toxic pollutant listed in WQCC Regulation 1-101 UU. will be present in the discharge.

14

- 5. SAMPLING: Samples of the discharge will be taken and analyzed on the following schedule:
 - I. For major cations/anions and heavy metals on a biweekly (once every two weeks).
 - \vee 2. All other constituents on a quarterly basis.
 - 3. Analysis for all parameters will be pursuant to EPA approved methods.
 - 4. Sampling and analytical QA/QC records will be retained for all sampling events.
 - 5. All samples will be "grab" samples.
 - 6. Discharge flow will be monitored and recorded on a daily basis.
 - 7. Major cations/anions and heavy metal analysis frequency can be reduced to quarterly, on a parameter-by parameter basis, upon application and OCD approval provided all analytical data in the previous year was no greater than seventy-five (75) percent of the effluent limit.
 - 8. All samples collected in a monitoring period will be reported.
 - 9. Sampling and flow measurement will be representative of the volume and nature of the discharge.
 - 10. Sample data and analytical results will be reported to the OCD on a quarterly basis and are due prior to the 15th day of the month following the calendar quarter. (e.g. 1st quarter results are due prior to April 15).
- 6. The OCD will be notified of any break, spill, blow out, or fire or any other circumstance that could constitute a hazard or contamination.

STATE OF NEW MEXICO

THE STATE OF STATE

ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION 2040 S. PACHECO SANTA FE, NEW MEXICO 87505 (505) 827-7131

November 13, 1996

CERTIFIED MAIL RETURN RECEIPT NO. P-288-258-861

Mr. Phillip Youngblood Navajo Refining Company P. O. Drawer 159 Artesia, New Mexico 88211-0159

CARL, PLEASE SEE PAGES I AND 2 OF 8

4A1

RE: Discharge Plan GW-028 Artesia Refinery Eddy County, New Mexico

Dear Mr. Youngblood:

The groundwater discharge plan renewal, GW-028, for the Navajo Refining Company (Navajo) Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico, is hereby approved under the conditions contained in the enclosed attachment. The discharge plan consists of the original discharge plan as approved October 21, 1991, and the discharge plan renewal application dated June 19, 1996. Enclosed are two copies of the conditions of approval. Please sign and return one copy to the New Mexico Oil Conservation Division (OCD) Santa Fe Office within five working days of receipt of this letter.

The discharge plan was submitted pursuant to Section 3106 of the New Mexico Water Quality Control Commission (WQCC) Regulations. It is approved pursuant to Section 3109.A. Please note Sections 3109.E and 3109.F., which provide for possible future amendments or modifications of the plan. Please be advised that approval of this plan does not relieve Navajo of liability should operations result in pollution of surface water, ground water, or the environment.

Please be advised that all exposed pits, including lined pits and open tanks (tanks exceeding 16 feet in diameter), shall be screened, netted, or otherwise rendered nonhazardous to wildlife including migratory birds.

Mr. Philip Youngblood November 13, 1996 Page 2

Please note that Section 3104 of the regulations require "When a facility has been approved, discharges must be consistent with the terms and conditions of the plan." Pursuant to Section 3107.C. Navajo is required to notify the Director of any facility expansion, production increase, or process modification that would result in any change in the discharge of water quality or volume.

Pursuant to Section 3109.G.4., this plan is for a period of five years. This approval will expire on October 21, 2001, and Navajo should submit an application in ample time before this date. Note that under Section 3106.F. of the regulations, if a discharger submits a discharge plan renewal application at least 120 days before the discharge plan expires and is in compliance with the approved plan, then the existing discharge plan will not expire until the application for renewal has been approved or disapproved. It should be noted that all discharge plan facilities will be required to submit the results of an underground drainage testing program as a requirement for discharge plan renewal.

The discharge plan renewal application for the Navajo Refining Company Artesia Refinery is subject to WQCC Regulation 3114. Every billable facility submitting a discharge plan will be assessed a fee equal to the filing fee of \$50 plus one half of the flat fee or \$3,910 for refineries. The OCD has not received the \$50 filing fee or the \$3,910 flat fee. The \$50 filing fee is due upon receipt of this approval. The flat fee of \$3,910 may be paid in a single payment due on the date of the discharge plan approval or in five equal installments over the expected duration of the discharge plan. Installment payments shall be remitted yearly, with the first installment due on the date of the discharge plan approval and subsequent installments due on this date of each calendar year.

Please make all checks payable to: NMED-Water Quality Management and addressed to the OCD Santa Fe Office.

On behalf of the staff of the OCD, I wish to thank you and your staff for your cooperation during this discharge plan review.

Sincerely, William J. Lel Director WJL/mwa Attachment

xc: OCD Artesia Office

ATTACHMENT TO THE DISCHARGE PLAN GW-028 RENEWAL NAVAJO REFINING COMPANY ARTESIA REFINERY DISCHARGE PLAN APPROVAL CONDITIONS (November 13, 1996)

- 1. <u>Payment of Discharge Plan Fees:</u> The \$50 filing fee is due upon receipt of this approval. The \$3,910 flat fee shall be submitted upon receipt of this approval. The required flat fee may be paid in a single payment due at the time of approval, or in equal annual installments over the duration of the plan, with the first payment due upon receipt of this approval.
- 2. <u>Navajo Commitments:</u> Navajo will abide by all commitments submitted in the discharge plan application dated June 19, 1996.
- 3. Reverse Osmosis Reject Water:
 - A. The discharge of reject water from the reverse osmosis treatment facility to Eagle Draw shall not exceed the following standards:

Constituent	Concentration	Unit
Aluminum	87	ug/l
Arsenic	100	ug/l
Beryllium	18	ug/l
Barium	1000	ug/l
Boron	750	ug/l
Cadmium	10	ug/l
Chlordane	0.015	ug/l
Chlorine	30	ug/l
Chromium	50	ug/l
Cobalt	50	ug/l

Copper	1000	ug/l
Cyanide	18	ug/l
Fluoride	1600	ug/l
Iron	1000	ug/l
Manganese	200	ug/l
Lead	6	ug/l
Mercury	0.042	ug/l
Nickel	200	ug/l
NH3 as N	0.07	ug/l
Radium 226+228	30	pCi/l
Selenium	12	ug/l
Silver	0.4	ug/l
Vanadium	282	ug/l
Zinc	10	mg/l
Sulfate		mg/l_
Chloride	275	mg/1
Total Dissolved Solids	4555	mg/l
Chemical Oxygen Demand	125	mg/l
рН	6.6 to 8.6	S.U.

- B. Constituents not listed in A. above for which there are standards established pursuant to WQCC Regulation 3103 will not exceed the set numerical standard in that regulation.
- C. No toxic pollutant listed in WQCC regulation 1101 TT. will be present in the discharge.

- D. SAMPLING: samples of the discharge will be taken and analyzed on the following schedule:
 - i. Major cations/anions and heavy metals will be sampled quarterly.
 - ii. All other constituents will be sampled annually.
 - iii. Analysis for all parameters will be pursuant to EPA approved methods.
 - iv. Sampling and analytical QA/QC records will be retained for all sampling events.
 - v. All samples will be "grab" samples.
 - vi. Discharge flow will be monitored and recorded on a daily basis.
 - vii. Sampling frequency can be reduced, on a parameter by parameter basis, upon application and OCD approval provided all analytical data in the previous year was no greater than seventy-five (75) percent of the effluent limit.
 - viii. All samples collected in a monitoring period will be reported.
 - ix. Sampling and flow measurement will be representative of the volume and nature of the discharge.
 - x. Sample data and analytical results will be reported to the OCD on a quarterly basis and are due prior to the 15th day of the month following the calender quarter. (e.g. 1st quarter results are due prior to April 15th).

4. <u>Effluent Pipeline:</u>

- A. Navajo Refining Company will be required to demonstrate integrity of its three-mile long effluent pipeline between the main refinery complex and the disposal ponds by January 1, 1997. Results will be submitted to the OCD by February 14 1997.
- B. Effluent from the pipeline shall be sampled annually where it enters the ponds. Field pH and conductivity shall be measured. Analysis shall include aromatic and halogenated volatile organics, major cations/anions plus fluoride, WQCC metals and PAH's.

5. Product and Waste Disposal:

All recovered product, waste filters or treatment system waste products will be recycled and/or disposed of at an OCD approved facility or in an OCD approved manner.

6. Lead Contamination:

A plan and schedule for delineating, testing and disposing of any lead contaminated soil located between tanks 417 and 418 will be submitted to the OCD by February 14, 1997.

7. Ground Water and Treatment System Monitoring:

A. Ground water from monitor wells, the remediation and the treatment system will be sampled and analyzed according to the following schedule. All water quality sampling will be conducted according to EPA approved protocol and laboratory techniques.

Sampling point	Biweekly	Monthly	Quarterly	Annually
Air Stripper Effluent		601** 602** PAH's		Cations/anions Heavy metals
RA-2723	602**			
RA-4196		602**		
<u>RA-</u> 4798		602**		
RA-313*		602**		
RA-314*		602**		
RA-1331*		602**		
RA-307*		602**		
RA-1227*		602**		
RA-3156			602**	
RA-3353			602**	
KWB-1A			601** 602**	PAH's Cation/anions Heavy metals
KWB-1C			601** 602**	PAH's Cation/anions Heavy metals

KWB-2A	601** 602**	PAH's Cation/anions Heavy metals
KWB-3A	601** 602**	PAH's Cation/anions Heavy metals
KWB-7	601** 602 * *	PAH's Cation/anions Heavy metals
KWB-9	601** 602**	PAH's Cation/anions Heavy metals

- * Sampled during irrigation season
- * EPA laboratory method
 - B. An annual report will be submitted to the OCD by February 28 of each year. The annual reports will contain:
 - i. A description of the monitoring and remediation activities which occurred during the year including conclusions and recommendations.
 - ii. Summary tables listing past and present laboratory analytic results of all water quality sampling for each monitoring point and plots of concentration vs. time for contaminants of concern from each monitoring point. Copies of the most recent years laboratory analytical data sheets will also be submitted
 - iii. A quarterly water table elevation map using the water table elevation of the ground water in all refinery monitor wells.
 - iv. Plots of water table elevation vs. time for each ground water monitoring point.
 - v. A quarterly product thickness map based on the thickness of free phase product on ground water in all refinery monitor wells.
 - vi. The volume of product recovered in the remediation/treatment system during each quarter and the total recovered to date.
 - vii. The volume of total fluids pumped from all recovery wells and trenches during each quarter and the total volume recovered to date.

- 8. <u>Drum Storage:</u> All drums containing materials other than fresh water must be stored on an impermeable pad with curbing. All empty drums will be stored on their sides with the bungs in and lined up on a horizontal plane. Chemicals in other containers such as sacks or buckets will also be stored on an impermeable pad and curb type containment. A plan and schedule will be provided to the OCD by February 14, 1997 for properly storing all drums which do not meet OCD requirements.
- 9. <u>Process Areas:</u> All process and maintenance areas which show evidence that leaks and spills are reaching the ground surface must be either paved and curbed or have some type of spill collection device incorporated into the design. A plan and schedule will be provided to the OCD by February 14, 1997 for properly containing all process areas which do not meet OCD requirements.
- 10. <u>Above Ground Tanks</u>: All above ground tanks which contain fluids other than fresh water must be bermed to contain a volume of one-third more than the total volume of the largest tank or of all interconnected tanks. All new facilities or modifications to existing facilities must place the tank on an impermeable type pad within the berm. A plan and schedule will be provided to the OCD by February 14, 1997 for properly containing all above ground tanks which do not meet OCD requirements.
- 11. <u>Above Ground Saddle Tanks:</u> Above ground saddle tanks must have impermeable pad and curb type containment unless they contain fresh water or fluids that are gases at atmospheric temperature and pressure. A plan and schedule will be provided to the OCD by February 14, 1997 for properly containing all above ground saddle tanks which do not meet OCD requirements.
- 12. <u>Labeling:</u> All tanks, drums and containers should be clearly labeled to identify their contents and other emergency information necessary if the tank were to rupture, spill, or ignite. A plan and schedule will be provided to the OCD by February 14, 1997 for properly labeling all tanks, drums and containers which do not meet OCD requirements.
- 13. <u>Below Grade Tanks/Sumps:</u> All below grade tanks, sumps, and pits must be approved by the OCD prior to installation or upon modification and must incorporate secondary containment and leak-detection into the design. All pre-existing sumps and below-grade tanks must demonstrate integrity on an annual basis. Integrity tests include pressure testing to 3 pounds per square inch above normal operating pressure and/or visual inspection of cleaned out tanks and/or sumps. The OCD will be notified at least 72 hours prior to all testing so that an OCD representative may witness the testing. All required testing will be completed by December 31, 1996. A plan and schedule will be provided to the OCD by February 14, 1997 for properly containing, repairing and/or replacing all below grade tanks, sumps, and pits which do not meet OCD requirements.

- 14. <u>Underground Process/Wastewater Lines:</u> All underground process/wastewater pipelines must be tested to demonstrate their mechanical integrity at present and then every 5 years there after, or prior to discharge plan renewal. Permittees may propose various methods for testing such as pressure testing to 3 pounds per square inch above normal operating pressure or other means acceptable to the OCD. The OCD will be notified at least 72 hours prior to all testing so that an OCD representative may witness the testing. All required testing will be completed by December 31, 1996. A plan and schedule will be provided to the OCD by February 14, 1997 for properly repairing and/or replacing all below grade lines for which integrity could not be achieved.
- 15. <u>Class V Wells</u>: Leach fields and other wastewater disposal systems at OCD regulated facilities which inject fluid other than domestic waste sewage below the surface are considered Class V injection wells under the EPA UIC program. All class V wells will be closed unless, it can be demonstrated that protectable groundwater will not be impacted in the reasonably foreseeable future. Class V wells must be closed through the Santa Fe Office. The OCD allows industry to submit closure plans which are protective of human health, environment and groundwater as defined by the WQCC, and are cost effective.
- 16. <u>Housekeeping:</u> All systems designed for spill collection/prevention should be inspected to ensure proper operation and to prevent overtopping or system failure.

Any non-exempt contaminated soils that are collected at the facility will be tested for hazardous constituents, and after receiving OCD approval, will be disposed of at an OCD approved site.

- 17. <u>Spill Reporting:</u> All spills/releases shall be reported pursuant to OCD Rule 116 and WQCC 1203 to the OCD Artesia District Office.
- 18. <u>Transfer of Discharge Plan:</u> The OCD will be notified prior to any transfer of ownership, control, or possession of a facility with an approved discharge plan. A written commitment to comply with the terms and conditions of the previously approved discharge plan must be submitted by the purchaser and approved by the OCD prior to transfer.
- 19. <u>Closure:</u> The OCD will be notified when operations of the facility are discontinued for a period in excess of six months. Prior to closure of the facility a closure plan will be submitted for approval by the Director. Closure and waste disposal will be in accordance with the statutes, rules and regulations in effect at the time of closure.

20. <u>Certification:</u> Navajo, by the officer whose signature appears below, accepts this permit and agrees to comply with all terms and conditions contained herein. Navajo further acknowledges that these conditions and requirements of this permit may be changed administratively by the Division for good cause shown as necessary to protect fresh water, human health and the environment.

Accepted:

NAVAJO REFINING COMPANY

by___

Title

Page 8 of 8

TELEPHONE (505) 748-3311



REFINING COMPANY 501 EAST MAIN STREET • P.O. DRAWER 159

EASYLINK 62905278 FAX (505) 746-6410 ACCTG (505) 746-6155 EXEC (505) 748-9077 ENGR (505) 746-4438 P / L

ARTESIA, NEW MEXICO 88211-0159

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Roger Anderson Oil Conservation Division Environmental Bureau P.O. Box 2088 Santa Fe, NM 87504-2088

CARL, PLENSE SEE PIGE 2

Re: Reverse Osmosis Reject Sampling

Dear Roger,

Enclosed are the results from our May 17, 1993 and June 15, 1993 sampling of the reverse osmosis reject water that is being put on our farm. If there are any questions, please call me at (505)748-3311.

Regards,

sull Moore

Darrell Moore Environmental Specialist

DGM/rh

enclosure

An Independent Refinery Serving ..., NEW MEXICO • ARIZONA • WEST TEXAS



Navajo Refining Company 501 East Main Street P.O. Drawer 159 Artesia, New Mexico 88210 Date Submitted: 5/18/93 Date Reported: 7/2/93 Partial Reported: 5/27/93

Attn: Darrell Moore

Sample Description: R/O Reject Date Sampled: 5/17/93

Laboratory ID: D0518508

TEST	VALUE	UNITS	METHOD
Chloride, as Cl	`	mg/L	EPA 325.2
Cyanide, total	< 0.01	mg/L	EPA 335.3
Fluoride	2.2	ma/L	EPA 340,2
Sulfate, at S04	1640	mg/L	EPA 375.4
Aluminum, total	< 0.1	mg/L	EPA 200.7
Arsenic, total	< 0.005	mg/L	EPA 206.2
Barium, total	0.06	mg/L	EPA 200.7
Beryllium, total	< 0.005	mg/L	EPA 200.7
Boron, total	0.08	mg/L	EPA 200.7
Cadmium, total	< 0.005	mg/L	EPA 200.7
Chromium, total	0.01	mg/L	EPA 200.7
Cobalt, total	< 0.01	mg/L	ÉPA 200.7
Copper, total	0.03	mg/L	EPA 200.7
Molybendum, total	0.20	mg/L	EPA 200.7
Selenium, total	< 0.005	mg/L	EPA 270.2
Silver, total	< 0.01	mg/L	EPA 200.7
Vanadium, total	< 0.01	mg/L	EPA 200.7
Zinc, total	0.02	mg/L	EPA 200.7
Ammonia, as N	0.4	mg/L	EPA 350.2
Chemical Oxygen Demand	< 30	mg/L	EPA 410.4
pH, total	7.12	рH	EPA 150.1
Total Suspended Solids	< 2	mg/L	EPA 160.2
Total Dissolved Solids	3160	mg/L	EPA 160.1
Fecal Coliform	< 1	MPN/100ml	
Biochemical Oxygen Demand		mg/L	SM 507 16th Ed
*Radium 226	1.6+/-0.3**	pcI/L	EPA 903.1
*Radium 228	-0.1+/-0.5**	pcI/L	EPA 904.0
*Uranium	< 0.005	mg/L	EPA 908.1
Nitrate, as N	0.48	mg/L	EPA 353.2

*Analysis subcontracted **Variability of the radioactive disintegration process (counting error) at the 95% confidence level, 1.96.

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Chain of Custody

P.O. Box 4300 • 9669 Grogans Mill Road • The Woodlands, TX 77380 • 713-367-6201 • Fax 713-367-3189

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Page 6

Laboratory ID: D0616572

Sample Description: RO Reject Date Sampled: 6/15/93

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TEST	VALUE	UNITS	METHOD
TEST M-Alkalinity, as CaCO3 P-Alkalinity, as CaCO3 Chloride, as Cl Fluoride, total Sulfate, at SO4 Bicarbonate, alk as CaCO3 Carbonate, alk as CaCO3 Aluminum, total Arsenic, total Barium, total Barium, total Boron, total Cadmium, total Cadmium, total Calcium, total Chromium, total Cobalt, total Cobalt, total Cobalt, total Potassium, total Silver, total Sodium, total Vanadium, total Zinc, total	VALUE 311 0 227 1.6 1650 311 0 < 0.1 < 0.005 0.06 < 0.005 448 < 0.01 146 < 0.01 0.02 0.16 3.9 < 0.01 134 0.01 0.02 6.80	mg/L mg/L mg/L mg/L mg/L	METHOD SM 403 16th Ed SM 403 16th Ed EPA 325.2 EPA 340.2 EPA 375.4 EPA 310.1 EPA 310.1 EPA 200.7 EPA
Selenium, total Uranium, total	< 0.005 < 0.005	mg/L mg/L	EPA 270.2 EPA 908.0

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Chain of Custody

P.O. Box 4300 • 9669 Grogans Mill Road • The Woodlands, 1977 380 • 713-367-6201 • Fax 713-367-3189

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Client Nar	ne/Addres	s:				·····		<u>_</u>	·							
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TELEPHONE (505) 748-3311

EASYLINK 62905278

REFINING COMPANY

FAX (505) 746-6410 ACCTG (505) 746-6155 EXEC (505) 748-9077 ENGR (505) 746-4438 P / L

501 EAST MAIN STREET ° P. O. BOX 159 ARTESIA, NEW MEXICO 88211-0159

January 26, 1999

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Mr. Wayne Price New Mexico Oil Conservation Division Environmental Bureau 2040 S. Pacheco St. Santa Fe, NM 87505-5472

RE: Minor Permit Modification to GW-28, Navajo Refining Co., Eddy County, NM

Dear Wayne,

As we discussed on the phone, Navajo currently irrigates a farm that we own with a stream of water that we call our "RO Reject" Navajo has recently acquired another farm that we would like to irrigate with this "RO Reject" water also?

Enclosed is a map that shows the current location of the outfall of this stream (blue), along with a proposed additional outfall (red). Navajo would pipe this stream and add valves to allow us to put this RO Reject on either farm at any time. This would give us some flexibility during planting and harvesting seasons.

As we discussed, a minor modification to our Discharge Permit GW-28 should take care of this problem. If I can answer any questions, please feel free to call me at 505-748-3311. Thank you for your time in this matter.

Sincerely, NAVAJO REFINING COMPANY

. OD Move

Darrell Moore Environmental Manager for Water and Waste

Encl.

An Independent Refinery Serving . . . NEW MEXICO • ARIZONA • WEST TEXAS • NORTHERN MEXICO



REFINING COMPANY

E01 EAST MAIN STREET * P. O. BOX 159 ARTESIA, NEW MEXICO 88211-0159 EASYLINK 62905278 FAX (505) 746-6410 ACCTG (505) 746-6155 EXEC (505) 748-9077 ENGR (505) 746-4438 P / L

February 25, 1994

Robert L. Myers II Petroleum Engineering Specialist Oil Conservation Division-Environmental Bureau P.O. Box 2088 State Land Office Bldg. Santa Fe, NM 87504

CARL, PLEASE SEE PAGE 2

RE: Discharge Plan GW-28 Navajo Refining, Eddy County, New Mexico

Dear Mr. Myers:

Enclosed are Navajo's responses to your letter of November 9, 1993. We regret the delay in responding to this request. Your comments are listed below with Navajo's response in **bold** type.

- A. Discharge Plan (and modifications) Reporting Requirements:
- <u>Annual Sampling</u> of the pipeline effluent for BTEX, major cations/anions, fluoride, WQCC metals and PAH's.
 This sampling was done on January 12, 1994 and the results were

forwarded to OCD.

2. <u>Annual split sampling (with OCD)</u> of monitoring wells for water level, pH and conductivity from field measurements, and for BTEX, major cations/anions and fluoride from laboratory analysis. Monitor wells MW-4 and MW-6 will also be analyzed for naphthalene and mononaphthalene.

This sampling was done December 20, 1993 and the report sent to OCD on January 12, 1994. Our understanding, based on OCD's letter of October 21, 1991, is that these wells are on a staggered schedule with basically half of the wells done in January and half in June, except that MW-4 and MW-5 are monitored semiannually.

- Semi-annual monitoring of wells MW-4 and MW-5 for water level, pH and conductivity from field measurements, and for BTEX, major cations/anions and fluoride from laboratory analysis;
 See #2 above.
- 4. <u>Quarterly sampling of the RO reject water for those constituents listed in the</u> 4/27/93 discharge plan modification (and amended fluoride standard-OCD 6/29/93);

The RO reject water was sampled for the quarterly constituents on January 12, 1994. Those results were forwarded to OCD.

5. <u>Bi-weekly sampling</u> of the Reverse Osmosis (RO) reject water for major cations/anions and heavy metals (request with OCD to relax this to quarterly based on analysis results);
 This sampling is being done on a bi-weekly basis with results forwarded to

OCD as they are received. Navajo still believes that there is no analytical reason for continuing the bi-weekly sampling of this reject water. The results have been consistent with very little fluctuation.

- 6. <u>Daily monitoring and recording</u> of the pipeline effluent discharge flow quantities; Navajo is monitoring the RO reject effluent to Eagle Draw and our farm on a daily basis but we are not aware of any requirement to monitor the pipeline effluent. The RO reject flow is reported quarterly when the quarterly RO samples are reported.
- 7. Copies of all reports and correspondence with EPA and NMED referencing refinery SWMU's.

The SWMU's that the refinery is aware of are the Truck-By-Pass Landfarm, the Evaporation Ponds and Three Mile Ditch. <u>All</u> reports and correspondence with EPA and NMED concerning these units would cover several shelves. Navajo would like to suggest that you come to the refinery and go over these volumes and decide what you think is important. We could then make copies of those select documents. You could do this at the next quarterly sampling when we split samples. If you do want the complete list, Navajo will send that.

- B. <u>Unresolved Questions Based on File Review</u>
- 1. What is the progress status of the closure of the oil and tank bottoms in the earthen sludge pit adjacent to Tank 835?

We are currently working the pit and recovering product using a contractor, Talon Industries. However, the cold weather has hampered the progress. The pit is approximately 85% completed.

2. A time table for the completion of integrity testing of all below grade waste piping was to be submitted after verification, which was submitted in February, 1991. The timetable is to be submitted and testing performed prior to renewal of the current discharge plan, which expires October 21, 1996. This is to include the three mile long effluent pipeline from the main refinery complex to the disposal ponds.

It is Navajo's understanding that this request is limited to piping and sewers over 25 years old. The only piping or sewers that are over 25 years old are in the North Plant. Navajo will evaluate and test these sewers as needed to accomplish the task by 10/21/96. Also, Navajo will test the effluent pipeline to the ponds before the October 21, 1996 deadline.

3. What is the progress status of closure of Pond #1? The soil in pond #1 is being turned over regularly by trac-hoes belonging to Sweat Construction and contracted to Navajo. In addition, the pond is tilled on a regular basis. These measures enhance biological activity and at this time approximately 80% of the pit is degraded with patches in the corners needing additional attention. Navajo estimates the remaining 20% of the pit will require 6 months to a year to be completed. EPA has requested a more structured closing of the pond and we have also done additional testing of the TPH in the pond #1 soils at EPA's request.

4. Has the catchment and drainage for tanks 130, 132, 133, and 135 been installed as per the drawings submitted to OCD in July 1990?

The catchment and drainage for these tanks was never installed. These tanks are not in use now and they will be removed in the near future.

- C. <u>Cleanup and Containment Needs</u>
- 1. The muratic acid saddle tank and the oil /water drum in the Asphalt Loading Area need cleaned up and contained.

The muratic acid tank has not been used for several years and is on schedule to be taken out and disposed of. The drums at the Asphalt Loading Rack are used to hold discarded test asphalt and any spills in the area that are picked up. Navajo's position on these barrels is that since they contain asphalt, no containment is warranted. However, we will be happy to work with OCD on this question.

2. Transfer pumps and open drums containing oil at the Asphalt Tank Farm need cleaned up and contained.

Again, these pumps and drums are used to hold and move asphalt which is used to pave roads. Navajo feels no containment is needed. Again, we would be glad to discuss this with you.

3. Pumps at the South Plant Cooling Tower area, and transfer pumps and spills throughout the Vacuum Tower area need cleaned up and contained. The diesel saddle tank in this area needs cleaned up and curbs added to pad to contain spills. Drip trays for pumps and compressors should be monitored and drained before they spill over.

Navajo will schedule these through our maintenance department to be taken care of.

- 4. At the South Plant Water Treating Area, numerous pump pads need cleaned up and leaks contained, and spill trays are overflowing. These will be taken care of as #3 above.
- 5. The pad containing treatment chemicals at the South Plant Distillation Tower needs some type of containment to prevent leaks or spills from running off the pad.

This area contains I-pac containers which are on cement without lips. Lips will be added to the pad.

- The area north of the Distillation Tower has contaminated soils which need to be cleaned up and the source determined.
 Navajo will clean up the soil and determine the source of the contamination.
- The old oil/water Separator in the South Plant should be closed out.
 Talon Industries, which is the company that is cleaning the pit at Tank 835,

will move to this separator when the pit at 835 is finished. This pit has heavy oil in it which will be recovered and put back through our processes. Navajo would like to keep this separator available for future use. Therefore, we would like to refrain from closing it at this time.

8. Drums in the Product Tank Farm need to be contained and empty drums stored properly.

This is being taken care of plant wide as part of our Storm Water Pollution Prevention Plan (SWPPP).

9. Cleanup and improved containment is needed for the Hazardous Waste Press storage area for the temporary storage of the hazardous waste drums.

The plate press is no longer here at the refinery and the area referenced has been cleaned up. As for the barrels you referred to, Navajo has never stored hazardous waste in drums. These are probably the chemicals that were used by the plate press which are polymers used in the dewatering process. These are also cleaned up.

10. The area around the frac tanks storing sludge needs cleaned up and leaks contained.

This was taken care of and the waste that was picked up was put in a roll-off bin and sent for incineration.

11. The chemical additive saddle tanks in the Gasoline Loading Area need cleaned up and leaks contained.

Navajo agrees and will comply.

- 12. Leaks from the pumps in the Reverse Osmosis Unit are overflowing the pads. See #11 above.
- 13. The compressor dryers in the North Plant Process Area need to be cleaned up and containment installed.

Navajo agrees and containment will be installed.

14. Drums placed throughout the North Plant Process Area to capture drips need to be emptied before they overflow.

This is being taken care of as part of our SWPPP.

15. Soils under the FCC Area pipes and valves just north of the cooling tower need to be cleaned up.

This area has been targeted to be cleaned and paved as part of our Storm Water Pollution Prevention Plan (SWPPP).

16. The pump building in the tank farm area at the northwest end of the facility needs cleaned up and containment installed for the pumps sitting on gravel. Also, the drums at this site should be placed on containment.

Our maintenance department will schedule this area for clean-up and the drums will be taken care of under the SWPPP.

- 17. The transfer pumps west of the tank farm need containment. Navajo agrees and this will be scheduled.
- 18. The Truck Loading Area, the Rail Loading Area and the Diesel Tank Transfer Area all need cleaned up and containment.

The Truck Loading Area and Rail Loading Area have containment and those drawings are enclosed. The day before this inspection, we had a spill at the Rail Loading Rack and that has been cleaned up.

19. The storage tanks around the Maintenance Shop need surrounding soils cleaned up and leaks contained.

This will be cleaned up. These units are not storage tanks, but clay filters for the product in the adjacent tank farm.

D. <u>Cleanups Around Tanks</u>

The Following tanks (by area) were noted to have excessive spillage and/or oilstained soils around the structures, valves and transfer pumps, and may also need improved containment for the overflow sumps.

-Tanks 132, 133, and 135

-Tanks 417 and 418

-Tanks 110, 411 and 438

-Tanks 437 and 439

-Tank 54

-Tank 810

-Tank 838

These will be cleaned up.

E. Annual Inspections for Below-Grade Sumps and Tanks

During the May 1993 OCD inspection, it was noted that numerous below-grade sumps and tanks were not equipped with secondary containment or leak detection. Navajo should submit a method(s) and schedule for testing the integrity of <u>ALL</u> sumps and tanks. If any of the sumps or tanks require replacement in the future, or new ones are installed, leak detection must be integrated into the design. The particular sumps and tanks identified during the inspection include:

-Asphalt Loading Area loading pad sump,

-South Plant TCC Tower sumps,

-South Plant Water Treating Area sumps,

-South Plant Distillation Tower sump,

-Tank sumps at the tank farm north of the South Plant,

-Product Tank Farm Tank 110 sump and Tank 438 below-grade tank,

-North Plant Process Area sumps,

-FCC Area Wastewater Separator below-grade tank,

-Northwest tank farm pump house sumps,

-Rail Loading Area sump,

-Diesel Tank 837 below-grade tank,

-Below-grade separator north of Tank 838, and

-Maintenance Shop sumps.

Due to my inexperience in the refinery when this inspection took place, I misidentified several sewer boxes as sumps when Bill Olson asked me about them. Of the above mentioned locations, only the Asphalt Loading Area, tank farm North of the South Plant, Tank 110, Tank 438, Northwest tank farm Slinger House, Rail Loading Area, Tank 837, and Tank 838 actually have sumps. The other "sumps" are actually sewer boxes. Navajo will test

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these sumps and tanks by filling with water and checking levels over a 24 hour period to see if it falls. This will be done as needed to accomplish by October 21, 1996.

F. Truck By-Pass Landfarm

Roger Anderson has confirmed the verbal permission for the one-time disposal of cooling tower sludge from the Lovington refinery at the Truck-By-Pas Landfarm. However, my file review shows no record of this landfarm being permitted to accept any wastes, whether from the Artesia refinery or the Lovington refinery. In order to bring this landfarm into compliance with WQCC regulations, Navajo shall submit an application to modify Discharge Plan GW-28 to include operation of this landfarm. This application shall include:

1. Initial date of operation of the landfarm;

2. An inventory of all wastes placed on the landfarm, including origin, quantity and date of emplacement of each batch, and records of any tests confirming the non-hazardous nature of each batch;

3. A description of the landfarming procedures being practiced, including spreading rates, lift thicknesses and discing frequencies; and

4. Results of any monitoring data to demonstrate that contaminants are not migrating from the landfarm area.

To assist in the submittal of this application, I have enclosed a copy of OCD's <u>Guidelines for Permit Application</u>, <u>Design</u>, and <u>Operation of Centralized &</u> <u>Commercial Landfarms</u>.

Navajo is in the process of contracting with Waste Management in Rio Rancho to take our non-hazardous waste and landfill it. This should be accomplished by the end of March and further use of the Truck-By-Pass-Landfarm will be discontinued. We will continue to fertilize and disc the landfarm but no additional waste will be applied. For your information, EPA is investigating the Truck-By-Pass Landfarm as part of our RFI into the ponds and ditch. We have done sampling and verification sampling on this unit during the last 6 months.

I hope this adequately answers your concerns about the facility. We are working diligently on these matters and a lot of them dove-tail in with our SWPPP. If you have any questions, please feel free to call me at 748-3311. Thank you for your time in this matter.

Regards,

Darrell Moore Environmental Specialist

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11th day of October 2011	
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$\bigwedge My \text{ commission expires: } 5/12/2015$	
Chatesha Romino	
10th Latisha Romine Notary Public, Eddy County, New Mexico	

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being duly sworn, says that he is the <u>Publisher</u> of the Artesia Daily Press, a daily newspaper of general circulation, published in English at Artesia, said county and state, and that the hereto attached <u>Legal Notice</u> was published in a regular and entire issue of the said	AVSO (EGC) Solution: (B) De occubre (B) (B) (C) (D) (B) (C) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) (D) /b>
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11th day of October 2011 OFFICIAL SEAL Latisha Romine, NOTARY PUBLIC-STATE OF NEW MEXICO My commission expires: 5/12/2015 Latisha Romine Notary Public, Eddy County, New Mexico	

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I, V. Wright, being first duly sworn declare and say that I am Legal Advertising Representative of THE SANTA FE NEW MEXICAN, a daily newspaper published in the English language, and having a general circulation in the Counties of Santa Fe and Los Alamos, State of New Mexico and being a newspaper duly qualified to publish legal notices and advertisements under the provisions of Chapter 167 on Session Laws of 1937; that the publication # 91506 a copy of which is hereto attached was published in said newspaper I day(s) between 09/20/2011 and 09/20/2011 and that the notice was published in the newspaper proper and not in any supplement; the first date of publication being on the 20th day of September, 2011 and that the undersigned has personal knowledge of the matter and things set forth in this affidavit.

ISI 1/1/1/1 ERTISEMENT REPRESENTATIVE

Subscribed and sworn to before me on this 20th day of September, 2011

Notary Commission Expires:

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that: pursuant ito Wa ter Quality Control Commission Regula tions (20:622:310) MMAC), the following discharge permit ap plication(s) has been submitted, to the Disector of the New Mexico Oil Conserva tion Division (OCD) 12:00 S. Saint Francis Drive: Santa Fe, New Mexico 87505. Telephone (505) 476:3440: (GW-028) Navajo Refining Company Artesia (Refinery, Darrell Moore, Environmental Manager (for Water and Waste, 501. E Main, Artesia, New Mexico 88210, has submitted a renewal application for the Artesia Refinery located in SE/4 of Section 1, E/2 of Section 9, N/2 of Section 12, Township 37. South, Range. 26 East, NMPM, Eddy County, New Mexico (northeast of the intersection of Highway 285 and Highway (82) in Artesia, New Mexico charges up to 140000 bbi/day of treated wastewater to three permitted Underground Injection Cons

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wastewater to intee ground injection Controi. (UIC) (Class I (non-hazardous) injection Wells and/orto the publicly owned treatment works (POTW) for disposal, treatment: and/orbeneficial reuse. A maximum sanitary waste water volume rate of 50 bbl/day is routed to the Artesia waste water treatment plant. (WWTP) and about 26 barrels per day of total sanitary effluent is discharged into various NMED permitted Class V septic systems throughout the facility. There is currently ground water and vadose zone contamination present with abatement and monitoring in progress. Consequently, there is an ongoing discharge occurring to ground water from vadose zone contamination at the facility. there is discurrently senter and states discharge occurring to ground water from vadose zone contamination at the facility. there is an ongoing discharge occurring to ground water from vadose zone contamination at the facility. Stored in tanks or containers and shipped off site for disposal or recycling at an OCD permitted and/or approved facility. Ground water facility. Ise and spine and shipped off site for disposal or recycling at an OCD permitted

or, accidental dis charge is at a depth of approximately \$25 feet below the ground surface with a stotal dissolved solids con-centration of approximately 1,700 mg/L The discharge permit specifies that Navajo Refining Company will remediate con-taminated ground at the site to meet the standards;specified in the Water Quality Control Commission regulations (20.6.2.3103 NMAC) OCD has determined that the applications listed above, are ad-ministratively com-plete, and thas pre-pared draft, permits OCD will accept comments and istate ments of interest are, garding this applica-tion and will create a facility specific mail-ing filst for persons who wish to receive future anotices. Per-isons interested in obtaining further infor-mation, submitting comments or request-ing to be on a facility specific mailing list for future notices, may contact the Environmental Bureau Chief of the Oil Con-servation Division at the address given above. The adminis-trative completeness determination draft permit may be viewed at the above address between 8:00 a.m. and 4:00 p.m., Monday through Fri-day, or may also be viewed at the 10CD web http://www.emnrd.st site ate:nm:us/ocd//. Pertaining a copy of the application and draft permit imay icontact OCD at the address given above. Prior to ruling on "any pro-posed discharge per-mit or union mit or major modifi-cation, the Director Shall allowia period of at least thirty (30) days after the date of publication of this no-tice division which in tice, during which in-terested persons may submit comments or request that OCD hold a public hearing. Re-quests for a public hearing shall set forth the reasons hearing snan see why a their reasons why a boaring should be hearing should be held. A hearing will be held. if, the Director determines that there ls significant public interest. If no public hearing is held, the Director will approve or disap-prove the proposed permit based on in-formation available, including all comments received. If a public hearing is held, the director will, ap prove or disapprove prove_or_disapprove the proposed permit based on information in the permit applica-tion, and information submitted at the hearing. Para obtener, mas in-formación sobre esta solicitud en espan_ol,

Sitvase comunicarse por favor: New Mexico Energy, Minerals and "Natural" Resources Department (Depto: Del LEnergia, Minerals y Recursos Naturales ide Nuevo México), Oli Conservation Del Petroleo), 1220 South St. Francis Drive, Santa Fe, New México & Contacto: Dorothy Phillips, 505-476-3461) GIVEN under the Seal of New Mexico, Oli Conservation Commission at. Santa Fe, New Mexico, on this 14th, day of September.2011 STATE(OF NEW MEXICO Oli CONSERVATION DIVISION JamiBalley.Director Legal #91506 Pub Sept.20, 2011



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\$143.64		\$153.96

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Remit Payment to: Artesia Daily Press P.O. Box 190	Amount Due \$153.96
Artesia, NM 88211-0190	
Fax: 575-746-8795	Amount Enclosed
	Issue Date: 9/18/2011
Fran Chavez Oil Conservation Division - EMNRD	Prebill Date: 9/19/2011
1220 South St. Francis Dr.	Ad # 38006
Santa Fe, NM 87505	Account #

Affidavit of Publication	Copy of Publication:
<u>NO. 21854</u>	
STATE OF NEW MEXICO	INOTICE OF PUBLICATION ISTATE OF NEW MEXICO
County of Eddy:	ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT
Danny Scott	Notice is hereby given that pursuant to Water Quality Control Commission Re tions: (20.6:2:3106 NMAC) the following discharge permit application(s) has
being duly sworn, says that he is the Publisher	submitted to the Director of the New Mexico Oli Conservation Division (OCD), S. Saint Francis Drive: Santa Fe New Mexico 87505, Telephone (505)/476-34
of the Artesia Daily Press, a daily newspaper of general	(GW-028)Navajo Refining Company, Artesia Refinery, Darrell Moore, Env mental Manager for Water and Waste, 501 E Main, Artesia, New Mexico 8 hasisubmitted a renewal application for the Artesia Refinery located in SE
circulation, published in English at Artesia, said county	Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Townsh South Range 26 East, NMPM, Eddy County, New Mexico (northeast of th tersection of Highway 265 and Highway 82), in Artesia, New Mexico, The
and state, and that the hereto attached	ery refines up to 100,000 barrels per day of crude/oil and discharges (14,000 bbl/day of treated wastewater to three permitted Underground Inje Control (UIC) Class I (non-hazardous) Injection Wells and/or to the put
Legal Notice	owned treatment works (POTW) for disposal, treatment, and/or beneficial ro A maximum sanitary waste water volume rate of 50 bbl/day is routed to Artesia waste water treatment plant (WWTP) and about 26 barrels per da
was published in a regular and entire issue of the said	total sanitary effluent is discharged into various NMED permitted Class V s systems throughout the facility. There is currently ground water and var zone contamination present with abatement and monitoring in progress. sequently, there is an ongoing discharge occurring to ground water from
Artesia Daily Press, a daily newspaper duly qualified	dose zone contamination, at the facility All wastes generated will temporarily stored in tanks or containers and shipped off site for dispose
for that purpose within the meaning of Chapter 167 of	recycling at an OCD permitted and/or approved facility. Ground water r likely to be affected by a spill, leak or accidental discharge is at a depth o proximately 25 feet below the ground surface with a total dissolved solids
the 1937 Session Laws of the state of New Mexico for	centration of approximately 1,700 mg/L. The discharge permit specifies Navajo Refining Company will remediate contaminated ground at the si meet the standards specified in the Water Quality Control Commission rec
1 Consecutive weeks/days on the same	tions (20.6.2.3103 NMAC) OCD has determined that the applications listed above are administratively com
day as follows:	and has prepared draft permits. OCD will accept comments and statements of inte regarding this application and will create a facility specific mailing list for persons wish to receive future notices. Persons interested in obtaining further information
First Publication September 18, 2011	submitting comments or requesting to be on a facility specific mailing list for fu notices may contact the Environmental Bureau Chief of the Oil Conservation Div at the address givent above. The administrative completeness determination
Second Publication	draft permit may be viewed at the above address between 8.00 a m. and 4.00 r Monday through Friday, for may also be viewed at the OCD web http://www.emnrd.state.nm.us/ocd/ Persons interested in obtaining a copy of the
Third Publication	In plication and draft permit may contact OCD at the address given above Prior to n on any proposed discharge permit or major modification, the Director shall all period of at least thirty (30) days after the date of publication of this notice, du
Fourth Publication	which interested persons may submit comments or request that OCD hold a put hearing. Requests for a public hearing shall set forth the reasons why a hear should be held. A hearing will be held if the Director determines that there is significant the set of the determines that there is significant the determines that there is significant the determines that there is significant to be held.
Fifth Publication	 public interest Vif no public hearing is held, the Director will approve or disapprove the proposed
	mit based on information available, including all comments received. If a public h ingus held, the director will approve on disapprove the proposed permit based information in the permit application and information submitted at the hearing a
Subscribed and sworn to before me this	Para obtener más información sobre esta solicitud en espan ; ol, sirvase comunic
19th day of September 2011	'por favor: New Mexico Energy, Minerals and Natural Resources Department (De Del Energia) Minerals y Recursos Naturales de Nuevo México), Oil Conservation vision (Depto Conservació mDel Petróleo), 1220 South St. Francis Drive, Santa
	New México (Contacto: IDorothyiPhillips; 505-476-3461) GIVEN under the Seal of New Mexico Oil Conservation Commission at Santa
	New Mexico, on this 14th day of September 2011. STATE OF NEW MEXICO
	OIL CONSERVATION/DIVISION
	Published in the Artesia Daily Press Artesia N.M. Sept. 18, 2011 Legal No. 218
10th Latisha Romine	

Mer matter

Copy of Publication:

LEGAL NOTICE NOTICE OF PUBLICATION STATE OF NEW MEXICO ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT OIL CONSERVATION DIVISION Notice is hereby given that pursuant to Water Quality Control Commission Regula tions (20.6:2:3106:NMAC) the following discharge permit application(s) has been submitted to the Director of the New Mexico Oil Conservation Division (OCD), 1220 S Saint Francis Drive, Santa Fe New Mexico 87505, Telephone (505) 476-3440 (GW-028) Navajo Refining Company - Artesia Refinery, Darrell Moore, Environ-mental Manager for Water and Waste, 501 E (Main, Artesia, New Mexico 88210, hasisubmitted a renewal application for the Artesia Refinery located in SE/4 of Section 1, E/2 of Section 8. W/2 of Section 9 N/2 of Section 12. Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico (northeast of the in-tersection of Highway 285 and Highway 82), in Artesia, New Mexico, The refinery refines up to 100,000 parrels per day of crude oll and discharges up to 14,000 bbl/day of treated wastewater to three permitted Underground Injection Control (UIC) Class ((non-hazardous) injection Wells and/or to the publicity owned treatment works (POTW) for disposal, treatment, and/or beneficial reuse A maximum sanitary waste water volume rate of 50 bbl/day is routed to the Artesia waste water treatment plant (WWTP) and about 26 barrels per day of total sanitary effluent is discharged into various NMED permitted Class V septic systems throughout the facility. There is currently ground water and vadose zone contamination present with abatement and monitoring in progress. Consequently, there is an ongoing discharge occurring to ground water from va dose zone contamination at the facility. All wastes generated will be temporarily stored in tanks or containers and shipped off site for disposal or recycling at an OCD permitted and/or approved facility Ground water most likely to be affected by a spill, leak or accidental discharge is at a depth of ap-proximately 25 feet below the ground surface with a total dissolved solids concentration of approximately 1,700 mg/L. The discharge permit specifies that Navajo Refining Company will remediate contaminated ground at the site to meet the standards specified in the Water Quality Control Commission regulations (20.6.2.3103 NMAC) OCD has determined that the applications listed above are administratively complete and has prepared draft permits. OCD will accept comments and statements of interest egarding this application and will create a facility-specific mailing list for persons who vish to receive future notices Persons interested in obtaining further information. submitting comments or requesting to be on a facility-specific mailing list for future notices may contact the Environmental Bureau Chief of the Oil Conservation Division at the address given above. The administrative completeness determination and draft permit may be viewed at the above address between 8.00 a.m. and 4.00 p.m. Monday》through《Friday/1 or 《may》also《be《viewed 1at (the 《OCD》web》site http://www.emnrd.state.nm.us/ocd/ *Persons interested in obtaining a copy of the application and draft permit may contact OCD at the address given above. Prior to ruling on any proposed discharge permit or major modification the Director shall allow a period of at least thirty (30) days after the date of publication of this notice, during vhich interested persons may submit comments or request that OCD hold a public earing. Requests for a public hearing shall set forth the reasons why a hearing hould be held. A hearing will be held if the Director determines that there is significant ublic interest

Chavez, Carl J, EMNRD

From:	Chavez, Carl J, EMNRD
Sent:	Friday, September 16, 2011 11:19 AM
То:	'Valerie Wright'
Subject:	RE: Proof and receipt

Ok. Look good. Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: CarlJ.Chavez@state.nm.us Website: <u>http://www.emnrd.state.nm.us/ocd/</u> "Why not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward with the Rest of the Nation?" To see how, go to "Pollution Prevention & Waste Minimization" at: <u>http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental</u>)

From: Valerie Wright [mailto:vwright@sfnewmexican.com]
Sent: Friday, September 16, 2011 11:02 AM
To: Chavez, Carl J, EMNRD
Subject: Proof and receipt

Thank you

Thank You, Valerie Wright Legal Clerk The New Mexican (505)995.3818

NOTICE OF PUBLICATION

STATE OF NEW MEXICO ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT OIL CONSERVATION DIVISION

Notice is hereby given that pursuant to Wathat pursuant to Wa-ter Quality Control Commission Regula-tions (20.6.2.3106 NMAC) the following discharge permit ap-plication(s) has been submitted to the Di-rector of the New Mexico Oil Conserva-tion Division (OCD) tion Division (OCD), 1220 S. Saint Francis Drive, Santa Fe, New Mexico 87505, Tele-phone (505) 476-3440: (GW-028) Navajo Re-fining Company - Artesia Refinery, Darrell Moore, Environmental Manager for Water and Waste, 501 E. Main, Artesia, New Mexico 88210, has submitted a renewal submitted a renewal application for the Ar-tesia Refinery located in SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico (northeast of the in-tersection of Highway 82) 285 and Highway 82), in Artesia, New Mex-ico. The refinery reico. The refinery re-fines up to 100,000 barrels per day of crude oil and dis-charges up to 14,000 bbl/day of treated wastewater to three permitted Under-ground Injection Con-trol (UIC) Class I (non-hazardous) In-jection Wells and/or to the publicly owned to the publicly owned treatment works (POTW) for disposal, treatment, and/or beneficial reuse. A maximum sanitary waste water volume rate of 50 bbl/day is routed to the Artesia waste water treat-ment plant (WWTP) and about 26 barrels per day of total sani-tary effluent is discharged into various NMED permitted Class V septic sys-tems throughout the facility. There is currently ground water and vadose zone con-tamination present with abatement and monitoring in pro-gress. Consequently, there is an ongoing discharge occurring to ground water from vadose zone contami-nation at the facility. All wastes generated will be temporarily stored in tanks or containers and shipped off site for disposal or recycling at an OCD permitted and/or approved facility. Ground water most likely to be affected by a spill, leak or accidental discharge is at a depth of approximately 25 feet below the ground surface with a total dissolved solids concentration of approximately 1,700 mg/L. The discharge permit specifies that Navajo Refining Company will remediate contaminated ground at the site to meet the standards specified in the Water Quality Control Commission regulations (20.6.2.3103 NMAC) OCD has determined that the applications listed above are administratively complete and has prepared draft permits. OCD will accept comments of interest regarding this application and will create a facility-specific mailing list for persons who wish to receive future notices. Persons interested in obtaining further information, submitting comments or requesting to be on a facility-specific mailing list for future notices may contact the Environmental Bureau Chief of the Oil Con-

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If no public hearing is held, the Director will approve or disap prove the proposed permit based on information available, including all comments received. If a public hearing is held, the director will approve or disapprove the proposed permit based on information in the permit application and information submitted at the hearing. Para obtener más información sobre esta solicitud en espan_ol, sirvase comunicarse por favor: New Mexico Energy, Minerals and Natural Resources Department (Depto. Del Energia, Minerals y Recursos Naturales de Nuevo México), Oil Conservation Division (Depto. Conservacio'n Del Petróleo), 1220 South St. Francis Drive, Santa Fe, New México (Contacto: Dorothy Phillips, 505-476-3461). GIVEN under the Seal of New Mexico Oil Conservation Commission at Santa Fe, New Mexico, on this 14th day of September 2011. STATE OF NEW MEXICO OIL CONSERVATION DIVISION Jami Bailey, Director Legal # 91506 Pub. Sept. 20, 2011 'n,

Advertising Receipt

The New Mexican 202 E. Marcy P.O. Box 2048 Santa Fe, NM 87504-204 Phone: (505) 983-3303 Fax: (505) 820-1635

NM EMNRD OIL CONSERVATION DIV

1220 S ST FRANCIS DR Leonard Lowe SANTA FE , NM 87505

38

Ad taker:

Alt #: 56689 Cust#: 00002212 Ad#: 00356095 Phone: (505)476-3492 Date: 09/16/2011

6000

Classification:

Sort Line	Start	Stop	Runs	Lines	Cost
NOTICE OF PUBLICATION STATE O	09/20/2011	09/20/2011	1	228	233.65

40

Salesperson:

Ad Text: NOTICE OF

Tax:	19.13
Net:	252.78
Prepaid:	0.00
Total Due	252.78

Chavez, Carl J, EMNRD

From:	Latisha Romine [legals@artesianews.com]
Sent:	Thursday, September 15, 2011 1:28 PM
То:	Chavez, Carl J, EMNRD
Subject:	RE: Public Notice Request to Artesia Daily Press Newspaper Classified Notice Section GW-
-	028 Public Notice (Eddy County)
Attachments:	21854.pdf

Good Afternoon Carl,

This is scheduled to run Sunday, Sept. 18. Attached is a proof, let me know if I need to change anything. The cost is \$153.96

Thank You, Latisha Romine Artesia Daily Press P.O. Box 190 Artesia, NM 88211 (575) 746-3524

From: Chavez, Carl J, EMNRD [mailto:CarlJ.Chavez@state.nm.us]
Sent: Thursday, September 15, 2011 9:37 AM
To: legals@artesianews.com
Subject: Public Notice Request to Artesia Daily Press Newspaper Classified Notice Section GW- 028 Public Notice (Eddy County)

Dear Sir or Madam:

Please publish (for one day [Saturday or Sunday (preferred)]) the attached Public Notice in the classified notice section of your respective newspaper.

For billing purposes, the New Mexico Oil Conservation Division billing information is as follows:

Artesia Daily Press: PO# is An Account # is
Please send me an affidavit of proof of publication for the notice that you process and contact me if you have questions. Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: CarlJ.Chavez@state.nm.us Website: <u>http://www.emnrd.state.nm.us/ocd/</u> "Why not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward with the Rest of the Nation?" To see how, go to "Pollution Prevention & Waste Minimization" at: http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental)

LEGAL NOTICE

NOTICE OF PUBLICATION

STATE OF NEW MEXICO ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT OIL CONSERVATION DIVISION

Notice is hereby given that pursuant to Water Quality Control Commission Regulations (20.6.2.3106 NMAC) the following discharge permit application(s) has been submitted to the Director of the New Mexico Oil Conservation Division (OCD), 1220 S. Saint Francis Drive, Santa Fe, New Mexico 87505, Telephone (505) 476-3440:

(GW-028) Navajo Refining Company - Artesia Refinery, Darrell Moore, Environmental Manager for Water and Waste, 501 E. Main, Artesia, New Mexico 88210, has submitted a renewal application for the Artesia Refinery located in SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico (northeast of the intersection of Highway 285 and Highway 82), in Artesia, New Mexico. The refinery refines up to 100,000 barrels per day of crude oil and discharges up to 14,000 bbl/day of treated wastewater to three permitted Underground Injection Control (UIC) Class I (non-hazardous) Injection Wells and/or to the publicly owned treatment works (POTW) for disposal, treatment, and/or beneficial reuse. A maximum sanitary waste water volume rate of 50 bbl/day is routed to the Artesia waste water treatment plant (WWTP) and about 26 barrels per day of total sanitary effluent is discharged into various NMED permitted Class V septic systems throughout the facility. There is currently ground water and vadose zone contamination present with abatement and monitoring in progress. Consequently, there is an ongoing discharge occurring to ground water from vadose zone contamination at the facility. All wastes generated will be temporarily stored in tanks or containers and shipped off site for disposal or recycling at an OCD permitted and/or approved facility. Ground water most likely to be affected by a spill, leak or accidental discharge is at a depth of approximately 25 feet below the ground surface with a total dissolved solids concentration of approximately 1,700 mg/L. The discharge permit specifies that Navajo Refining Company will remediate contaminated ground at the site to meet the standards specified in the Water Quality Control Commission regulations (20.6.2.3103 NMAC)

OCD has determined that the applications listed above are administratively complete and has prepared draft permits. OCD will accept comments and statements of interest regarding this application and will create a facility-specific mailing list for persons who wish to receive future notices. Persons interested in obtaining further information, submitting comments or requesting to be on a facility-specific mailing list for future notices may contact the Environmental Bureau Chief of the Oil Conservation Division at the address given above. The administrative completeness determination and draft permit may be viewed at the above address between 8:00 a.m. and 4:00 p.m., Monday through Friday, or may also be viewed at the OCD web site http://www.emnrd.state.nm.us/ocd/. Persons interested in obtaining a copy of the application and draft permit may contact OCD at the address given above. Prior to ruling on any proposed discharge permit or major modification, the Director shall allow a period of at least thirty (30) days after the date of publication of this notice, during which interested persons may submit comments or request that OCD hold a public hearing. Requests for a public hearing shall set forth the reasons why a hearing should be held. A hearing will be held if the Director determines that there is significant public interest.

If no public hearing is held, the Director will approve or disapprove the proposed permit based on information available, including all comments received. If a public hearing is held, the director will approve or disapprove the proposed permit based on information in the permit application and information submitted at the hearing.

Para obtener más información sobre esta solicitud en espan ol, sirvase comunicarse por favor: New Mexico Energy, Minerals and Natural Resources Department (Depto. Del Energia, Minerals y Recursos Naturales de Nuevo México), Oil Conservation Division (Depto. Conservacio'n Del Petróleo), 1220 South St. Francis Drive, Santa Fe, New México (Contacto: Dorothy Phillips, 505-476-3461).

GIVEN under the Seal of New Mexico Oil Conservation Commission at Santa Fe, New Mexico, on this 14th day of September 2011.

STATE OF NEW MEXICO OIL CONSERVATION DIVISION

4

Jami Bailey, Director

Published in the Artesia Daily Press, Artesia, N.M., Sept. 18, 2011. Legal No. 21854.

SEAL

Chavez, Carl J, EMNRD

From:	Chavez, Carl J, EMNRD
Sent:	Wednesday, September 14, 2011 4:51 PM
To:	Chavez, Carl J, EMNRD; Stevenson, Tod, DGF; Wunder, Matthew, DGF; 'Warren, Alvin, DIA'; 'ddapr@nmda.nmsu.edu'; 'Linda_Rundell@nm.blm.gov'; 'psisneros@nmag.gov'; 'r@rthicksconsult.com'; 'sricdon@earthlink.net'; 'nmparks@state.nm.us'; Dantonio, John, OSE; 'seligman@nmoga.org'; Fetner, William, NMENV; 'lazarus@glorietageo.com'; 'marissa.stone@state.nm.us'; 'ron.dutton@xcelenergy.com'; 'cgarcia@fs.fed.us'; Kieling, John, NMENV; 'bsg@garbhall.com'; Olson, Bill, NMENV; 'claudette.horn@pnm.com'; 'ekendrick@montand.com'; 'staff@ipanm.org'; 'dseawright@gmail.com'; 'jharris@rwdhc.com'; Bonham, Sherry, EMNRD; 'Dade.Randy@state.nm.us'; 'Dade.Randy@state.nm.us'; Gray, Darold, EMNRD; Perrin, Charlie, EMNRD; Powell, Brandon, EMNRD; Martin, Ed, EMNRD; 'lynnb@nmt.edu'; Gonzales, Elidio L, EMNRD
Cc:	Stevenson, Tod, DGF; Wunder, Matthew, DGF; 'Warren, Alvin, DIA'; 'ddapr@nmda.nmsu.edu'; 'Linda_Rundell@nm.blm.gov'; 'psisneros@nmag.gov'; 'r@rthicksconsult.com'; 'sricdon@earthlink.net'; 'nmparks@state.nm.us'; Dantonio, John, OSE; 'lynnb@nmt.edu'; 'seligman@nmoga.org'; Fetner, William, NMENV; 'lazarus@glorietageo.com'; 'marissa.stone@state.nm.us'; 'ron.dutton@xcelenergy.com'; 'cgarcia@fs.fed.us'; Kieling, John, NMENV; 'bsg@garbhall.com'; 'claudette.horn@pnm.com'; 'ekendrick@montand.com'; 'jharris@rwdhc.com'; 'dseawright@gmail.com'; 'staff@ipanm.org'; 'Turri, Mark'
Subject:	RE: New Mexico Oil Conservation Division Public Notices for Navajo Refining Company- Artesia (GW-028) & Lovington (GW-014) Discharge Permit Renewal

Dear Sir or Madam:

This e-mail message is to alert you about the above subject discharge permit renewals for the above subject refineries and public notice process under the Water Quality Control Commission (WQCC) Regulation § 20.6.2.3108 NMAC.

The OCD has posted the draft discharge permits and associated documents for GWs <u>14</u> and <u>28</u> on its website at <u>http://www.emnrd.state.nm.us/ocd/ENV-DraftPublicEtc.htm</u> today. In addition, the OCD is working to post its public notice in the Santa Fe New Mexican and Local Newspapers by next week.

Please contact me If you have questions. Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: CarlJ.Chavez@state.nm.us Website: <u>http://www.emnrd.state.nm.us/ocd/</u> "Why not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward with the Rest of the Nation?" To see how, go to "Pollution Prevention & Waste Minimization" at: <u>http://www.emnrd.state.nm.us/ocd/</u>environmental.htm#environmental)

NOTICE OF PUBLICATION

STATE OF NEW MEXICO ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT OIL CONSERVATION DIVISION

Notice is hereby given that pursuant to Water Quality Control Commission Regulations (20.6.2.3106 NMAC) the following discharge permit application(s) has been submitted to the Director of the New Mexico Oil Conservation Division (OCD), 1220 S. Saint Francis Drive, Santa Fe, New Mexico 87505, Telephone (505) 476-3440:

(GW-028) Navajo Refining Company - Artesia Refinery, Darrell Moore, Environmental Manager for Water and Waste, 501 E. Main, Artesia, New Mexico 88210, has submitted a renewal application for the Artesia Refinery located in SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico (northeast of the intersection of Highway 285 and Highway 82), in Artesia, New Mexico. The refinery refines up to 100,000 barrels per day of crude oil and discharges up to 14,000 bbl/day of treated wastewater to three permitted Underground Injection Control (UIC) Class I (non-hazardous) Injection Wells and/or to the publicly owned treatment works (POTW) for disposal, treatment, and/or beneficial reuse. A maximum sanitary waste water volume rate of 50 bbl/day is routed to the Artesia waste water treatment plant (WWTP) and about 26 barrels per day of total sanitary effluent is discharged into various NMED permitted Class V septic systems throughout the facility. There is currently ground water and vadose zone contamination present with abatement and monitoring in progress. Consequently, there is an ongoing discharge occurring to ground water from vadose zone contamination at the facility. All wastes generated will be temporarily stored in tanks or containers and shipped off site for disposal or recycling at an OCD permitted and/or approved facility. Ground water most likely to be affected by a spill, leak or accidental discharge is at a depth of approximately 25 feet below the ground surface with a total dissolved solids concentration of approximately 1,700 mg/L. The discharge permit specifies that Navajo Refining Company will remediate contaminated ground at the site to meet the standards specified in the Water Quality Control Commission regulations (20.6.2.3103 NMAC)

OCD has determined that the applications listed above are administratively complete and has prepared draft permits. OCD will accept comments and statements of interest regarding this application and will create a facility-specific mailing list for persons who wish to receive future notices. Persons interested in obtaining further information, submitting comments or requesting to be on a facility-specific mailing list for future notices may contact the Environmental Bureau Chief of the Oil Conservation Division at the address given above. The administrative completeness determination and draft permit may be viewed at the above address between 8:00 a.m. and 4:00 p.m., Monday through Friday, or may also be viewed at the OCD web site http://www.emnrd.state.nm.us/ocd/. Persons interested in obtaining a copy of the application and draft permit may contact OCD at the address given above. Prior to ruling on any proposed discharge permit or major modification, the Director shall allow a period of at least thirty (30) days after the date of publication of this notice, during which interested persons may submit comments or request that OCD hold a public hearing. Requests for a public hearing shall set forth the reasons why a hearing should be held. A hearing will be held if the Director determines that there is significant public interest.

If no public hearing is held, the Director will approve or disapprove the proposed permit based on information available, including all comments received. If a public hearing is held, the director will approve or disapprove the proposed permit based on information in the permit application and information submitted at the hearing.

Para obtener más información sobre esta solicitud en español, sirvase comunicarse por favor: New Mexico

Energy, Minerals and Natural Resources Department (Depto. Del Energia, Minerals y Recursos Naturales de Nuevo México), Oil Conservation Division (Depto. Conservacio'n Del Petróleo), 1220 South St. Francis Drive, Santa Fe, New México (Contacto: Dorothy Phillips, 505-476-3461).

GIVEN under the Seal of New Mexico Oil Conservation Commission at Santa Fe, New Mexico, on this 14th day of September 2011.

SEAL

STATE OF NEW MEXICO OIL CONSERVATION DIVISION

Jami Bailey, Director

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NOTICE OF PUBLICATION

STATE OF NEW MEXICO ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT OIL CONSERVATION DIVISION

Notice is hereby given that pursuant to Water Quality Control Commission Regulations (20.6.2.3106 NMAC) the following discharge permit application(s) has been submitted to the Director of the New Mexico Oil Conservation Division (OCD), 1220 S. Saint Francis Drive, Santa Fe, New Mexico 87505, Telephone (505) 476-3440:

(GW-028) Navajo Refining Company - Artesia Refinery, Darrell Moore, Environmental Manager for Water and Waste, 501 E. Main, Artesia, New Mexico 88210, has submitted a renewal application for the Artesia Refinery located in SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico (northeast of the intersection of Highway 285 and Highway 82), in Artesia, New Mexico. The refinery refines up to 100,000 barrels per day of crude oil and discharges up to 14,000 bbl/day of treated wastewater to three permitted Underground Injection Control (UIC) Class I (non-hazardous) Injection Wells and/or to the publicly owned treatment works (POTW) for disposal, treatment, and/or beneficial reuse. A maximum sanitary waste water volume rate of 50 bbl/day is routed to the Artesia waste water treatment plant (WWTP) and about 26 barrels per day of total sanitary effluent is discharged into various NMED permitted Class V septic systems throughout the facility. There is currently ground water and vadose zone contamination present with abatement and monitoring in progress. Consequently, there is an ongoing discharge occurring to ground water from vadose zone contamination at the facility. All wastes generated will be temporarily stored in tanks or containers and shipped off site for disposal or recycling at an OCD permitted and/or approved facility. Ground water most likely to be affected by a spill, leak or accidental discharge is at a depth of approximately 25 feet below the ground surface with a total dissolved solids concentration of approximately 1,700 mg/L. The discharge permit specifies that Navajo Refining Company will remediate contaminated ground at the site to meet the standards specified in the Water Quality Control Commission regulations (20.6.2.3103 NMAC)

OCD has determined that the applications listed above are administratively complete and has prepared draft permits. OCD will accept comments and statements of interest regarding this application and will create a facility-specific mailing list for persons who wish to receive future notices. Persons interested in obtaining further information, submitting comments or requesting to be on a facility-specific mailing list for future notices may contact the Environmental Bureau Chief of the Oil Conservation Division at the address given above. The administrative completeness determination and draft permit may be viewed at the above address between 8:00 a.m. and 4:00 p.m., Monday through Friday, or may also be viewed at the OCD web site http://www.enurd.state.nm.us/ocd/. Persons interested in obtaining a copy of the application and draft permit may contact OCD at the address given above. Prior to ruling on any proposed discharge permit or major modification, the Director shall allow a period of at least thirty (30) days after the date of publication of this notice, during which interested persons may submit comments or request that OCD hold a public hearing. Requests for a public hearing shall set forth the reasons why a hearing should be held. A hearing will be held if the Director determines that there is significant public interest.

If no public hearing is held, the Director will approve or disapprove the proposed permit based on information available, including all comments received. If a public hearing is held, the director will approve or disapprove the proposed permit based on information in the permit application and information submitted at the hearing.

Para obtener más información sobre esta solicitud en español, sirvase comunicarse por favor: New Mexico

Energy, Minerals and Natural Resources Department (Depto. Del Energia, Minerals y Recursos Naturales de Nuevo México), Oil Conservation Division (Depto. Conservacio'n Del Petróleo), 1220 South St. Francis Drive, Santa Fe, New México (Contacto: Dorothy Phillips, 505-476-3461).

GIVEN under the Seal of New Mexico Oil Conservation Commission at Santa Fe, New Mexico, on this 14th day of September 2011.

STATE OF NEW MEXICO OIL CONSERVATION DIVISION

Jami Bailey, Director

Chavez, Carl J, EMNRD

From:	Chavez, Carl J, EMNRD
Sent:	Wednesday, September 14, 2011 4:13 PM
To:	Moore, Darrell
Cc:	Lackey, Johnny; Tsinnajinnie, Leona, NMENV; Gonzales, Elidio L, EMNRD; Dade, Randy, EMNRD
Subject:	Artesia (GW-028) and Lovington (GW-014) Refineries Discharge Permit Renewals & Administrative Completeness
Attachments:	Renewal WQCC Notice Regs.pdf; PN Flow Chart.20.6.2renewal.pdf

Gentlemen:

Today your discharge permit renewal applications were deemed to be administratively complete and marks the start of the OCD's WQCC Public Notice process (see attached flow chart for the public notice process and "who does what" for reference.

To view all applicable documents associated with the above, please go to: <u>http://www.emnrd.state.nm.us/ocd/ENV-</u> <u>DraftPublicEtc.htm</u>

and view the documents associated with your refineries. A hardcopy was placed in the mail to you this afternoon.

Please contact me if you have questions. Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: CarlJ.Chavez@state.nm.us Website: <u>http://www.emnrd.state.nm.us/ocd/</u> "Why not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward with the Rest of the Nation?" To see how, go to "Pollution Prevention & Waste Minimization" at: <u>http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental</u>)

Notice Requirements For Discharge Permit Renewals

20.6.2.3108 PUBLIC NOTICE AND PARTICIPATION:

A. Within 15 days of receipt of an application for a discharge permit, modification or renewal, the department shall review the application for administrative completeness. To be deemed administratively complete, an application shall provide all of the information required by Paragraphs (1) through (5) of Subsection F of 20.6.2.3108 NMAC and shall indicate, for department approval, the proposed locations and newspaper for providing notice required by Paragraphs (1) and (4) of Subsection B or Paragraph (2) of Subsection C of 20.6.2.3108 NMAC. The department shall notify the applicant in writing when the application is deemed administratively complete. If the department determines that the application is not administratively complete, the department shall notify the applicant of the deficiencies in writing within 15 days of receipt of the application and state what additional information is necessary.

B. Within 30 days of the department deeming an application for discharge permit or discharge permit modification administratively complete, the applicant shall provide notice, in accordance with the requirements of Subsection F of 20.6.2.3108 NMAC, to the general public in the locale of the proposed discharge in a form provided by the department by each of the methods listed below:

(1) for each 640 contiguous acres or less of a discharge site, prominently posting a synopsis of the public notice at least 2 feet by 3 feet in size, in English and in Spanish, at a place conspicuous to the public, approved by the department, at or near the proposed facility for 30 days; one additional notice, in a form approved by and may be provided by the department, shall be posted at a place located off the discharge site, at a place conspicuous to the public and approved by the department; the department may require a second posting location for more than 640 contiguous acres or when the discharge site is not located on contiguous properties;

(2) providing written notice of the discharge by mail, to owners of record of all properties within a 1/3 mile distance from the boundary of the property where the discharge site is located; if there are no properties other than properties owned by the discharger within a 1/3 mile distance from the boundary of property where the discharge site is located, the applicant shall provide notice to owners of record of the next nearest adjacent properties not owned by the discharger;

(3) providing notice by certified mail, return receipt requested, to the owner of the discharge site if the applicant is not the owner; and

(4) publishing a synopsis of the notice in English and in Spanish, in a display ad at least three inches by four inches not in the classified or legal advertisements section, in a newspaper of general circulation in the location of the proposed discharge.

C. Within 30 days of the department deeming an application for discharge permit renewal administratively complete, the applicant shall provide notice, in accordance with the requirements of Subsection F of 20.6.2.3108 NMAC, to the general public in the locale of the proposed discharge in a form provided by the department by each of the methods listed below:

(1) providing notice by certified mail to the owner of the discharge site if the applicant is not the owner; and

(2) publishing a synopsis of the notice, in English and in Spanish, in a display ad at least two inches by three inches, not in the classified or legal advertisements section, in a newspaper of general circulation in the location of the discharge.

D. Within 15 days of completion of the public notice requirements in Subsections B or C of 20.6.2.3108 NMAC, the applicant shall submit to the department proof of notice, including an affidavit of mailing(s) and the list of property owner(s), proof of publication, and an affidavit of posting, as appropriate.

E. Within 30 days of determining an application for a discharge permit, modification or renewal is administratively complete, the department shall post a notice on its website and shall mail notice to any affected local, state, federal, tribal or pueblo governmental agency, political subdivisions, ditch associations and land grants, as identified by the department. The department shall also mail or e-mail notice to those persons on a general and facility-specific list maintained by the department who have requested notice of discharge permit applications. The notice shall include the information listed in Subsection F of 20.6.2.3108 NMAC.

The notice provided under Subsection B, C and E of 20.6.2.3108 NMAC shall include:

(1) the name and address of the proposed discharger:

F.

(2) the location of the discharge, including a street address. if available, and sufficient information to locate the facility with respect to surrounding landmarks;

(3) a brief description of the activities that produce the discharge described in the application:

(4) a brief description of the expected quality and volume of the discharge;

(5) the depth to and total dissolved solids concentration of the ground water most likely to be affected by the discharge;

(6) the address and phone number within the department by which interested persons may obtain information, submit comments, and request to be placed on a facility-specific mailing list for future notices; and

(7) a statement that the department will accept comments and statements of interest regarding the application and will create a facility-specific mailing list for persons who wish to receive future notices.

G. All persons who submit comments or statements of interest to the department or previously participated in a public hearing and who provide a mail or e-mail address shall be placed on a facility-specific mailing list and the department shall send those persons the public notice issued pursuant to Subsection H of 20.6.2.3108 NMAC, and notice of any public meeting or hearing scheduled on the application. All persons who contact the department to inquire about a specific facility shall be informed of the opportunity to be placed on the facility-specific mailing list.

H. Within 60 days after the department makes its administrative completeness determination and all required technical information is available, the department shall make available a proposed approval or disapproval of the application for a discharge permit, modification or renewal, including conditions for approval proposed by the department or the reasons for disapproval. The department shall mail by certified mail a copy of the proposed approval or disapproval or disapproval or disapproval of the application for a discharge permit, modification or renewal by:

(1) posting on the department's website;

(2) publishing notice in a newspaper of general circulation in this state and a newspaper of general circulation in the location of the facility;

(3) mailing or e-mailing to those persons on a facility-specific mailing list;

(4) mailing to any affected local, state, or federal governmental agency, ditch associations and land grants, as identified by the department; and

(5) mailing to the governor, chairperson, or president of each Indian tribe, pueblo or nation within the state of New Mexico, as identified by the department.

1. The public notice issued under Subsection H shall include the information in Subsection F of 20.6.2.3108 NMAC and the following information:

(1) a brief description of the procedures to be followed by the secretary in making a final determination;

(2) a statement of the comment period and description of the procedures for a person to request a hearing on the application; and

(3) the address and telephone number at which interested persons may obtain a copy of the proposed approval or disapproval of an application for a discharge permit, modification or renewal.

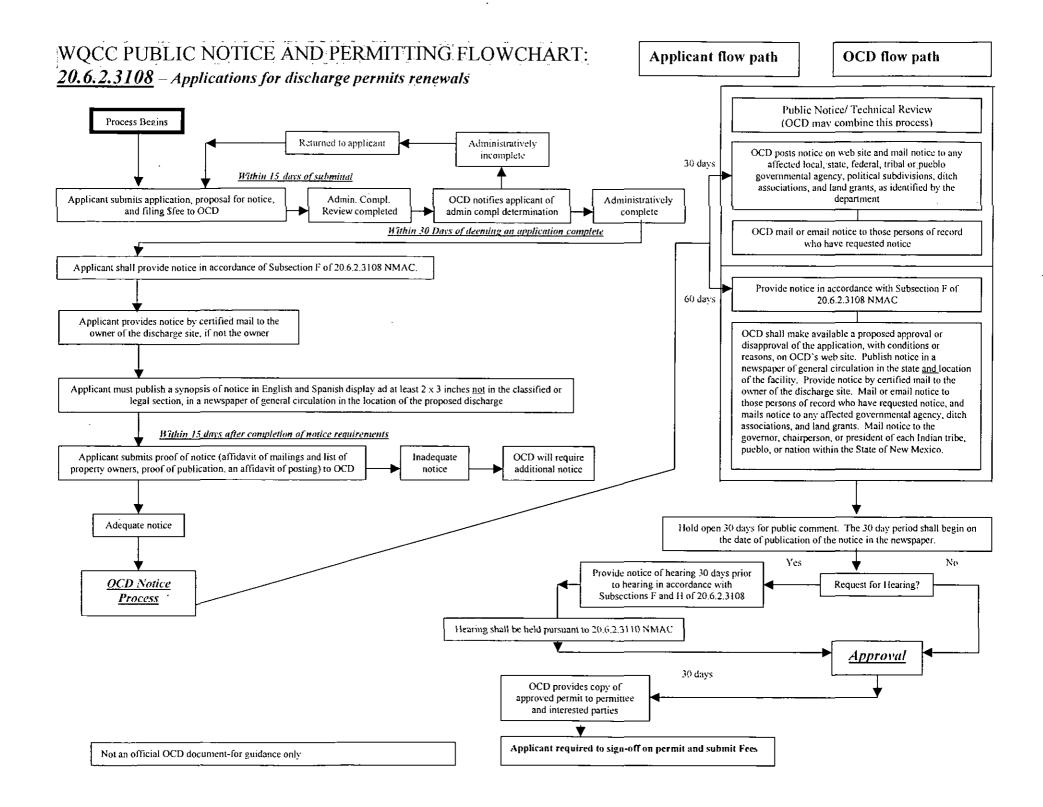
J. In the event that the proposed approval or disapproval of an application for a discharge permit, modification or renewal is available for review within 30 days of deeming the application administratively complete, the department may combine the public notice procedures of Subsections E and H of 20.6.2.3108 NMAC.

K. Following the public notice of the proposed approval or disapproval of an application for a discharge permit, modification or renewal, and prior to a final decision by the secretary, there shall be a period of at least 30 days during which written comments may be submitted to the department and/or a public hearing may be requested in writing. The 30-day comment period shall begin on the date of publication of notice in the newspaper. All comments will be considered by the department. Requests for a hearing shall be in writing and shall set forth the reasons why a hearing should be held. A public hearing shall be held if the secretary determines there is substantial public interest. The department shall notify the applicant and any person requesting a hearing of the decision whether to hold a hearing and the reasons therefore in writing.

L. If a hearing is held, pursuant to Subsection K of 20.6.2.3108 NMAC, notice of the hearing shall be given by the department at least 30 days prior to the hearing in accordance with Subsection H of 20.6.2.3108 NMAC. The notice shall include the information identified in Subsection F of 20.6.2.3108 NMAC in addition to the time and place of the hearing and a brief description of the hearing procedures. The hearing shall be held pursuant to 20.6.2.3110 NMAC.

20.6.2 NMAC 17

[2-18-77, 12-24-87, 12-1-95, 11-15-96; 20.6.2.3108 NMAC - Rn, 20 NMAC 6.2.111.3108, 1-15-01; A, 12-1-01; A, 9-15-02; A, 7-16-06]



New Mexico Energy, Minerals and Natural Resources Department

Susana Martinez Governor

John H. Bemis Cabinet Secretary-Designate Jami Bailey Division Director Oil Conservation Division



Brett F. Woods, Ph.D. Deputy Cabinet Secretary

SEPTEMBER 14, 2011

CERTIFIED MAIL RETURN RECEIPT NO: 7001 1940 0004 7923 1176

Mr. Darrell Moore Environmental Manager for Water and Waste Navajo Refining Company- Artesia Refinery P.O. Box 159 Artesia, New Mexico 88211-0159

RE: DRAFT Discharge Permit Renewal (GW-028) Artesia Refinery SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico

Dear Mr. Moore:

Pursuant to the Water Quality Control Commission (WQCC) Regulations 20.6.2.3104 - 20.6.2.3114 NMAC, the Oil Conservation Division (OCD) hereby proposes to approve the renewal of Navajo Refining Company's (Owner/Operator) discharge permit for the above referenced Facility contingent upon the conditions specified in the attached draft Discharge Permit. Please review and provide comments to OCD on the draft Discharge Permit within 45 days of receipt of this letter including permit fees.

If you have any questions, please contact Carl Chavez of my staff at (505-476-3490) or E-mail: <u>CarlJ.Chavez@state.nm.us</u>. On behalf of the staff of the OCD, I wish to thank you and your staff for your cooperation during this discharge permit review.

Sincerely,

Glenn von Gonten Acting Environmental Bureau Chief

GvG/gvg

DISCHARGE PERMIT GW-028

1. GENERAL PROVISIONS:

A. PERMITTEE AND PERMITTED FACILITY: The Oil Conservation Division (OCD) of the Energy, Minerals and Natural Resources Department issues Discharge Permit GW-028 (Discharge Permit) to Navajo Refining Company (Owner/Operator) located at 501 E. Main, Artesia, New Mexico 88210, to operate the Artesia Refinery (Facility) located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, including the abatement of ground water and vadose zone contamination. The refinery is located northeast of the intersection of Hwy. 285 and Hwy. 82, in Artesia, New Mexico.

The Facility provides oil and gas refining. The Facility refines and processes up to 40,000 barrels per day of crude oil and other feed stocks. Ground water that may be affected by a spill, leak, or accidental discharge occurs at a depth of approximately 25 feet below ground surface with a total dissolved solids concentration of approximately 2,500 mg/L.

B. SCOPE OF PERMIT: OCD has been granted authority to administer the Water Quality Act (Chapter 74, Article 6 NMSA 1978) as it applies to refineries by statute and by delegation from the Water Quality Control Commission pursuant to Section 74-6-4(E) NMSA 1978.

The Water Quality Act and the rules issued under that Act protect ground water and surface water of the State of New Mexico, by providing that, funless otherwise allowed by rule, no person shall cause or allow effluent or leachate to discharge so that it may move directly or indirectly into ground water unless such discharge is pursuant to an approved discharge permit (see WQCC Regulations: 2016)2:3104 NMAC and 20.6,2.3106 NMAC).

This Discharge Permit does not authorize any treatment of, or on-site disposal of, any materials, product, by-product, or oil field waste, including, but not limited to, the on-site disposal of lube oil, glycol, antifreeze, filters, elemental sulfur, washdown water, contaminated soil, and cooling tower blowdown water.

This Discharge Permit does not convey any property rights of any sort nor any exclusive privilege, and does not authorize any injury to persons or property, any invasion of other private rights, or any infringement of state, federal, or local laws, rules or regulations.

The Owner/Operator shall operate in accordance with the Discharge Permit conditions to comply with the Water Quality Act and the rules issued pursuant to that Act, so that neither a hazard to public health nor undue risk to property will result (see 20.6.2.3109C NMAC); so that no discharge will cause or may cause any stream standard to be violated (see 20.6.2.3109H(2) NMAC); so that no discharge of any water contaminant will result in a hazard to public health, (see 20.6.2.3109H(3) NMAC); and so that the numerical standards specified of 20.6.2.3103 NMAC are not exceeded.

The Owner/Operator shall not allow or cause water pollution, discharge, or release of any water contaminant that exceeds the Water Quality Control Commission (WQCC) standards specified at 20.6.2.3101 NMAC and 20.6.2.3103 NMAC or 20.6.4 NMAC (Water Quality Standards for Interstate and Intrastate Streams).

C. **DISCHARGE PERMIT CONDITIONS:** By signing this Discharge Permit, the Owner/Operator agrees to the specific provisions set out in this document, and the commitments made in the approved Discharge Permit Application and the attachments to that application, which are incorporated into the Discharge Permit by reference.

This Discharge Permit is a permit renewal, it replaces the permit being renewed. Replacement of a prior permit does not relieve the Owner/Operator of its responsibility to comply with the terms of that prior permit while that permit was in effect.

D. DEFINITIONS: Terms not specifically defined in this Discharge Permit shall have the same meanings as those in the Water Quality Act or the rules adopted pursuant to the Act, as the context requires.

E. FILING FEES AND PERMIT FEES: Pursuant to 20.6.2.3114 NMAC, every facility that submits a discharge permit application for initial approval or renewal shall pay the permit fees specified in Table 1 and the filing fee specified in Table 2 of 20.6.2.3114 NMAC. OCD has already received the required \$100.00 filing fee for this application. The flat fee for the abatement of Ground Water and Vadose Zone Contamination is \$2,600.00. The Owner/Operator shall submit this amount along with the signed Discharge Permit. Checks should be payable to the "New Mexico Water Quality Management Fund," and not the Oil Conservation Division.

F. EFFECTIVE DATE, EXPIRATION, RENEWAL CONDITIONS, AND PENALTIES FOR OPERATING WITHOUT'A DISCHARGE PERMIT: This Discharge Permit is effective when the Division's Environmental Bureau receives the signed Discharge Permit from the Owner/Operator and the \$2,600.00 fee or until the permit is terminated. This Discharge Permit will expire on October 21, 2016. The Owner/Operator shall submit an application for renewal no later than 120 ealendar days before that expiration date, pursuant to 20.6.2.3106F NMAC. If an Owner/Operator submits a renewal application at least 120 calendar days before the Discharge Permit expires and is in compliance with the approved Discharge Permit, then the existing Discharge Permit will not expire until OCD has approved or disapproved the renewal application. Operating with an expired Discharge Permit may subject the Owner/Operator to civil and/or criminal penalties. See Section 74-6-10.1 NMSA 1978 and Section 74-6-10.2 NMSA 1978.

G. MODIFICATIONS: The Owner/Operator shall notify the Division's Environmental Bureau of any Facility expansion, production increase, or process modification that would result in any significant modification in the discharge of water contaminants (see 20.6.2.3107C NMAC). The Division's Environmental Bureau may require the Owner/Operator to submit a permit modification pursuant to 20.6.2.3109E NMAC and may modify or terminate a permit pursuant to Section 74-6-5(M) through (N) NMSA 1978.

H. TRANSFER OF DISCHARGE PERMIT: Prior to any transfer of ownership, control, or possession (whether by lease, conveyance or otherwise) of the Facility, the transferor shall notify the transferee in writing of the existence of the Discharge Permit, and shall deliver or send by certified mail to the Division's Environmental Bureau a copy of such written notification, together with a certification or other proof that such notification has been received by the transferee pursuant to 20.6.2.3111 NMAC. Upon receipt of such notification, the transferee shall inquire into all of the provisions and requirements contained in the Discharge Permit, and the transferee shall be charged with notice of all such provisions and requirements as they appear of record in the Division's file or files concerning the Discharge Permit. Upon assuming either ownership or possession of the Facility the transferee shall have the same rights and responsibilities under the Discharge Permit as were applicable to the transferor (see 20.6.2.3111 NMAC).

Transfer of the ownership, control, or possession of the Facility does not relieve the transferor of responsibility or liability for any act or omission which occurred while the transferor owned, controlled, or was in possession of the Facility (see 20.6.2.3111(E) NMAC).

I. CLOSURE PLAN AND FINANCIAL ASSURANCE: The Owner/Operator shall notify the Division's Environmental Bureau in writing when any operations of its Facility are to be discontinued for a period in excess of six months. Upon review of the Owner/Operator's notice, the Division's Environmental Bureau will determine whether to modify this permit, pursuant to 20.6.2.3107 NMAC and 20.6.2.3109E NMAC, to require the Owner/Operator to submit a closure plan, and/or post-closure plan, including financial assurance.

J. COMPLIANCE AND ENFORCEMENT: If the Owner/Operator violates or is violating a condition of this Discharge Permit, the Division's Environmental Bureau may issue a compliance order requiring compliance immediately or within a specified time period, suspending or terminating this Discharge Permit; and/or assessing a civil penalty. See Section 74-6-10 NMSA 1978. The Division's Environmental Bureau may also commence a civil action in district court for appropriate relief, including injunctive relief. See Section 74-6-10(A)(2) NMSA 1978 and Section 74-6-11 NMSA 1978. The Owner/Operator may be subject to criminal penalties for discharging a water contaminant without a discharge permit or in violation of a condition of a discharge permit, making any false material statement, representation, certification or omission of material fact in an application, record, report, plan or other document filed, submitted or required to be maintained under the Water Quality Act; falsifying, tampering with or rendering inaccurate any monitoring device, method or record required to be maintained under the Water Quality Act; or failing to monitor, sample or report as required by a permit issued pursuant to a state or federal law or regulation. See Section 74-6-10.2 NMSA 1978.

2. GENERAL FACILITY OPERATIONS:

A. OPERATIONAL MONITORING: The Owner/Operator shall comply with its approved monitoring programs pursuant to 20.6.2.3107 NMAC.

1. **Ground Water Monitoring System:** The Owner/Operator shall monitor and remediate ground water in accordance with the Facility-Wide Ground Water Monitoring Plan

(FWGWMP). The Owner/Operator shall monitor for all of the constituents listed in 20.6.2.3103 NMAC following the procedures specified in the FWGWMP. Proposed changes to the FWGWMP shall be submitted annually to the agencies during the month of March.

2. Effluent Monitoring System: The Owner/Operator shall stop and/or prevent the discharge(s) of Reverse Osmosis (RO) reject fluid or any other effluent discharge(s) from the facility treatment system to the environment (*i.e.*, farm fields, Eagle Draw, etc.) so that toxic pollutant(s) as defined in Section 20.6.2.7WW NMAC shall not be present and the standards of Section 20.6.2.3103 NMAC shall not be exceeded within six (6) months of permit issuance. Within one (1) month of permit issuance, the Owner/Operator shall sample and/or monitor RO reject fluid effluent on a monthly basis for the constituents listed in the 20.6.2.3103 NMAC water quality standards. If the analyses indicate an exceedance of any water quality standard or to background, the Owner/Operator shall immediately resample the effluent to confirm any exceedance(s) of the WQCC water quality standard(s). If the analysis confirms the exceedance, then the Owner/Operator shall report the release in accordance with Permit Condition 2F and shall immediately cease discharging the effluent and correct the situation. All corrective measures must be approved by both OCD and New Mexico Environment Department.

B. POST-CLOSURE MONITORING: The Owner/Operator shall comply with its approved post-closure monitoring program pursuant 20.6.2.3107 NMAC (Continuation of monitoring after cessation of operations).

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C. CONTINGENCY PLANS: The Owner/Operator shall implement its approved Contingency Plans to cope with failure of the Discharge Permit or system in accordance with Permit Conditions 2.F and 2.G herein.

D. CLOSURE PLAN: After completing abatement of all ground water and vadose contamination required under Permit Condition 2.G, the Owner/Operator shall perform the following closure measures:

1. Remove or plug all lines leading to and from any extraction or recovery wells and any injection wells so that a discharge can no longer occur.

2. Remove all remediation system components from the site, if applicable.

3. After receiving notification from the Division's Environmental Bureau that postclosure monitoring may cease, the Owner/Operator shall plug and abandon the monitoring well(s).

E. RECORD KEEPING: The Owner/Operator shall maintain records of all inspections required by this Discharge Permit at its Facility office for a minimum of five years and shall make those records available for inspection by the Division's Environmental Bureau and/or New Mexico Environment Department.

F. RELEASE REPORTING: The Owner/Operator shall comply with the following permit conditions, pursuant to 20.6.2.1203 NMAC, and submittal of an OCD C-141 to report releases, if it determines that a release of oil or other water contaminant, in such quantity as may with reasonable probability injure or be detrimental to human health, animal or plant life, or

property, or unreasonably interfere with the public welfare or the use of property, has occurred. The Owner/Operator shall report unauthorized releases of water contaminants in accordance with any additional commitments made in its approved Contingency Plan. If the Owner/Operator determines that any constituent exceeds the standards specified at 20.6.2.3103 NMAC, then it shall report a release to the Division's Environmental Bureau.

1. Oral Notification: As soon as possible after learning of such a discharge, but in no event more than twenty-four (24) hours thereafter, the Owner/Operator shall notify the Division's Environmental Bureau. The Owner/Operator shall provide the following:

- the name, address, and telephone number of the person or persons in charge of the facility, as well as of the Owner/Operator of the facility;
- the name and location of the facility
- the date, time, location, and duration of the discharge
- the source and cause of discharge,
- a description of the discharge, including its chemical composition;
- the estimated volume of the discharge; and
- any corrective or abatement actions taken to mitigate immediate damage from the discharge.

2. Written Notification: Within one week after the Owner/Operator has discovered a discharge, the Owner/Operator shall send written notification (may use a C-141 form with attachments) to the Division's Environmental Bureau verifying the prior oral notification as to each of the foregoing items and providing any appropriate additions or corrections to the information contained in the prior oral notification?

G. ABATEMENT PLAN: Pursuant to 20.6.2.4105A(6) NMAC, an Owner/Operator is exempt from the requirement to obtain and implement an Abatement Plan, as required in 20.6.2.4104 NMAC. However, an Owner/Operator's Discharge Permit must address abatement of contaminated ground water, and be consistent with the requirements and provisions of Sections 20.6.2.4101, 20.6.2.4103, Subsections C and E of Section 20.6.2.4106, Sections 20.6.2.4107 and 20.6.2.4112 NMAC.

1. Purpose of Abatement Plan: The Owner/Operator shall abate polluted ground water so as to either remediate or protect the ground water for use as domestic and agricultural water supply.

2. Abatement Standards and Requirements: The Owner/Operator shall abate the vadose zone so that water contaminants in the vadose zone shall not contaminate ground water or surface water through leaching, percolation or as the water table elevation fluctuates. The Owner/Operator, where the Total Dissolved Solids concentration is 10,000 mg/L or less, shall abate contaminated ground water so that toxic pollutant(s), as defined in 20.6.2.7WW NMAC, shall not be present and so that the standards of 20.6.2.3103 NMAC shall be met.

3. Stage 1 Abatement Plan: The Owner/Operator shall continue to implement its approved Stage 1 Abatement and monitoring consistent with the Facility-Wide Ground Water

Monitoring Plan (FWGWMP). Pursuant to 20.6.2.4106C NMAC, the purpose of a Stage 1 Abatement Plan is to design and conduct a site investigation that will adequately define site conditions, and provide the data necessary to select and design an effective abatement option.

4. Stage 2 Abatement Plan: The Owner/Operator shall to implement its approved Stage 2 Abatement and monitoring consistent with the FWGWMP. OCD will allow the Owner/Operator to abate pollution under this provision for good cause. Pursuant to 20.6.2.4106E NMAC, the purpose of the Stage 2 Abatement Plan is for the Owner/Operator to select and design, if necessary, an abatement option that, when implemented, will result in attainment of the abatement standards and requirements set forth in Section 20.6.2.4103 NMAC, including post-closure maintenance activities.

5. Completion and Termination: Pursuant to 20.6.2,4112 NMAC, abatement shall be considered complete when the standards and requirements specified in 20.6.2.4103 NMAC are met. At that time, the Owner/Operator shall submit an abatement completion report, documenting compliance with the standards and requirements, set forth in 20.6.2.4103 NMAC and this Discharge Permit, to Division's Environmental Bureau for approval. The abatement completion report also shall propose any changes to long term monitoring and site maintenance activities, if needed, to be performed after termination of the abatement plan.

H. OTHER REQUIREMENTS:

1. Inspection and Entry: Pursuant to 20.6.2.4107A NMAC, the Owner/Operator shall allow the Division's Environmental Buréau, upon the presentation of proper credentials, to:

- enter the facility at reasonable times;
- inspect and copy-records required by this discharge permit;

inspect any treatment units or systems, monitoring or abatement systems, and analytical equipment;

- zone, ground water, surface water, stream sediment, plants, animals, or vadosezone material including vadose-zone vapor;
- use the Owner/Operator's monitoring systems and wells in order to collect environmental samples; and
- gain access to off-site property not owned or controlled by the Owner/Operator, but accessible to the Owner/Operator through a third-party access agreement, provided that it is allowed by the agreement.

2. Advance Notice: Pursuant to 20.6.2.4107B NMAC, the Owner/Operator shall provide the Division's Environmental Bureau with at least four (4) working days advance notice of any environmental sampling to be performed pursuant to this Discharge Permit, or any well plugging, abandonment or destruction at the Facility site.

3. Hydrostatic Testing: Pursuant to 20.6.2.3104 NMAC, no effluent or leachate shall discharge or bc allowed to move directly or indirectly into ground water unless a

discharge permit is issued by the OCD. When a permit has been issued, discharges must be consistent with the terms and conditions of the permit.

4. Plugging and Abandonment: Pursuant to 20.6.2.4107© NMAC, the Owner/Operator shall propose to plug and abandon a monitor well by certified mail to the Division's Environmental Bureau for approval, unless such approval is required from the State Engineer. The proposed action shall be designed to prevent water pollution that could result from water contaminants migrating through the well or borehole. The proposed action shall not take place without written approval from the Division's Environmental Bureau, unless written approval or disapproval is not received by the Owner/Operator within thirty (30) days of the date of receipt of the proposal.

5. OCD Inspections: The OCD may place additional requirements on the facility and modify the permit conditions as needed based on OCD inspections.

I. ANNUAL REPORT: The Owner/Operator shall submit its annual report pursuant to 20.6.2.3107 NMAC to the Division's Environmental Bureau by April 15th of each year. The annual report shall include the following:

1. A summary of all major refinery activities or events including: a description of the monitoring and remediation activities, which occurred during the year with any conclusions and recommendations.

2. A summary of any new discoveries of ground water contamination with all leaks, spills and releases and corrective actions taken. Also include recommendations for investigation and abatement

3. Summary tables listing laboratory analyses of all water samples for each monitoring point and plots of concentration vs. time for contaminants of concern from each monitoring point. Any WQCC 20.6.2.3103 NMAC constituent found to exceed the water quality standard shall be highlighted and noted in the annual report. The Owner/Operator shall include copies of the most recent year's laboratory analytical data sheets with QA/QC.

4. An annual water table (piezometric) and potentiometric elevation map per aquifer system(s) using the water table elevation(s) from associated monitor wells in each aquifer system(s). A corrected water table or head elevation shall be determined for all wells containing phase-separated hydrocarbons. This map shall show aquifer system well locations, pertinent site features, and the ground water flow direction with hydraulic gradient. Include plots of head elevation vs. time for each ground water monitoring well over time.

5. An annual phase-separated hydrocarbon (PSH) and/or product thickness map from ground water in all monitoring and recovery wells. This map shall include isopleths or iso-concentration contour lines for products and contaminants of concern detected within each aquifer system.

6. Summary of the volume and quality of PSH or free product removed and the discharged treated ground water from the recovery wells during each quarter and the total recovered to date.

7. Results of ground water monitoring program with any recommendations based on contaminant hydrogeology. Include any recommended abatement or approved Contingency Plan.

8. Summary of all waste and wastewater disposed of, sold, or treated on-site, including a refinery wastewater balance sheet and mass balance of the evaporation pond rates.

9. Electronic filing: Owner/Operator shall file this report in an acceptable electronic format with hard copy submittals to the NMED and OCD.

10. Summary and copies of all EPA/NMED RCRA activity.

3. CLASS V WELLS: Pursuant to 20.6.2.5002B NMAC, leach fields and other wastewater disposal systems at Division-regulated facilities that inject non-hazardous fluid into or above an underground source of drinking water are UIC Class V injection wells. This Discharge Permit does not authorize the use of a Class V injection well for the disposal of industrial waste at the Facility, except for the disposal of contaminated ground water. Pursuant to 20.6.2.5005 NMAC, the Owner/Operator shall close any Class V industrial waste injection wells at its Facility that inject non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes (*e.g.*, septic systems, leach fields, dry wells, *etc.*) other than contaminated ground water within 90 calendar days of the issuance of this Discharge Permit. The Owner/Operator shall document the closure of any Class V wells used for the disposal of non-hazardous industrial wastes or a mixture other than contaminated ground water in its Annual Report.

Other Class V wells, including wells used only for the injection of domestic wastes, must be permitted by the New Mexico Environment Department.

4. SCHEDULE OF COMPLIANCE:

A. PERMIT CERTIFICATION: The Owner/Operator shall sign and return this Permit to the Division's Environmental Bureau within 30 days of its receipt of this Permit.

B. SUBMISSION OF THE PERMIT FEES: As specified in Permit Condition 1.F, the Owner/Operator shall submit the permit fee of \$2,600.00 along with the signed Discharge Permit within 30 days of the receipt of the Discharge Permit. Checks should be payable to the "New Mexico Water Quality Management Fund," <u>not</u> the Oil Conservation Division.

C. ANNUAL REPORT: As specified in Permit Condition 2.1, the Owner/Operator shall submit its annual report to the Division's Environmental Bureau by April 15th of each year.

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5. **CERTIFICATION:** (OWNER/OPERATOR) by the officer whose signature appears below, acknowledges receipt of this Discharge Permit, and has reviewed its terms and conditions.

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	Company Re	presentative -	print name	
	Company Representative - Signature			
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New Mexico Energy, Minerals and Natural Resources Department

Susana Martinez Governor

John H. Bemis Cabinet Secretary-Designate

Brett F. Woods, Ph.D. Deputy Cabinet Secretary Jami Bailey Division Director Oil Conservation Division



SEPTEMBER 14, 2011

Mr. Darrell Moore Environmental Manager for Water & Waste Navajo Refining Company- Artesia Refinery P.O. Box 159 Artesia, New Mexico 88211-0159

Re: Discharge Permit Renewal (GW-028) Artesia Refinery SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico

Dear Mr. Moore:

The Oil Conservation Division (OCD) has received Navajo Refining Company's request and initial fee, dated April 5, 2011, to renew GW-028 for the Navajo Refining Company- Artesia Refinery located just northeast of the intersection of Hwy. 285 and Hwy. 82, in Artesia New Mexico. The application for renewal submittal provided the required information in order to deem the application "administratively" complete.

Therefore, the Water Quality Control Commission regulations (WQCC) notice requirements of 20.6.2.3108 NMAC must be satisfied and demonstrated to the OCD. The OCD will provide public notice pursuant to the WQCC notice requirements of 20.6.2.3108 NMAC to determine if there is any public interest.

If there are any questions regarding this matter, please do not hesitate to contact me at (505) 476-3490 or <u>CarlJ.Chavez@state.nm.us</u>. On behalf of the OCD, I wish to thank you and your staff for your cooperation during this discharge permit review.

Sincerely,

land. Chines

Carl J. Chavez Environmental Engineer

CJC/cje

xc: OCD District II Office, Artesia

NOTICE OF PUBLICATION

STATE OF NEW MEXICO ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT OIL CONSERVATION DIVISION

Notice is hereby given that pursuant to Water Quality Control Commission Regulations (20.6.2.3106 NMAC) the following discharge permit application(s) has been submitted to the Director of the New Mexico Oil Conservation Division (OCD), 1220 S. Saint Francis Drive, Santa Fe, New Mexico 87505, Telephone (505) 476-3440:

(GW-028) Navajo Refining Company - Artesia Refinery, Darrell Moore, Environmental Manager for Water and Waste, 501 E. Main, Artesia, New Mexico 88210, has submitted a renewal application for the Artesia Refinery located in SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico (northeast of the intersection of Highway 285 and Highway 82), in Artesia, New Mexico. The refinery refines up to 100,000 barrels per day of crude oil and discharges up to 14,000 bbl/day of treated wastewater to three permitted Underground Injection Control (UIC) Class I (non-hazardous) Injection Wells and/or to the publicly owned treatment works (POTW) for disposal, treatment, and/or beneficial reuse. A maximum sanitary waste water volume rate of 50 bbl/day is routed to the Artcsia waste water treatment plant (WWTP) and about 26 barrels per day of total sanitary effluent is discharged into various NMED permitted Class V septic systems throughout the facility. There is currently ground water and vadose zone contamination present with abatement and monitoring in progress. Consequently, there is an ongoing discharge occurring to ground water from vadose zone contamination at the facility. All wastes generated will be temporarily stored in tanks or containers and shipped off site for disposal or recycling at an OCD permitted and/or approved facility. Ground water most likely to be affected by a spill, leak or aecidental discharge is at a depth of approximately 25 feet below the ground surface with a total dissolved solids concentration of approximately 1,700 mg/L. The discharge permit specifies that Navajo Refining Company will remediate contaminated ground at the site to meet the standards specified in the Water Quality Control Commission regulations (20.6.2.3103 NMAC)

OCD has determined that the applications listed above are administratively complete and has prepared draft permits. OCD will accept comments and statements of interest regarding this application and will create a facility-specific mailing list for persons who wish to receive future notices. Persons interested in obtaining further information, submitting comments or requesting to be on a facility-specific mailing list for future notices may contact the Environmental Bureau Chief of the Oil Conservation Division at the address given above. The administrative completeness determination and draft permit may be viewed at the above address between 8:00 a.m. and 4:00 p.m., Monday through Friday, or may also be viewed at the OCD web site http://www.emnrd.state.nm.us/ocd/. Persons interested in obtaining a copy of the application and draft permit may contact OCD at the address given above. Prior to ruling on any proposed discharge permit or major modification, the Director shall allow a period of at least thirty (30) days after the date of publication of this notice, during which interested persons may submit comments or request that OCD hold a public hearing. Requests for a public hearing shall set forth the reasons why a hearing should be held. A hearing will be held if the Director determines that there is significant public interest.

If no public hearing is held, the Director will approve or disapprove the proposed permit based on information available, including all comments received. If a public hearing is held, the director will approve or disapprove the proposed permit based on information in the permit application and information submitted at the hearing.

Para obtener más información sobre esta solicitud en español, sirvase comunicarse por favor: New Mexico

Energy, Minerals and Natural Resources Department (Depto. Del Energia, Minerals y Recursos Naturales de Nuevo México), Oil Conservation Division (Depto. Conservacio'n Del Petróleo), 1220 South St. Francis Drive, Santa Fe, New México (Contacto: Dorothy Phillips, 505-476-3461).

GIVEN under the Seal of New Mexico Oil Conservation Commission at Santa Fe, New Mexico, on this 14th day of September 2011.

STATE OF NEW MEXICO OIL CONSERVATION DIVISION

SEAL

Jami Bailey, Director

Chavez, Carl J, EMNRD

From:Chavez, Carl J, EMNRDSent:Tuesday, August 02, 2011 10:30 AMTo:'Moore, Darrell'Cc:VonGonten, Glenn, EMNRD; Dade, Randy, EMNRD; Gonzales, Elidio L, EMNRDSubject:Navajo Refining Company Artesia (GW-028) and Lovington (GW-014) Refineries "Filing
Fees" \$100/Ea. Refinery Received

Darrell:

The Oil Conservation Division is in receipt of the filing fees for the above subject refineries and discharge permit renewal applications.

Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: Carl J. Chavez@state.nm.us Website: <u>http://www.emnrd.state.nm.us/ocd/index.htm</u> "Why not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward with the Rest of the Nation?" To see how, go to "Pollution Prevention & Waste Minimization" at: http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental)



REFINING COMPANY, LLC

MECEIVED OCD

FAX (575) 746-5283 DIV. ORDERS (575) 746-5481 TRUCKING (575) 746-5458 PERSONNEL

201 JUL 509 EAST: MANN STREET • P. O. BOX 159 ARTESIA, NEW MEXICO 88211-0159 TELEPHONE (575) 748-3311 FAX (575) 746-5419 ACCOUNTING (575) 746-5451 ENV/PURCH/MKTG (575) 746-5421 ENGINEERING

July 27, 2011

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505

RE: APPLICATION FEES FOR DISCHARGE PLANS GW-014 AND GW-028 ARTESIA AND LOVINGTON FACILITIES

Dear Carl,

Enclosed, please find two checks for \$100 each to pay for the application fees for Discharge Plan GW-014 for our Lovington facility and GW-028 for our Artesia facility. If you have any questions, please call me at 575-748-3311.

Sincerely, NAVAJO REFINING COMPANY, LLC

Darrell Moore Environmental Manager for Water and Waste

Encl:

1, at 1331

An Independent Refinery Serving . . . NEW MEXICO • ARIZONA • WEST TEXAS • NORTHERN MEXICO

Chavez, Carl J, EMNRD

From: Sent: To: Cc: Subject: Attachments: Moore, Darrell [Darrell.Moore@hollycorp.com] Tuesday, June 28, 2011 3:54 PM Chavez, Carl J, EMNRD Lackey, Johnny Discharge Permit Renewals Renewals.pdf

Carl

Attached, please find the renewal applications for our two facilities. After talking with you this morning, Im not sure if these are required given the new directives from OCD, but it doesn't hurt to cover our bases. I will send the Questionnaires for both facilities before the July 15, 2011 deadline. Thanks for clearing some things up for me this morning.

Darrell Moore

Environmental Manager for Water and Waste Navajo Refining Company, LLC Phone Number 575-746-5281 Cell Number 575-703-5058 Fax Number 575-746-5451

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1.	Туре:	RefineryDis	charge Plan GW-02			
2.	Operator:	Navajo Refining C	ompany, LLC	•		~ `.* * * *
	Address:	501 E Main Artes	ia NM 88210	ı		-
	Contact Person:	Darrell Moore		Phon	e:575-748-33	. 1
3.	Location:	/4	/4 Section	. Towns	hipI	Range
4.	FOR ITEMS	Submit large s ELOW SEE DISCHAR elephone number and ad	cale topographic m GE PLAN GW-028	ap showing ex.	act location.	·
5.	Attach the descrip	i lion of the facility with a	diagram indicating	location of fei	nces, pits, dikes and	tanks on the facility.
[:] 6.	Attach a description	n of all materials stored	or used at the facili	ty.	-	
7.	Attach a description must be included.	n of present sources of e	ffluent and waste s	olids. Average	quality and daily v	olume of waste water
8.	Attach a description	n of current liquid and s	olid waste collectio	n/treatment/dis	posal procedures.	
, 9.	Attach a description	n of proposed modificat	ions to existing coll	ection/treatme	nt/disposal systems.	·
10	Attach a routine i	ispection and maintenan	ce plan to ensure pe	ermit complian	ce.	
11.	Attach a continge	ncy plan for reporting an	d clean-up of spills	or releases.	ı	
12. Attach geological/hydrological information for the facility. Depth to and quality of ground water must be included.						
13.	Attach a facility c rules, regulations	losure plan, and other in and/or orders.	formation as is nece	essary to demo	nstrate compliance	with any other OCD
	14. CERTIFICATIO	NI hereby certify that the and belief.	e information subn	nitted with this	application is true a	and correct to the
1	Name:Darrell	Moore	•	Title:	Env. Mgr for Water	and Waste
S	Signature:	awell Moore		Date:	_6/28/11	
i	E-mail Address:	darrell.moore@hollyco	p.com			, - ,
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From:	Chavez, Carl J, EMNRD
Sent:	Friday, February 25, 2011 3:06 PM
To:	'Moore, Darrell'
Cc:	Lackey, Johnny; Siwek, Janusz; Vasquez, Clemente; Sanchez, George; VonGonten, Glenn, EMNRD; Monzeglio, Hope, NMENV; Powell, Richard, NMENV
Subject:	Navajo Refining Company Artesia Refinery (GW-028) "Minor Modification" to Section 13(A) Hydrotest Requirements for New Waste Water Effluent Line to UIC Class I (NH) Disposal Wells WDWs 1, 2 & 3

Darrell, et al.:

The OCD hereby **temporarily approves** the "sectional hydro test" method proposed by the Navajo Refining Company (NRC) below for "good cause" with the following conditions:

- 1) The new line shall be inspected daily for leakage after construction (flow start date when waste water effluent is flowing to the disposal wells) until a successful hydro test is achieved;
- 2) The hydro test must be performed within 3 months of completion of the new line and the flow start date; and
- 3) The operator must accept the "Minor Modification" conditions to the discharge permit outlined below.

The OCD hereby issues the "**Minor Modification**" pertaining to Section 13(A) (see Section provided below) of the current OCD Discharge Permit based on the acceptance of the above listed conditions by the NRC.

OCD Existing Permit Conditions:

13. Underground Process/Wastewater Lines:

A. The owner/operator shall provide a comprehensive spreadsheet/table listing of all underground process/wastewater pipelines within 3 months of permit issuance to establish the basis for compliance with this provision. The owner/ operator shall perform mechanical integrity testing (MIT) at least once every five (5) years and/or complete a minimum of 20% per year of the underground process/wastewater pipeline MITs before the expiration date of the permit to demonstrate the mechanical integrity of all underground process/wastewater pipelines, except lines containing fresh water or fluids that are gases at atmospheric temperature and pressure. Pressure rated pipe shall be tested by pressuring up to one and one-half times the normal operating pressure, if possible, or for atmospheric drain systems, to 3 pounds per square inch greater than normal operating pressure, and pressure held for a minimum of 30 minutes with no more than a 1% loss/gain in pressure. The owner/ operator may use other methods for testing if approved by the OCD. The OCD shall be notified at least 72 hours prior to all testing.

OCD New "Minor Modification" Conditions to Section 13(A):

Pressure rated pipe shall be tested by pressuring up to one and one-half times the normal operating pressure, if possible, or for atmospheric drain systems, to 3 pounds per square inch greater than normal operating pressure, and pressure held for a minimum of 30 minutes with no more than a 1% loss/gain in pressure. The exception is the "Waste Water Fiberglass Effluent Pipeline" to the UIC Class I (NH) Disposal Wells "WDWs 1, 2 & 3" that require testing on an annual basis and shall be tested by pressuring up to not less than 1200 psig nor greater than 1400 psig with pressure held for a minimum of 30 minutes with no more than 1% loss/gain in pressure. The owner/ operator may use other methods for testing if approved by the OCD. The OCD shall be notified at least 72 hours prior to all testing.

Please confirm that NRC accepts the terms and conditions stated above. Please contact me if you have questions. Thank you.

Please be advised that OCD approval of this plan does not relieve Navajo Refining Company of responsibility should their operations fail to adequately investigate and remediate contamination that pose a threat to ground water, surface water, human health or the environment. In addition, NMOCD approval does not relieve Navajo Refining Company of responsibility for compliance with any other federal, state, or local laws and/or regulations.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: CarlJ.Chavez@state.nm.us Website: <u>http://www.emnrd.state.nm.us/ocd/index.htm</u> "Why not Prevent Pollution; Minimize Waste; Reduce the Cost of Operations; & Move Forward with the Rest of the Nation?" To see how, go to "Pollution Prevention & Waste Minimization" at: <u>http://www.emnrd.state.nm.us/ocd/environmental.htm#environmental</u>)

From: Moore, Darrell [mailto:Darrell.Moore@hollycorp.com]
Sent: Friday, February 25, 2011 12:50 PM
To: Chavez, Carl J, EMNRD
Cc: Lackey, Johnny; Siwek, Janusz; Vasquez, Clemente; Sanchez, George
Subject: Hydrotest on new Effluent Line

Carl

As you know, Navajo is installing a new effluent pipeline to our injection wells. This new pipeline is made of fiberglas and has different specifications than our steel pipeline that is currently in service. As the line is being constructed, it is being hydrotested to 1600 psi in sections. This is done so in case there is a problem, that leak can be repaired right then.

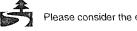
As you are aware, Navajo is having some major issues with waste water right now. The sooner we can get this new line into service, the sooner we can alleviate some of those issues. With that in mind, is it possible to use these "sectional" hydrotests in lieu of the full hydrotest once the line is finished? This would save Navajo some time in getting the line operational. As an alternative, if that option is not acceptable, would OCD be open to postponing the full hydrotest for say 3 months. That would give Navajo some time to work off our excess wastewater before we shut the line down for the full hydrotest.

Along the same lines, the current permit says that we will test the line to 1 ½ times operating pressure. The operating pressure of the system will be approximately 1300 lbs +/-. The new fiberglas line is only guaranteed to 1630 psi. It is "rated" quite a bit higher than that, but the manufacturer's guarantee is only to 1630. Obviously, 1630 psi would not cover the 1 ½ times operating pressure that our permit currently requires. To maintain our warranty on the line, Navajo is requesting that the hydrotest pressure on the line be limited to 1630 psi.

Darrell Moore Environmental Manager for Water and Waste Navajo Refining Company, LLC Phone Number 575-746-5281 Cell Number 575-703-5058 Fax Number 575-746-5451

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Chavez, Carl J, EMNRD

From:	Chavez, Carl J, EMNRD
Sent:	Thursday, October 07, 2010 1:23 PM
To:	'Lackey, Johnny'
Cc:	Monzeglio, Hope, NMENV; Dade, Randy, EMNRD; VonGonten, Glenn, EMNRD
Subject:	Navajo Refining Company- Artesia Refinery (GW-028) "Minor Modification" to Discharge Permit Notification

Mr. Lackey:

The Oil Conservation Division (OCD) after conferring with Navajo Refining Company (NRC) at our meeting in Santa Fe on October 6, 2010, and in conformance with § 20.6.2.4000, et <u>seq</u>. NMAC (Prevention and Abatement of Water Pollution) and/or more specifically, § 20.6.2.4111 NMAC (Abatement Plan Modification), the OCD is hereby issuing a "Minor Modification" (modification) to the discharge permit.

The OCD has determined that a modification to your discharge permit is hereby effective and will address any future environmental monitoring associated with your facility. Environmental monitoring is hereby replaced and will be referenced in any future discharge permits for the facility under the title of "Facility-Wide Ground Water Monitoring Plan" (FWGWMP). The FWGWMP is jointly administered by the NMED- HWB and EMNRD- OCD.

There is no fee for this modification and it will be filed with the existing discharge permit at OCD Online (see GW-018) under "Permits, Renewals & Mods" thumbnail.

Please contact me if you have questions. Thank you.

Disclaimer: Please be advised that this e-mail message does not relieve NRC of responsibility should its operations pose a threat to ground water, surface water, human health or the environment. In addition, NRC is not relieved of responsibility for compliance with any other federal, state, or local laws and/or regulations.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3490 Fax: (505) 476-3462 E-mail: <u>CarlJ.Chavez@state.nm.us</u> Website: <u>http://www.emnrd.state.nm.us/ocd/</u>index.htm (Pollution Prevention Guidance is under "Publications")

CC: OCD Online GW-028 File: "Permits, Renewals & Mods"

RARCADIS	ECEIVED	ARCADIS 1004 North Big Spring Street
Transmittal Letter	2003 AUG 22 PM 2 56	Suite 300 Midland
To:	Copies:	Texas 79701 Tel 432.687.5400 Fax 432.687.5401
Wayne Price	1 de	
From: Sharon Hall	_{Date:} August 20, 2008	
Subject: Navajo Refining Company Public Notice	ARCADIS Project No.: MT001007.0001.00001	
We are sending you: X Attached	r Separate Cover Via the Following Items:	
Shop Drawings Plans Prints Samples X Other: Public Notice with Affidavits	Specifications Copy of Letter	Change Order Reports
Copies Date Drawing No. Rev.	Description	Action*
	Public Notices and Affidavits	
		esubmit Copies eturn Copies
X AS As Requested		eview and Comment
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□ Other: Mailing Method □ U.S. Postal Service 1 st Class □ Courier/Hand I □ Certified/Registered Mail □ United Parcel I □ Other: □ Comments: Wayne, attached is the Navajo Pu	FA For Approval R	☐ FedEx 2-Day Delivery ☐ FedEx Economy nt you copies of the

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Affidavit of Publication

STATE OF NEW MEXI	со			
County of Eddy:				
Gary D. Scott			being duly	
sworn,says: That he is	the	Publisher	of The	
Artesia Daily Press, a d	aily newsp	aper of gene	ral	
circulation, published in	I English at	Artesia, said	d county	
and county and state, a	ind that the	here to attac	ched	
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Artesia Daily Press,a d	Artesia Daily Press,a daily newspaper duly qualified			
for that purpose within	the meanir	ng of Chapter	r 167 of	
the 1937 Session Laws of the state of New Mexico for				
1 Consecutiv week/days on the same				
day as follows:				
First Publication	Augu	st 3	2008	
Second Publication				
Fourth Publication	\square	/		
Fifth Publication	XA	stt		
Subscribed and sworn to before me this				
13th Day	August		200	
Kimpalis	A.C	mbs		
Notary Public, Eddy County, New Mexico				

My Commission expires UTU (1)

2008

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Copy of Publication:

NOTICE OF PUBLICATION

1. A. P. S. S. STATE OF NEW MEXICO Section + Section METENERGY; MINERALS AND NATURAL RESOURCES DEPARTMENT **OIL CONSERVATION DIVISION**

Notice is hereby given that pursuant to New Mexico Water Quality Control Commission Regulations (20.6.2.3106 NMAC), the following discharge permit application(s) has been sub mitted to the Director of the New Mexico Oil Conservation Division ("NMOCD"), 1220 S. Saint Francis Drive, Santa Fe, New Mexico 87505, Telephone (505), 476-3440;

(GW-028) ⁄Navajo Refining Company- Artesia Refinery, Darrell Moore, Environmentál Manager P.O. Box 159, Artesia, New Mexico 88211, has submitted a renewal application for the previ ously approved discharge plan for their Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM Eddy County, just northeast of the intersection of Hwy. 285 and Hwy. 82, in Artesia New Mexico The refinery discharges a total of about 14,000 bbl/day of treated wastewater to any 3 refinery permitted EPA Class I (non-hazardous) Injection Wells and/or POTW for disposal, treatment, and/or reuse. A maximum sanitary waste water volume rate of 50 bbl/day is routed to under ground closed system tanks for pump out and disposal at the WWTP. There are plans within 24 hours of permit issuance to process all sanitary effluent and dispose of it down any of the 3 EPA Class I Injection Wells owned by the refinery. Approximately 7,000 bbl/day of Reverse Osmosis (RO) treated waste water is used for nearby irrigation. All other wastes generated will be tem porarily stored in tanks or containers and shipped off site for disposal or recycling at an OCD approved facility. Groundwater most likely to be affected by a spill, leak or accidental discharge is at a depth of approximately 10 feet below the ground surface, with a total dissolved solids con centration of approximately 2500 mg/L. The discharge plan addresses how oilfield refined prod ucts and wastes will be properly handled, stored, and disposed of, including how spills, leaks, and other accidental discharges to the surface will be managed in order to protect fresh water.

The NMOCD has determined that the applications listed above are administratively complete and has prepared draft permits. The NMOCD will accept comments and statements of interest regarding this application and will create a facility-specific mailing list for persons who wish to receive future notices. Persons interested in obtaining further information, submitting comments or requesting to be on a facility-specific mailing list for future notices may contact the Environmental Bureau Chief of the Oil Conservation Division at the address given above. The administrative completeness determination and draft permit may be viewed at the above address between 8:00 a.m. and 4:00 p.m., Monday through Friday, or may also be viewed at the NMOCD web site http://www.emnrd.state.nm.us/ocd/. Persons interested in obtaining a copy of the application and draft permit may contact the NMOCD at the address given above. Prior to ruling on any proposed discharge permit or major modification, the Director shall allow a period of at least thirty (30) days after the date of publication of this notice, during which interested per sons may submit comments or request that NMOCD hold a public hearing. Requests for a public hearing shall set forth the reasons why a hearing should be held. A hearing will be held if the Director determines that there is significant public interest.

If no public hearing is held, the Director will approve or disapprove the proposed permit based on information available, including all comments received. If a public hearing is held, the direc tor will approve or disapprove the proposed permit based on information in the permit application and information submitted at the hearing.

Para obtener más información sobre esta solicitud en espan?ol, sirvase comunicarse por favor New Mexico Energy, Minerals and Natural Resources Department (Depto. Del Energia, Minerals y Recursos Naturales de Nuevo México), Oil Conservation Division (Depto. Conservacio'n Del Petróleo), 1220 South St. Francis Drive, Santa Fe, New México (Contacto: Dorothy Phillips, 505-476-3461)

GIVEN under the Seal of New Mexico Oil Conservation Commission at Santa Fe, New Mexico, on this 3rd day of July 2008.

> STATE OF NEW MEXICO **OIL CONSERVATION DIVISION**

SEAL Mark Fesmire, Director

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Affidavit of Publication

STATE OF NEW MEXICO			
County of Eddy:			
Gary D. Scott		being duly	
sworn,says: That he is the	Publisher	of The	
Artesia Daily Press, a daily newsp	aper of gene	ral	
circulation, published in English at	: Artesia, saic	county	
and county and state, and that the	here to attac	ched	
Notice of Publi	cation		
was published in a regular and en	tire issue of t	he said	
Artesia Daily Press,a daily newspaper duly qualified			
for that purpose within the meaning of Chapter 167 of			
the 1937 Session Laws of the state of New Mexico for			
1 Consecutiv week/day	s on the sam	е	
day as follows:			
First Publication Augus	st 3	2008	
Second Publication			
Third Publication	/		
Fourth Publication	$\frac{1}{2}$		
Fifth Publication	Act	H	
Subscribed and sworn to before n	ne this	L	
13th Day August		2008	
Kimberly A. Co.	mbs	4	
	ounty, New M		
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My Commission expires

Copy of Publication:

ANUNCIO DE PUBLICACIÓN

ESTADO DE NUEVO MEXICO Departamento de Energía, Minerales y Recursos Naturales División de Conservación de Petróleo

Aviso dado que en virtud de Reglamentos de la Comisión de Control de Calidad del Agua de Nuevo Mexico (20.6.2.3106 NMAC), la siguiente solicitud de permiso de descarga (s) se ha presentado al Director de la División de Conservación de Petróleo de Nuevo Mexico ("NMOCD" por sus siglas en inglés), 1220 S. Saint Francis Drive, Santa Fe, Nuevo Mexico 87505, Teléfong (505) 476-3440:

(GW-028) Navajo Refining Company-Refinería Artesia, ⁄Darrell Moore, Gerente de Medio Ambiente, Apartado 159, Artesia. Nuevo Mexico 88211, ha presentado una solicitud de renovación para su plan de descarga aprobado con anterioridad para su refinería Artesia ubicada en la SE / 4 de la sección 1, E / 2 de la sección 8, W / 2 de la sección 9, N / 2 de la sección 12, el Municipio 17 Sur, Rango 26 Oriente, NMPM, Eddy County, justo al noreste de la intersección de la carretera. 285 y Hwy. 82, en Artesia New Mexico. La refinería descarga un total de alrededor de 14000 bbl / día de aguas residuales tratadas para cualquiera de 3 refinerías permiso Clase EPA (no peligrosos) pozos de inyección y / o POTW para su eliminación, tratamiento y / o reutilización. Un máximo de aguas residuales sanitarias de volumen de 50 bbl / día se dirige a sistema cerrado para la bomba de tanques y disposición a Planta de Tratamiento de Aguas Usadas. Está previsto dentro de un plazo de 24 horas el permiso de emisión para procesar todos los efluentes sanitarios y disponer de él bajo cualquiera de los 3 Clase I EPA pozos de inyección propiedad de la refinería. Aproximadamente 7,000 bbl / día de Osmosis Inversa (OI) de aguas residuales tratadas se utiliza para riego cerca. Todos los demás residuos generados se almacenan temporalmente en tanques o contenedores y enviadas fuera del sitio para dis posición o reciclaje en una instalación aprobada como OCD. La mayoría de las aguas subter ráñeas que puedan verse afectadas por un derrame, fuga o descarga accidental se encuentra en una profundidad de aproximadamente 10 pies por debajo de la superficie del suelo, con un total de concentración de sólidos disueltos de aproximadamente 2,500 mg / L. El plan de descraga que aborda la forma en que productos refinados en campos petroleros y desechos serán debidamente manipulados, almacenados, y eliminados, incluvendo cómo los derrames filtraciones, y otras descargas accidentales a la superficie será gestionada con el fin de proteger el agua fresco.

El NMOCD (por sus siglas en ingles) ha determinado que las aplicaciones enumeradas anteriormente son administrativamente completas y ha preparado un borrador de permisos. E NMOCD aceptará comentarios y declaraciones de interés respecto a esta solicitud y va a creation un listado de correo de instalación específica para las personas que deseen recibir futuras noti ficaciones. Las personas interesadas en obtener más información, enviar comentarios o solici tar estar en este listado de correo de instalación específica para futuras notificaciones puede ponerse en contacto con el Jefe de la Oficina Ambiental de la División de Conservación de Petróleo en la dirección que figura más arriba. La determinación administrative de integridad y el borrador de permiso puede consultarse en la dirección antes mencionada entre las 8:00 am / 4:00 pm, de lunes a viernes, o también pueden ser vistos en la NMOCD sitio en web http://www.emnrd.state.nm.us/ocd/. Las personas interesadas en obtener una copia de la solicitud y el borrador de permiso podrán ponerse en contacto con el NMOCD en la dirección que figura más arriba. Antes de pronunciarse sobre la aprobación de cualquier permiso de descarga propuesto y borrador de descarga o modificación importante, el Director deberá contemplar un período de por lo menos treinta (30) días después de la fecha de publicación del presente anuncio, durante el cual las personas interesadas podrán presentar observaciones o pedir que NMOCD celebre una audiencia pública. En las solicitudes de audiencia pública se expondrán las razones por las que una audiencia se celebre. Una audiencia se llevará a cabo si el Director determina que existe un importante interés público.

Si no se celebró audiencia pública, el Director aprobará o rechazará el propuesto permiso con base en la información disponible, incluyendo todos los comentarios recibidos. Si una audien cia pública se celebró, el director aprobará o rechazará el propuesto permiso basado en la información en la solicitud de permiso y la información presentada en la audiencia.

Para obtener más información sobre esta Solicitud en español, sirvase comunicarse por favor Departamento de Energía, Minerales y Recursos Naturales de Nuevo Mexico (Depto. de Energia, Minerales y Recursos Naturales de Nuevo México), División de Conservación de Petróleo (Depto. Conservación del Petróleo), 1220 South, St. Francis Drive, Santa Fe, Nuevo México (Contacto: Dorothy Phillips, 505-476-3461)

Dado Bajo el Sello de la Comisión de Conservación de Petróleo en Nuevo Mexico en Santa Fe Nuevo Mexico, en este 3er día de julio de 2008.

> EL ESTADO DE NUEVO MEXICO División de Conservación de Petróleo

SELLO Mark Fesmire, Director



REFINING COMPANY, LLC

FedEx Overnight Delivery

FAX (575) 746-5283 DIV. ORDERS (575) 746-5481 TRUCKING (575) 746-5458 PERSONNEL

501 EAST MAIN STREET • P. O. BOX 159 ARTESIA, NEW MEXICO 88211-0159 TELEPHONE (575) 748-3311 FAX (575) 746-5419 ACCOUNTING (575) 746-5451 ENV/PURCH/MKTG (575) 746-5421 ENGINEERING

October 15, 2008

Wayne Price Environmental Bureau Chief Oil Conservation Division 1220 South St. Francis Drive Santa Fe, NM 87505

Re: Navajo Refining Company, L.L.C., Artesia, NM Discharge Permit (GW-028)

Dear Mr. Price:

Enclosed pursuant to your August 20, 2008 letter to Darrell Moore is the signed copy of the abovereferenced discharge permit for Navajo Refining Company, LLC Artesia Refinery. ("Navajo")

The Permit Fee in the amount of \$8,400.00 was submitted directly to the Water Quality Management Fund from Navajo's corporate office in Dallas.

Please contact me at 575-746-5490 if you have any questions.

Sincerely, Johnny Lacke

Environmental Manager

Cc (w/enclosure): Electronic cc (w/o enclosure): Environmental Files: JER DGM REF.ART.07-4.A.02 (Artesia Discharge Permit)

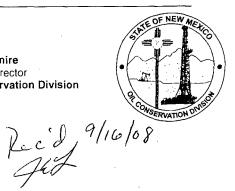
An Independent Refinery Serving . . . NEW MEXICO • ARIZONA • WEST TEXAS • NORTHERN MEXICO RECEIVED

nergy, Minerals and Natural Resources Department New M exico

Bill Richardson Governor

Joanna Prukop **Cabinet Secretary** Reese Fullerton Deputy Cabinet Secretary

Mark Fesmire **Division Director Oil Conservation Division**



August 20, 2008

Mr. Darrell Moore Environmental Manager for Water & Waste Navajo Refining Company- Artesia Refinery PO Box 159 Artesia, New Mexico 88211-0159

RE: **DISCHARGE PERMIT (GW-028)** NAVAJO REFINING COMPANY- ARTESIA REFINERY

Dear Mr. Moore:

Pursuant to Water Quality Control Commission (WQCC) Regulations (20.6.2.3000 - 20.6.2.3114 NMAC), the Oil Conservation Division (OCD) hereby approves the discharge permit for the Navajo Refining Company- Artesia Refinery (GW-028) SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico, under the conditions specified in the enclosed Attachment To The Discharge Permit. Enclosed are two copies of the conditions of approval. Please sign and return one copy to the New Mexico Oil Conservation Division (OCD) Santa Fe Office within 30 days of receipt of this letter including permit fees.

Please be advised that approval of this permit does not relieve the owner/operator of responsibility if operations result in pollution of surface water, ground water or the environment. Nor does approval of the permit relieve the owner/operator of its responsibility to comply with any other applicable governmental authority's rules and regulations.

If you have any questions, please contact Mr. Carl Chavez of my staff at (505-476-3491) or Email: carli.chavez@state.nm.us. On behalf of the staff of the OCD, I wish to thank you and your staff for your cooperation during this discharge permit review.

Sincerely, Wayne Price

Environmental Bureau Chief

LWP/cc Attachments-2 xc: OCD District Office

> Oil Conservation Division * 1220 South St. Francis Drive * Santa Fe, New Mexico 87505 * Phone: (505) 476-3440 * Fax (505) 476-3462* http://www.emnrd.state.nm.us

ATTACHMENT TO THE DISCHARGE PERMIT NAVAJO REFINING COMPANY- ARTESIA REFINERY (GW-028) DISCHARGE PERMIT APPROVAL CONDITIONS

5,

August 20, 2008

Please remit a check for \$8,400.00 made payable to the Water Quality Management Fund:

Water Quality Management Fund C/o: Oil Conservation Division 1220 S. Saint Francis Drive Santa Fe, New Mexico 87505

1. Payment of Discharge Plan Fees: All discharge permits are subject to WQCC Regulations. Every billable facility that submits a discharge permit application will be assessed a filing fee of \$100.00, plus a renewal flat fee (*see* WQCC Regulation 20.6.2.3114 NMAC). The Oil Conservation Division ("OCD") has received the required \$100.00 filing fee. However, the owner/operator still owes the required \$8,400.00 renewal permit fee for a refinery.

2. Permit Expiration and Renewal and Penalties: Pursuant to WQCC Regulations (20.6.2.3109.H.4 NMAC), this permit is valid for a period of five years. The permit will expire on October 21, 2011 and an application for renewal should be submitted no later than 120 days before that expiration date. Pursuant to WQCC Regulation 20.6.2.3106.F NMAC, if a discharger submits a discharge permit renewal application at least 120 days before the discharge permit expires and is in compliance with the approved permit, then the existing discharge permit will not expire until the application for renewal has been approved or disapproved. *Expired permits are a violation of the Water Quality Act {Chapter 74, Article 6, NMSA1978} and civil penalties may be assessed accordingly.*

3. Permit Terms and Conditions: Pursuant to WQCC Regulation 20.6.2.3104 NMAC, when a permit has been issued, the owner/operator must ensure that all discharges shall be consistent with the terms and conditions of the permit. In addition, all facilities shall abide by the applicable rules and regulations administered by the OCD pursuant to the Oil and Gas Act, Sections 70-2-1 through 70-2-38 NMSA 1978.

4. Owner/Operator Commitments: The owner/operator shall abide by all commitments submitted in its June 27, 2006, discharge plan renewal application with \$100 Filing Fee, including attachments and subsequent amendments and these conditions for approval. Permit applications that reference previously approved plans on

file with the division shall be incorporated in this permit and the owner/operator shall abide by all previous commitments of such plans and these conditions for approval.

5. Modifications: WQCC Regulation 20.6.2.3107.C, and 20.6.2.3109 NMAC addresses possible future modifications of a permit. The owner/operator (discharger) shall notify the OCD of any facility expansion, production increases or process modification that would result in any significant modification in the discharge of water contaminants. The Division Director may require a permit modification if any water quality standard specified at 20.6.2.3103 NMAC is being or will be exceeded, or if a toxic pollutant as defined in WQCC Regulation 20.6.2.7 NMAC is present in ground water at any place of withdrawal for present or reasonably foreseeable future use, or that the Water Quality Standards for Interstate and Intrastate streams as specified in 20.6.4 NMAC are being or may be violated in surface water in New Mexico.

6. Waste Disposal and Storage: The owner/operator shall dispose of all oil field exempt and non-exempt non-hazardous wastes at an OCD-approved facility. RCRA non-hazardous, non-exempt oil field wastes regulated by the OCD may be disposed of at an OCD-approved facility upon proper waste determination pursuant to 40 CFR Part 261. Any waste stream that is not listed in the discharge permit application (See Attachment 2) must be approved by the OCD on a case-by-case basis. Only oil field RCRA- exempt and non-exempt non-hazardous wastes may be disposed of by injection in a Class I Well. Only oil field RCRA-exempt wastes may be disposed of by injection in a Class II Well.

A. OCD Rule 712 Waste: Pursuant to OCD Rule 712 (19.15.9.712 NMAC) disposal of certain non-domestic waste without notification to the OCD is allowed at NMED permitted solid waste facilities if the waste stream has been identified in the discharge permit and existing process knowledge of the waste stream does not change (See Attachment 2).

B. Waste Storage: The owner/operator shall store all waste in an impermeable bermed area, except waste generated during emergency response operations for up to 72 hours. All waste storage areas shall be identified in the discharge permit application. Any waste storage area not identified in the permit shall be approved on a case-by-case basis only. The owner/operator shall not store oil field waste on-site for more than 180 days unless approved by the OCD.

7. Drum Storage: The owner/operator must store all drums, including empty drums, containing materials other than fresh water on an impermeable pad with curbing. An exception may be allowed where empty containers are triple-rinsed prior to storage and demarcated to indicate rinsing was performed. However, approval shall require submittal of a site diagram(s) displaying the empty container triple-rinse location(s) throughout the refinery with schematics or flow diagrams with explanation of the rinse process, effluent discharge location(s), treatment, storage or disposal of any waste, and equipment within 3 months of permit issuance. Drums stored outside of impermeable pads or curbing

without a triple rinse designation shall be a violation of this provision. The owner/operator must store empty drums (non-rinsed) on their sides with the bungs in place and lined up on a horizontal plane. The owner/operator must store chemicals in other containers, such as tote tanks, sacks, or buckets on an impermeable pad with curbing. All storage areas shall be designed and constructed to allow for the separation of incompatible chemicals.

8. **Process, Maintenance and Yard Areas:** The owner/operator shall either pave and curb or have some type of spill collection device incorporated into the design at all process, maintenance, and yard areas which show evidence that water contaminants from releases, leaks and spills have reached the ground surface.

9. Above Ground Tanks: The owner/operator shall ensure that all above ground tanks have impermeable secondary containment (e.g., liners and berms) with leak detection systems. The owner/operator shall retrofit all existing tanks before discharge permit renewal or within a proposed schedule approved by the OCD within 3 months of permit issuance. Tanks containing asphalt/pitch are exempt from the liner and leak detection requirement, but shall comply with the berm provision prescribed below (1+1/3 volume). Tanks that contain good quality fresh water or fluids that are gases at atmospheric temperature and pressure are exempt from this condition.

All new and existing above ground tanks containing chemicals must be placed or retrofitted over an impermeable pad (40-mil LLDPE reinforced liner with leak detection system) or liner system within a bermed secondary containment area approved by the OCD. The bermed areas shall be constructed to contain a volume of at least one and one-third (1+1/3) greater than the total volume of the largest tank and/or all interconnected tanks within a bermed containment area. Alternative secondary containment designs must be approved by the OCD.

The owner/operator shall submit a spreadsheet or table identifying all tanks with a work schedule to address this provision (Tank ID #, type of tank, new/used, volume, chemical stored, tank age, last Integrity test date, planned retrofit date and/or construction date, etc.) to the OCD for approval. The owner operator shall prioritize existing tanks for retrofit based on the toxicity and solubility (contaminant transport potential) of chemicals (BTEX, JP4, etc.) and site-specific threats to public health, safety, fresh water, and the environment. A work schedule with a phased approach extending beyond the standard 5-Year permit period may be approved by the OCD if the table is submitted within 3 months of permit issuance. The table(s) shall be considered approved if the OCD does not respond within 30 days of receipt of the table and work schedule.

10. Labeling: The owner/operator shall clearly label all tanks, drums, and containers to identify their contents and other emergency notification information. The owner/operator may use a tank code numbering system, which is incorporated into their emergency response plans. Per Section 7 above, all triple-rinsed drums stored outside of impermeable pad areas shall be demarcated to indicate they have been cleaned.

11. Below-Grade Tanks/Sumps and Pits/Ponds.

A. All below-grade tanks and sumps must be approved by the OCD prior to installation and must incorporate secondary containment with leak detection into the design. The owner/operator shall retrofit all existing systems without secondary containment and leak detection before discharge permit renewal or within a spreadsheet or table with a schedule submitted and approved by the OCD within 3 months of permit issuance. A list of all below-grade tanks and sumps with schedule for retrofit completion shall be included in the submittal. The table(s) shall be considered approved if the OCD does not respond within 30 days of receipt of the table and work schedule. Systems that have secondary containment with leak detection shall have a monthly inspection of the leak detection system to determine if the primary containment is leaking. Small sumps or depressions in secondary containment systems used to facilitate fluid removal are exempt from these requirements if fluids are removed within 72 hours.

Β. All pits and ponds, including modifications and retrofits, shall be designed by a certified registered professional engineer and approved by the OCD prior to installation. In general, all pits or ponds shall have approved hydrologic and geologic reports, location, foundation, 40-mil LLDPE liners or other liner approved by the OCD with dual thermal seam, and secondary containment with leak detection (with the exception of storm water retention or detention ponds that must meet the liner requirement only), monitoring and closure plans. Secondary containment at asphalt/pitch tanks shall also be exempt from the liner provision, but must meet the secondary containment requirement of 1 + 1/3 volume of the largest tank or interconnected tanks within a bermed containment area. All pits or ponds shall be designed, constructed and operated so as to contain liquids and solids in a manner that will protect fresh water, public health, safety and the environment for the foreseeable future. The owner/operator shall retrofit all existing systems without secondary containment and leak detection before discharge permit renewal or within a schedule submitted and approved within 3 months of permit issuance. A spreadsheet or table of all pits and ponds with schedule for completion shall be included in the submittal and OCD shall approve or deny the submittal within 30 days of receipt. The table(s) and work schedule(s) shall be considered approved if the OCD does not respond within 30 days of receipt.

C. The owner/operator shall ensure that all exposed pits, including lined pits and open top tanks (8 feet in diameter or larger) shall be fenced, screened, netted, or otherwise rendered non-hazardous to wildlife, including migratory birds. Where netting is not feasible, routine witnessing and/or discovery of dead wildlife and migratory birds shall be reported to the appropriate wildlife agency with notification to the OCD in order to assess and enact measures to prevent the above from reoccurring.

D. The owner/operator shall maintain the results of all tests and inspections at the facility covered by this discharge permit and made available for OCD inspection upon

request. The owner/operator shall report the discovery of any system which is found to be leaking or has lost integrity to the OCD within 15 days of discovery. The owner/ operator may propose various methods for testing such as pressure testing to 3 pounds per square inch greater than normal operating pressure and/or visual inspection of cleaned tanks and/or sumps, or other OCD-approved methods. The owner/operator shall notify the OCD at least 72 hours prior to all testing.

12. Evaporation Ponds: All wastewater discharged to the ponds shall be demonstrated that it meets the definition of EPA RCRA Non-hazardous pursuant to 40 CFR 260-261. A minimum freeboard of two feet shall be maintained in the ponds so that no over topping of wastewater occurs. Any major repairs or modifications to the ponds or leak detection systems must receive prior OCD approval. Any exceedance of the freeboard, rapid loss of head or any leaks or releases shall be reported pursuant to Section 16 (Spill Reporting) above of these conditions.

A. Inspections: Evaporation ponds shall be inspected a minimum of three times per week and after any major storm event. Weekly records shall be maintained for all flow rates from all flow meters, fluid levels, freeboard, seepage, flow channels, pipes, valves, liner and dike integrity.

B. Water Quality and Quantity Monitoring: All operational ponds shall be inspected, sampled and analyzed as proposed in the discharge plan renewal application Section 9.5 dated 04/27/04.

C. Temporary storage ponds: Any existing temporary ponds shall be identified and the owner/operator shall submit either a closure plan for OCD approval by September 01, 2009 or install liners, etc. as required under Section 11B by March 31, 2010.

13. Underground Process/Wastewater Lines:

A. The owner/operator shall provide a comprehensive spreadsheet/table listing of all underground process/wastewater pipelines within 3 months of permit issuance to establish the basis for compliance with this provision. The owner/ operator shall perform mechanical integrity testing (MIT) at least once every five (5) years and/or complete a minimum of 20% per year of the underground process/wastewater pipeline MITs before the expiration date of the permit to demonstrate the mechanical integrity of all underground process/wastewater pipelines, except lines containing fresh water or fluids that are gases at atmospheric temperature and pressure. Pressure rated pipe shall be tested by pressuring up to one and one-half times the normal operating pressure, if possible, or for atmospheric drain systems, to 3 pounds per square inch greater than normal operating pressure, and pressure held for a minimum of 30 minutes with no more than a 1% loss/gain in pressure. The owner/ operator may use other methods for testing if approved by the OCD. The OCD shall be notified at least 72 hours prior to all testing.

B. The owner/operator shall maintain underground process and wastewater pipeline schematic diagrams or plans showing all drains, vents, risers, valves, underground piping, pipe type, rating, size, and approximate location. All new underground piping (i.e., sanitary effluent lines, triple-rinse flow lines, etc.) must be approved by the OCD prior to installation. The owner/operator shall report any leaks or loss of integrity to the OCD within 15 days of discovery. The owner/operator shall maintain the results of all tests at the facility covered by this discharge permit and records shall be made available to OCD inspectors upon request. The owner/operator shall notify the OCD at least 72 hours prior to all testing.

14. Class V Wells: The owner/operator shall close all Class V wells (e.g., septic systems, underground sanitary discharge closed system tanks, leach fields, dry wells, etc.) that inject non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes unless it can be demonstrated that ground water will not be impacted in the reasonably foreseeable future. Leach fields and other wastewater disposal systems at OCD-regulated facilities that inject non-hazardous fluid into or above an underground source of drinking water are considered Class V injection wells under the EPA UIC program. Class V wells must be permitted by the New Mexico Environment Department (NMED) if sanitary waste water is injected into a leach field without processing, treatment or disposal within an OCD treatment system at the facility. Sanitary waste water effluent that is untreated and disposed at an OCD facility will require a permit from the NMED.

15. Housekeeping: The owner/operator shall inspect all systems designed for spill collection/prevention and leak detection at least monthly to ensure proper operation and to prevent over topping or system failure. All spill collection and/or secondary containment devices shall be emptied of fluids within 72 hours of discovery. The owner/operator shall maintain all discharge permit related records at the facility and make them available to OCD inspectors upon request (See Section 21C below).

16. Spill Reporting: The owner/operator shall report all unauthorized discharges, spills, leaks and releases and conduct corrective action pursuant to WQCC Regulation 20.5.12.1203 NMAC and OCD Rule 116 (19.15.3.116 NMAC). The owner/operator shall notify both the OCD District Office and the Santa Fe Office within 24 hours and file a written report within 15 days. Note that the owner/operator may have Federal reporting obligation(s) to the National Response Center when releases to the environment exceed the 40 CFR 302.4 (Designation of Hazardous Substances).

17. OCD Inspections: The OCD may place additional requirements on the facility and modify the permit conditions based on OCD inspections. Subsequent to the OCD's February 19-21, 2007 inspection; February 27, 2008 meeting in Santa Fe, and March 13, 2008 inspection of the facility, the following requirements apply:

i All unlined storm water retention/detention ponds or storm water basins shall be lined (40-mil LLDPE or other liner approved by the OCD) with dual thermal seams by October 21, 2011.

ii The owner/operator shall submit updated site maps by February 28, 2009, showing the current status of all recovery wells, monitor wells, domestic, and irrigation wells and pertinent features (i.e., new refinery units, new MWs, remediation systems, effluent pipeline(s) to Class I waste water disposal wells, oil and gas transmission lines within and proximal to the property, and ground water contamination, etc. including the storm water basins (detention ponds).

iii All explosions, fires, etc., regardless of magnitude, duration, etc., shall be considered "Major Releases" under OCD Rule 116 and shall be reported to the OCD accordingly. The owner/operator shall cooperate with the OCD to ensure that all explosions/fires are tracked or recorded and corrective action(s) is considered and taken to eliminate the reoccurrence and to protect human health, safety and the environment. The OCD shall assist by following up with the owner/operator to ensure that the refinery is working to address and find solutions to these type of occurrences as the situation warrants.

iv The owner/operator shall submit a sanitary waste water proposal to close all existing below ground sanitary effluent tanks; treat and/or dispose of all sanitary waste water effluent through the refinery process area(s) and refinery permitted UIC Class I Injection Wells east of the refinery within 3 months of permit issuance to the OCD. The owner/operator shall follow NMED guidelines for removal or in place decommissioning of all below ground sanitary waste water closed tank systems. The owner/operator shall stop discharging sanitary effluent waste water into the below ground closed tank systems within 24 months of completion of the City of Artesia's sewer upgrade project. Since the proposal will involve treatment and disposal via oil and gas operations at the facility, the owner/operator shall deal directly with OCD on the treatment and disposal of sanitary effluent at the refinery with a courtesy copy of the proposal sent to the NMED-Pollution Prevention Office. Currently, the refinery discharges a maximum of 50 bbl/day of sanitary effluent into underground tanks (closed tank systems) that are pumped out and disposed at the local WWTP as needed.

v All spills or releases of chemicals regardless of "Minor vs. Major Releases" under OCD Rule 116 and Section 16 herein shall be cleaned up. Contaminated soils/sediments shall be physically removed or excavated from the ground to eliminate point source contamination to surface and/or ground water throughout the refinery. The only exception would be Section 8 (Process, Maintenance and Yard Areas) above where the owner/operator shall either pave and curb or have some type of spill collection device incorporated into the design at all process, maintenance, and yard areas which show evidence that water contaminants from releases, leaks and spills have reached the ground surface.

vi The owner/operator shall store and manage records associated with the discharge permit on the premises and made available to an OCD Representative upon request (See Section 21C below).

18. Storm Water: The owner/operator shall implement and maintain run-on and runoff plans and controls. The owner/operator shall separate or isolate contact from non-contact areas at the plant. The owner/operator shall not discharge any water contaminant that exceeds the WQCC standards specified in 20.6.2.3101 NMAC or 20.6.4 NMAC (Water Quality Standards for Interstate and Intrastate Streams) including any oil sheen in any storm water run-off. The owner/operator shall notify the OCD within 24 hours of discovery of any releases and shall take immediate corrective action(s) to mitigate and remediate the discharge.

19. Unauthorized Discharges: The owner/operator shall not allow or cause water pollution, discharge or release of any water contaminant that exceeds the WQCC standards listed in 20.6.2.3101 NMAC or 20.6.4 NMAC (Water Quality Standards for Interstate and Intrastate Streams) unless specifically listed in the permit application and approved herein. <u>An unauthorized discharge is a violation of this permit.</u>

20. Surface Water / Ground Water / Vadose Zone Monitoring/ Remediation/ Abatement:

The owner/operator shall address any contamination through the discharge permit process or pursuant to WQCC 20.6.2.4000 - 4116 NMAC (Prevention and Abatement of Water Pollution). The OCD may require the owner/operator to modify its permit for investigation, remediation, abatement, and monitoring requirements for any vadose zone or water pollution. Failure to perform any required investigation, remediation, abatement and submit subsequent reports shall be a violation of the permit.

The owner/operator shall sample, analyze and report ground water contamination to the NMED and OCD in accordance with state and federal laws. All environmental analytical sampling and testing shall comply with Environmental Protection Agency Standards and Methods. Permanent and/or temporary monitoring and remediation changes must be approved in writing by the OCD.

A. Ground Water and Treatment System Monitoring: Ground water monitoring locations, sampling frequency, and laboratory analytical methods are specified in Attachment 1, "Navajo Refinery Company Groundwater Monitoring Schedule. All permanent changes to the ground water monitor plan must be approved in a "Minor Modification" in writing by the OCD in consultation with the NMED.

B. Ground Water and Treatment System Annual Monitoring Report: An annual report shall be submitted to the OCD and NMED by February 28th of each year. The annual report shall contain:

i A description of the monitoring and remediation activities, which occurred during the year including conclusions and recommendations.

ii Summary tables listing laboratory analytic results, of all water quality sampling for each monitoring point and plots of concentration vs. time for contaminants of concern from each monitoring point. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report. Copies of the most recent year's laboratory analytical data sheets will also be submitted.

iii Plots of semi-annual static water table elevation vs. time for each ground water monitoring point to assess water table fluctuations and potential for smear zones to develop in areas where PSHs are present.

iv Ground water table (piezometric) surface elevation map(s) using the static water level elevation data of the ground water in all refinery monitor wells in advance of sampling shall be included in the annual report. A corrected water table elevation shall be determined for all wells containing PSHs. This map shall show well locations, pertinent site features (i.e., pipelines, effluent lines to Class I wells, etc.), and the direction and magnitude of the hydraulic gradient.

v PSH thickness isocon maps of free phase product on ground water at monitoring locations.

vi Chemicals of concern (COC) at levels of concern isocon maps from monitoring data. These maps shall include isopleths or iso-concentration lines for products and COC.

vii The monthly and cumulative volumes of PSHs recovered from recovery wells or trenches during each quarter and the total recovered to date. Flow rates of all recovery or purge wells.

viii Electronic filing: File this report in an acceptable electronic format along with hard copies to the NMED and OCD.

C. Additional Requirements: The following are additional requirements of the permit:

i. The owner/operator shall notify the OCD Santa Fe and local district office at least 2 weeks in advance of all scheduled activities such that the OCD has the opportunity to witness the events and split samples. For large facilities, i.e., refineries, an annual notification will suffice.

ii. The owner/operator shall notify the OCD within 15 days of the discovery of PSHs or the exceedance of WQCC standards in any monitor well where PSHs were not present or where contaminant concentrations did not exceed WQCC standards during the preceding monitoring event.

iii. The owner/operator shall install secondary containment at the former waste water API by the expiration date of this permit.

21. Additional Site Specific Conditions:

- A. API Separators: The owner/operator shall notify the OCD of any inactive separators that are placed back into service. A RCRA decommissioning request from NMED or OCD for investigation and/or remediation purposes where an API Separator prohibits remediation may require the owner/operator to decommission an inactive API Separator Unit.
- Β. New Full-Time Automated Free-Product Recovery System(s): A fulltime automated Phase Separated Hydrocarbon (PSH) product recovery system shall be operational in KWB-8 by August 31, 2008. Full-time automated PSH dedicated recovery systems shall be installed and operational in wells MW-48, MW-64, MW-65, KWB-2R, KWB-4, KWB-5, and KWB-6 by December 31, 2009. All recovery trenches and all wells with PSHs must be checked at a minimum of once per month and recorded on a spreadsheet or table. The data must be presented in table form listing all of the recovery wells, date inspected, product thickness measured to 0.01 of a foot, and amount of product/water recovered. If PSH thickness is observed in a monitoring well, recovery well or trench at 0.5 ft or less, a passive or active recovery system must be installed. If PSH thickness is 0.5 ft or greater, a full-time automated free-product recovery system must be installed to recover the PSHs using the best available technology and must be approved by NMED and OCD. This information must be provided in the annual groundwater report. All recovered PSHs shall be routed to the refinery treatment system for processing.

C. Records: Navajo shall develop and submit spreadsheets or tables with records that contains all underground tanks/sumps/pits (group by category, i.e, underground tank, sumps, and pits) within 3 months of permit issuance. Each category shall have an identification, drawing reference, date installed, test date, test method, pass/fail/repair information with signature, and investigation results if applicable. Navajo shall test at a minimum 20% of the total below grade devices each year or at least once before the expiration of the permit. The tables shall be included in the annual report.

22. Annual Report: On an annual basis due by February 28th. of each year, Navajo shall submit a formal report to the OCD on the past year's activities. The report will include the following at a minimum:

A. A summary of all major refinery activities or events.

B. Results of all sampling and monitoring events.

C. Summary of the sump and underground wastewater lines tested.

E. Summary of all leaks, spills and releases and corrective actions taken.

F. Summary of discovery of new groundwater contamination. This should include recommendations for investigation and remediation.

G. Summary and copies of all EPA/NMED RCRA activity.

H. Summary of any other discharge permit item specified to be included in the annual report herein.

23. Transfer of Discharge Permit (WQCC 20.6.2.3111): Prior to any transfer of ownership, control, or possession (whether by lease, conveyance or otherwise) of a facility with a discharge permit, the transfer or shall notify the transferee in writing of the existence of the discharge permit, and shall deliver or send by certified mail to the department a copy of such written notification, together with a certification or other proof that such notification has in fact been received by the transferee. Upon receipt of such notification, the transferee shall have the duty to inquire into all of the provisions and requirements contained in such discharge permit, and the transferee shall be charged with notice of all such provisions and requirements as they appear of record in the department's file or files concerning such discharge permit. The transferee (new owner/operator) shall sign and return an original copy of these permit conditions and provide a written commitment to comply with the terms and conditions of the previously approved discharge permit.

24. Closure and Financial Assurance (20.6.2.3107A (11) NMAC): Pursuant to 20.6.2.3107 NMAC, an owner/operator shall notify the OCD when any operations of the facility are to be discontinued for a period in excess of six months. Prior to closure, or as a condition of this permit, or request from the OCD, the operator shall submit an approved closure plan, or modify an existing plan, and/or provide adequate financial assurance in the form of an OCD Letter of Credit.

The owner/operator shall submit a closure plan and financial assurance cost estimate for post-closure monitoring by December 31, 2008. The plan shall address how any remaining water contaminants will be monitored and/or abated to ensure the protection of public health, safety, and fresh water for a period of at least 30 years after facility closure.

25. Certification: Navajo Refining Company- Artesia Refinery, by the officer, whose signature appears below, accepts this permit and agrees to comply with all submitted commitments, including these terms and conditions contained herein. Navajo Refining Company- Artesia Refinery, further acknowledges that the OCD may, for good cause shown, as necessary to protect fresh water, public health, safety, and the environment, change the conditions and requirements of this permit administratively.

<u>Conditions accepted by</u>: "I certify under penalty of law that I have personally examined and am familiar with the information submitted in this document and all attachments and that, based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information including the possibility of fine and imprisonment."

NAVAJO REFINING CO. LLC

Company Name-print name above

JANES RESINGER Company Representative- print name

Company Representative- Signature

Title: VILE PRESIDENT Date:_____0 / 15 / 08

ATTACHMENT 1

Navajo Refining Company Table 1, July 2008 Page 1 of 16

Monitoring	Sampling	Water Quality	Analytical	Approximate Well
经销售资源 计通信算机 计算法 计算法	응답한 문 위에 다시면 가지 구가 나라지 않는 것 같아요. 하	1. 当时有关和考虑的1000 法投资 计算法分析器 [location
MW-1R	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	W. of the EPs
MW-2A ¹	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	W. of the EPs
MW-3 ¹	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	S. of EP 1 & 2
MW-4A ¹	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	S. of EP 1 & 2
MW-5A ¹	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	S. of EP 2
MW-6A ¹	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	S. of EP 1
MW-7A ¹	Semi - annual ³	1	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	S. of EP 3 Replacement of MW- 7
MW-8	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	TMD, S. of E. draw btw B and H Rd

 Table 1

 Navajo Refining Company Groundwater Monitoring Schedule

The Analyte list for EPA Method 8260 must include MTBE

 1 = Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

 3 = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of each year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

⁴ = Annual groundwater monitoring event must be conducted in the spring.

 5 = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

Navajo Refining Company Table 1, July 2008 Page 2 of 16

Monitoring Well ID	Little and the second s			Approximate Well location
MW-10 ¹		• • • •	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	S. of EPs
MW-11A ¹	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	N. of U.S. Hwy 82 btw B & H Rd
MW-15 ¹		1* · · · ·	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	W. of EP 1
MW-16	Semi - annual ³			E. of H Rd and S. of E draw
MW-18 ⁻¹	Semi - annual ³	ORP, DO	DRO), RCRA metals, major cations & anions,	N. Portion of Refinery E. of the NCL
MW-18A ¹	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of EPs
MW-20	Semi - annual ³			E. of B. Rd, S. of E. draw
MW-21	Semi - annual ³³			S. of E. draw, btw B & H Rd.
MW-22A ¹	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	S. of EPs

The Analyte list for EPA Method 8260 must include MTBE

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⁴ = Annual groundwater monitoring event must be conducted in the spring.

⁵ = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

Navajo Refining Company Table 1, July 2008 Page 3 of 16

		And the second sec	Analytical Suite	Approximate Well
MW-23	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	W of TEL
MW-25	Semi - annual ³	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of EP, W. of Pecos River, E. of H Rd.
MW-26	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of EP, W. of Pecos River, E. of H Rd
MW-27	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	E. of H Rd and S. of E. draw
MW-28	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	E. of the SE. Tank Farm Area
MW-29	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	In refinery N. of TEL
MW-39	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	N. of the TEL
MW-41	Semi - annual ³	JA 7 7 7 4 7	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	N. of the TEL
MW-42	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	N. of the TEL
MW-43	Semi - annual ³	- · · ·	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	NW. of the TEL

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 3 = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of each year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

⁴ = Annual groundwater monitoring event must be conducted in the spring.

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Navajo Refining Company Table 1, July 2008 Page 4 of 16

Monitoring Well ID	bin eintererten aufern on bint erien shipt - ret tillet.	Water Quality Parameters	Analytical Suite	Approximate Well location
		- · · ·	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	E. of Refinery, S. of E draw
MW-46	Semi - annual ³	A	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	E. of Refinery, S. of E draw
MW-48			EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of SE Tank farm Area
MW-49 ¹	Semi - annual ³	ORP, DO	EPA Method 8260 (VOCs), EPA Method 8015B (GRO, DRO), RCRA metals, major cations & anions, nitrates/nitrites	E. of Refinery, midpoint btw E. draw and U.S. Hwy 82
MW-50	Semi - annual ³	- · · ·	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	W. of Refinery, E. of U.S. Hwy 285 and N. of U.S. Hwy 82
1	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of the Refinery, S. of U.S Hwy 82
MW-53 ¹ .	Semi - annual ³	- · · ·	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	W. of Refinery btw U.S. Hwy 285 and RR tracks
MW-54A ¹	Semi - annual ³	· · · ·	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	NW. of NCL

The Analyte list for EPA Method 8260 must include MTBE

¹= Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

 3 = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of each year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

⁴ = Annual groundwater monitoring event must be conducted in the spring.

⁵ = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

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Monitoring Well ID	the solution be a second to and but solves the second second second	Water Quality Parameters	Analytical Suite	Approximate Well location
MW-55 ¹			EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	E. of NCL
MW-56 ¹			EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	NE of the Refinery
MW-58	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of U.S. Hwy 82 and W. of B Rd
MW-61 ⁵	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (GRO, DRO), RCRA metals, major cations & anions, nitrates/nitrites	SW of TEL
MW-62 ⁵	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (GRO, DRO), RCRA metals, major cations & anions, nitrates/nitrites	SW of TEL
MW-63 ⁵	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (GRO, DRO), RCRA metals, major cations & anions, nitrates/nitrites	SW of TEL
MW-64 ⁵	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (GRO, DRO), RCRA metals, major cations & anions, nitrates/nitrites	In Refinery area, N. of U.S. HWY 82

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The Analyte list for EPA Method 8260 must include MTBE

¹= Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

³ = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of each year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

 4 = Annual groundwater monitoring event must be conducted in the spring.

⁵ = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

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Monitoring Well ID	ter er efter frei ber er e	Water Quality Parameters		Approximate Well location
MW-65 ⁵	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (GRO,	S. of the SE Tank Farm Area
MW-66 ⁵	Semi - annual ³	pH, Cond, Temp, ORP, DO		E. of the SE Tank Farm Area
MW-67 ⁵	Semi - annual ³			E. of the Diesel Tank Farm Area
MW-68	Semi - annual ³	-		S. of E draw, btw D and H Rd.
MW-70 ¹	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	S. of Eps; Renamed from MW-19
MW-72	Semi - annual ³	pH, Cond, Temp,		In EP 6
MW-73	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 3
MW-74	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 2

The Analyte list for EPA Method 8260 must include MTBE

¹= Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

 3 = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of cach year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

¹ = Annual groundwater monitoring event must be conducted in the spring.

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Navajo Refining Company Table 1, July 2008 Page 7 of 16

Monitoring Well ID	- Cheverit briff 1	Renterer bette e efferter terrenteter		Approximate Well location
MW-75			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 2
MW-76			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 2
MW-77			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 2
MW-78			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 2
MW-79			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 5
MW-80			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 5
MW-81	Semi - annual ³	1 / / 1/	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 5
MW-82	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 1
MW-83	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 1
MW-84	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 1

The Analyte list for EPA Method 8260 must include MTBE

¹= Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

 3 = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of each year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

 4 = Annual groundwater monitoring event must be conducted in the spring.

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Navajo Refining Company Table 1, July 2008 Page 8 of 16

Monitoring Well ID	the frontering to be and the second sec	and the state of the second state of a second state of the second state of the	Analytical Suite	Approximate Well
MW-85	Semi - annual ³	- · · · ·	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 1
MW-86	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 1
MW-87		• • • • • •	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	Btw MW-7B and MW-18A,S of EP 3
MW-88			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	Btw MW-4A and MW-10 below EP 1
MW-89			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	East of H Rd, S. of E Richey Ave.
MW-90		- · · · ·	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	NW of North API Separator
MW-91	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	N of North API Separator
MW-92	Semi - annual ³	-	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	S of North API Separator
MW-93	1	n	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	E of North API Separator
MW-94	Semi - annual	- · · · ·	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	E of the Diesel Tank Farm

The Analyte list for EPA Method 8260 must include MTBE

¹= Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

 3 = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of each year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

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Navajo Refining Company Table 1, July 2008 Page 9 of 16

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MW-95		1 ' I ' I '	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	N of the North API Separator
MW-96			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	S of Diesel Tank Farm
MW-97			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	SE corner of the North API Separator
MW-98	Semi - annual	1 7 7 17	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	E of the Alky Unit
MW-99	Semi - annual		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	North of the Southeast Tank Farm
MW-100	Semi - annual		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	SE corner of the Southeast Tank Farm
MW-101	Semi - annual	pH, Cond, Temp, ORP, DO	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	North of the Southeast Tank Farm
MW-102	Semi - annual	pH, Cond, Temp, ORP, DO	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	West of the Southeast Tank Farm
KWB-1A	Semi - annual ³	(* · · · · · · · · · · · · · · · · · · ·	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of E draw, W. of B Rd.
KWB-1C	Semi - annual ³	.	EPA Method 8260 (VOCs), RCRA metals, major cations & anions, nitrates/nitrites	S. of E draw, W. of B Rd.

The Analyte list for EPA Method 8260 must include MTBE

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Navajo Refining Company Table 1, July 2008 Page 10 of 16

Monitoring Well ID		Water Quality Parameters	Analytical Suite	Approximate Well
KWB-P2	Semi - annual ³	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	E. of D Rd, N. of U.E. Hwy 82
KWB-2R	Semi - annual ³	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of U.S. Hwy 82 on G.G. Armstrong & Son
KWB-3R	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	Replacement well for KWB-3A. S. of U.S. Hwy 82 btw B & D Rd.
KWB-4	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	N. of U.S. Hwy 82, W. of B Rd.
KWB-5	Semi - annual ³	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	N. of U.S. Hwy 82, W. of B Rd.
KWB-6	Semi - annual ³	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	N. of U.S. Hwy 82, W. of B Rd.
KWB-7	Semi - annual ³	pH, Cond, Temp,		N. of U.S. Hwy 82 btw B & D Rd
KWB-8	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	N. of U.S. Hwy 82 btw B & D Rd.

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Navajo Refining Company Table 1, July 2008 Page 11 of 16

Monitoring Well ID	and the second duraged and the second s	No. 49 10 10 10 10 10 10 10 10 10 10 10 10 10	Analytical Suite	Approximate Well location
KWB-9	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of U.S. Hwy 82, E. of B Rd.
KWB-10	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	E. of Refinery, S. of E. draw, N. of U.S. Hwy 82
KWB-11A	Semi - annual ³	1	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	N. of U.S. Hwy 82 btw B & D Rd
KWB-12A	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of U.S. Hwy 82, E. of B Rd.
KWB-13	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of U.S. Hwy 82, W. of B Rd
NP-1	Semi - annual ³	pH, Cond, Temp, ORP, DO	EPA Method 8260 (VOCs)	S. of E. draw, W. of B Rd.
NP-2	Semi - annual ³	pH, Cond, Temp, ORP, DO	EPA Method 8260 (VOCs)	Directly E. of B Rd., S. of E draw
NP-3	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	Directly N. of E. draw, NE. of B Rd.
NP-5	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of Richey Rd, N. of E. Draw, W. of B Rd.

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Navajo Refining Company Table 1, July 2008 Page 12 of 16

Monitoring	the stand of the second of the		Analytical	Approximate Well
Well ID-	 The state of the second state of the state 	and the ball of the product of the data of the product of the prod	Suite	location
NP-6	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	S. of E. draw, W. of
	annual 3	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	B Rd
NP-7	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	S. of E draw, btw D
Well location	annual ³			& H Rd
unknown				
NP-9	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	S. of Richey Rd, N.
	annual ³		RCRA metals, major cations & anions, nitrates/nitrites	of E. Draw, W. of B
		· ·		Rd.
OCD-1 ¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	NW of EP 6
	annual ³		8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
OCD-2A ¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	N. of EP 6
	annual ³		8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
OCD-3 ¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	NE. of EP 6
	annual ³		8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
OCD-4 ¹	Semi -			NE. of EP 6
	annual ³		8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
OCD-5 ¹	Semi -			NE of EP-6
			8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
OCD-6 ¹	Semi -			E. of EP-6
			8015B (GRO, DRO), major cations & anions, nitrates/nitrites	

The Analyte list for EPA Method 8260 must include MTBE

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 $\frac{1}{2}$ = Annual groundwater monitoring event must be conducted in the spring.

 5 = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

Navajo Refining Company Table 1, July 2008 Page 13 of 16

Monitoring Well ID	to de la selecterita presentatione en entremente			Approximate Well location
OCD-7A ¹			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	SE. of EP-6
OCD-8A ¹			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	SE. of EP 3
NCL-32 ¹				NW. Portion of the Refinery
				NW Portion of the Refinery
				NW. Portion of the Refinery
				NW. Portion of the Refinery
				NW. Portion of the Refinery.
			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	NE Portion of the Refinery
		-	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	NE. Portion of the Refinery

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Navajo Refining Company Table 1, July 2008 Page 14 of 16

In-ten bille feinelgfe talte fert bille seinte dente dinte teller it anne fitt	a unter fill mar bille unter ift meretite gelet thinget anne unter eine beine	Water Quality Parameters		Approximate Well location
	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	NE. Portion of the Refinery
TEL-4 ¹	Semi - annual ³			NE. Portion of the Refinery
RW-1 ²	Annual ⁴ (Spring of each year)	I · · · · · · ·	EPA Method 8260 (VOCs), RCRA metals, major cations & anions, nitrates/nitrites	³ North Portion of the Refinery
RW-18 ²	Annual ⁴ (Spring of each year	- · · · ·	EPA Method 8260 (VOCs), RCRA metals, major cations & anions, nitrates/nitrites	³ S. of E draw & W. of B Rd.
RA 313	Semi - annual ³	- · · · · ·		N. of U.S. Hwy 82, W. of B Rd.
RA 314	Semi - annual ³			N. of U.S. Hwy 82, W. of B Rd.
RA 3723	Semi - annual ³			N. of U.S. Hwy 82, W. of B Rd.
RA 3156	Semi - annual ³	pa		S. of U.S. Hwy 82 and E. of B Rd.

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Navajo Refining Company Table 1, July 2008 Page 15 of 16

		Water Quality Parameters		Approximate Well location
RA 3353			EPA Method 8260 (VOCs), major cations & anions,	S. of U.S. Hwy 82 and E. of B Rd
RA 4196				N. of U.S. Hwy 82 and E. of B Rd
				E. of B Rd, N. of U. S. Hwy 82
Larue well	1 .	• · · · • ·	EPA Method 8260 (VOCs), major cations & anions, nitrates/nitrites	

Table date: May, 2006; Revision 1.

Acronym List

N = North, S = South, E = East, W = West, NE = Northeast, NW = Northwest, SW = Southwest, SE = Southeast, Btw = between

B Rd = Bolton Road; H Rd = Haldeman Road; D Rd = Dirt Road; Hwy = highway;

EP = Evaporation Ponds; TMD = Three Mile Ditch; E. draw = Eagle Draw;

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Navajo Refining Company Table 1, July 2008 Page 16 of 16

NCL = North Colony Landfarm; TEL = Tetra Ethyl Lead Impoundment

DO = dissolved oxygen; ORP = oxygen reduction potential; temp = temperature; Cond = specific conductivity

VOCs - volatile organic compounds; SVOCs - semi volatile organic compounds; DRO - diesel-range organics,

BTEX - benzene, toluene, ethylbenzene, xylene; MTBE - Methyl Tertiary-Butyl Ether; GRO - gasoline-range organics

OCD - Oil Conservation Division

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⁵ = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

. . .

ATTACHMENT 2

ARTESIA PIPELINE FILTERS CHLORIDE GUARD SULFUR GUARD D-350 CATALYST ISOM CARBON PALL RINGS OFFICE TRASH STEEL DRUMS TANK SEALS SANITARY SEWER PROCESS WASTE WATER ACTIVATED ALUMINA ASPHALT CANS SLURRY CONTAMINATED SOIL CARBON BLACK CONTAMINATED ASPHALT CONTAMINATED SOIL GAS OIL CONTAMINATED SOIL NAPHTHA CONTAMINATED SOIL KEROSENE CONTAMINATED SOIL GASOLINE CONTAMINATED SOIL DIESEL CONTAMINATED SOIL SPENT CAUSTIC COOLING TOWER SLUDGE BLAST SAND REFRACTORY BRICK CRUDE CONTAMINATED SOIL SALT FILTER TRASH AND DEBRIS FCC CAT FINES DISSOLVED AIR FLOAT (DAF) FLUORIDE PRECIPITATOR SOLIDS (CAF) DERAMIC RINGS)-342 CATYLYST)-370/371 CATALYS 0 REJECT WASTE SOIL MERICHEM DISPOSAL FACILITY INJECTION WELLS INJECTION WELLS NAVAJO FARMS APPROVED OCD CITY POTW CITY POTW, FACILITY HOUSTON, X

ACKNOWLEDGEMENT OF RECEIPT OF CHECK/CASH

I hereby acknowledge receipt of check No.	dated 10/9/08
or cash received on in the amo	ount of \$_8400 20
from KANAJO REFINING	<u>(o.</u>
for <u>Gw) - 28</u>	
Submitted by: LAwrenge Re	Mero Date: 10/16/08
Submitted to ASD by:	Four 20 Date: 10/16/08
Received in ASD by:	Date:
Filing Fee New Facility	Renewal
Modification Other	
Organization Code <u>521.07</u>	Applicable FY <u>2004</u>
To be deposited in the Water Quality Manag	gement Fund.
Full Payment or Annual Inc.	rement

NAVAJO REFINING COMPANY LLC 100 CRESCENT COURT, SUITE 1600 DALLAS, TX 75201-6927 US

RECEIVED 2008 OCT 15 PM 3 33

WATER QUALITY MANAGEMENT FUND OIL CONSERVATION DIVISION 1220 S SAINT FRANCIS DR SANTA FE, NM 87505-4000

1000040226
10/09/2008
\$8,400.00
5111809

Invoice Date	Invoice Number	Description	Invoice Amount	Discount Amount	Net Amount
10/07/2008	100708	100708 Artesia discharge permit fee	\$8,400.00		\$8,400.00
ľ					
				Total	\$8,400.00

 $\downarrow\,$ PLEASE FOLD ON PERFORATION AND DETACH HERE $\downarrow\,$

Chavez, Carl J, EMNRD

From:	Chavez, Carl J, EMNRD
Sent:	Wednesday, October 15, 2008 3:47 PM
To:	Chavez, Carl J, EMNRD; 'Moore, Darrell'
Cc:	Romero, Lawrence S., EMNRD

Subject: RE: Discharge Plan Fee (GW-028)

Darrell:

I have received the check from Navajo in the amount of \$8,400. Please submit the signed version of your permit to me for the administrative record and to update our record for the facility after receipt of the signed discharge permit. Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3491 Fax: (505) 476-3462 E-mail: <u>Carl J. Chavez@state.nm.us</u> Website: <u>http://www.emnrd.state.nm.us/ocd/</u>index.htm (Pollution Prevention Guidance is under "Publications")

From: Chavez, Carl J, EMNRD Sent: Wednesday, October 15, 2008 10:43 AM To: 'Moore, Darrell' Cc: Romero, Lawrence S., EMNRD Subject: FW: Discharge Plan Fee (GW-028)

Darrell:

Do you know when approximately the \$8400 check was sent? If you could give us a period, i.e., September – October 2008, that may work. Thanks.

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From: Romero, Lawrence S., EMNRD Sent: Wednesday, October 15, 2008 10:24 AM To: Chavez, Carl J, EMNRD Subject: RE: Discharge Plan Fee (GW-028)

Carl do you know when they sent the check and if it was a 8400 dollar check I never received

From: Chavez, Carl J, EMNRD

Lawrence:

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From: Moore, Darrell [mailto:Darrell.Moore@hollycorp.com] Sent: Wednesday, October 15, 2008 9:59 AM To: Chavez, Carl J, EMNRD Subject: Discharge Plan Fee

Carl

Our accounting department tells me they sent the \$8400 check straight to the state. I had asked them to send it to me and then I was going to send the check and signed paperwork to you. Could you verify that the state has the check? Once that has been done, Jim Resinger will sign the permit and we will send that to you.

Darrell Moore Environmental Manager for Water and Waste Navajo Refining Company, LLC Phone Number 575-746-5281 Cell Number 575-703-5058 Fax Number 575-746-5451

This inbound email has been scanned by the MessageLabs Email Security System.

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This inbound email has been scanned by the MessageLabs Email Security System.

New Mexico Energy, Minerals and Natural Resources Department

Bill Richardson Governor

Joanna Prukop Cabinet Secretary Reese Fullerton Deputy Cabinet Secretary Mark Fesmire Division Director Oil Conservation Division



August 20, 2008

Mr. Darrell Moore Environmental Manager for Water & Waste Navajo Refining Company- Artesia Refinery PO Box 159 Artesia, New Mexico 88211-0159

RE: DISCHARGE PERMIT (GW-028) NAVAJO REFINING COMPANY- ARTESIA REFINERY

Dear Mr. Moore:

Pursuant to Water Quality Control Commission (WQCC) Regulations (20.6.2.3000 - 20.6.2.3114 NMAC), the Oil Conservation Division (OCD) hereby approves the discharge permit for the **Navajo Refining Company- Artesia Refinery** (GW-028) SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico, under the conditions specified in the enclosed Attachment To The Discharge Permit. Enclosed are two copies of the conditions of approval. Please sign and return one copy to the New Mexico Oil Conservation Division (OCD) Santa Fe Office within 30 days of receipt of this letter including permit fees.

Please be advised that approval of this permit does not relieve the owner/operator of responsibility if operations result in pollution of surface water, ground water or the environment. Nor does approval of the permit relieve the owner/operator of its responsibility to comply with any other applicable governmental authority's rules and regulations.

If you have any questions, please contact Mr. Carl Chavez of my staff at (505-476-3491) or Email: carlj.chavez@state.nm.us. On behalf of the staff of the OCD, I wish to thank you and your staff for your cooperation during this discharge permit review.

Sincerely. Wayne Price

Environmental Bureau Chief

LWP/cc Attachments-2 xc: OCD District Office

> Oil Conservation Division * 1220 South St. Francis Drive * Santa Fe, New Mexico 87505 * Phone: (505) 476-3440 * Fax (505) 476-3462* http://www.emnrd.state.nm.us

ATTACHMENT TO THE DISCHARGE PERMIT NAVAJO REFINING COMPANY- ARTESIA REFINERY (GW-028) DISCHARGE PERMIT APPROVAL CONDITIONS

August 20, 2008

Please remit a check for \$8,400.00 made payable to the Water Quality Management Fund:

Water Quality Management Fund C/o: Oil Conservation Division 1220 S. Saint Francis Drive Santa Fe, New Mexico 87505

1. Payment of Discharge Plan Fees: All discharge permits are subject to WQCC Regulations. Every billable facility that submits a discharge permit application will be assessed a filing fee of \$100.00, plus a renewal flat fee (*see* WQCC Regulation 20.6.2.3114 NMAC). The Oil Conservation Division ("OCD") has received the required \$100.00 filing fee. However, the owner/operator still owes the required \$8,400.00 renewal permit fee for a refinery.

2. Permit Expiration and Renewal and Penalties: Pursuant to WQCC Regulations (20.6.2.3109.H.4 NMAC), this permit is valid for a period of five years. The permit will expire on October 21, 2011 and an application for renewal should be submitted no later than 120 days before that expiration date. Pursuant to WQCC Regulation 20.6.2.3106.F NMAC, if a discharger submits a discharge permit renewal application at least 120 days before the discharge permit expires and is in compliance with the approved permit, then the existing discharge permit will not expire until the application for renewal has been approved or disapproved. *Expired permits are a violation of the Water Quality Act {Chapter 74, Article 6, NMSA1978} and civil penalties may be assessed accordingly.*

3. Permit Terms and Conditions: Pursuant to WQCC Regulation 20.6.2.3104 NMAC, when a permit has been issued, the owner/operator must ensure that all discharges shall be consistent with the terms and conditions of the permit. In addition, all facilities shall abide by the applicable rules and regulations administered by the OCD pursuant to the Oil and Gas Act, Sections 70-2-1 through 70-2-38 NMSA 1978.

4. **Owner/Operator Commitments:** The owner/operator shall abide by all commitments submitted in its June 27, 2006, discharge plan renewal application with \$100 Filing Fee, including attachments and subsequent amendments and these conditions for approval. Permit applications that reference previously approved plans on

file with the division shall be incorporated in this permit and the owner/operator shall abide by all previous commitments of such plans and these conditions for approval.

5. Modifications: WQCC Regulation 20.6.2.3107.C, and 20.6.2.3109 NMAC addresses possible future modifications of a permit. The owner/operator (discharger) shall notify the OCD of any facility expansion, production increases or process modification that would result in any significant modification in the discharge of water contaminants. The Division Director may require a permit modification if any water quality standard specified at 20.6.2.3103 NMAC is being or will be exceeded, or if a toxic pollutant as defined in WQCC Regulation 20.6.2.7 NMAC is present in ground water at any place of withdrawal for present or reasonably foreseeable future use, or that the Water Quality Standards for Interstate and Intrastate streams as specified in 20.6.4 NMAC are being or may be violated in surface water in New Mexico.

6. Waste Disposal and Storage: The owner/operator shall dispose of all oil field exempt and non-exempt non-hazardous wastes at an OCD-approved facility. RCRA nonhazardous, non-exempt oil field wastes regulated by the OCD may be disposed of at an OCD-approved facility upon proper waste determination pursuant to 40 CFR Part 261. Any waste stream that is not listed in the discharge permit application (See Attachment 2) must be approved by the OCD on a case-by-case basis. Only oil field RCRA- exempt and non-exempt non-hazardous wastes may be disposed of by injection in a Class I Well. Only oil field RCRA-exempt wastes may be disposed of by injection in a Class II Well.

A. OCD Rule 712 Waste: Pursuant to OCD Rule 712 (19.15.9.712 NMAC) disposal of certain non-domestic waste without notification to the OCD is allowed at NMED permitted solid waste facilities if the waste stream has been identified in the discharge permit and existing process knowledge of the waste stream does not change (See Attachment 2).

B. Waste Storage: The owner/operator shall store all waste in an impermeable bermed area, except waste generated during emergency response operations for up to 72 hours. All waste storage areas shall be identified in the discharge permit application. Any waste storage area not identified in the permit shall be approved on a case-by-case basis only. The owner/operator shall not store oil field waste on-site for more than 180 days unless approved by the OCD.

7. Drum Storage: The owner/operator must store all drums, including empty drums, containing materials other than fresh water on an impermeable pad with curbing. An exception may be allowed where empty containers are triple-rinsed prior to storage and demarcated to indicate rinsing was performed. However, approval shall require submittal of a site diagram(s) displaying the empty container triple-rinse location(s) throughout the refinery with schematics or flow diagrams with explanation of the rinse process, effluent discharge location(s), treatment, storage or disposal of any waste, and equipment within 3 months of permit issuance. Drums stored outside of impermeable pads or curbing

without a triple rinse designation shall be a violation of this provision. The owner/operator must store empty drums (non-rinsed) on their sides with the bungs in place and lined up on a horizontal plane. The owner/operator must store chemicals in other containers, such as tote tanks, sacks, or buckets on an impermeable pad with curbing. All storage areas shall be designed and constructed to allow for the separation of incompatible chemicals.

8. Process, Maintenance and Yard Areas: The owner/operator shall either pave and curb or have some type of spill collection device incorporated into the design at all process, maintenance, and yard areas which show evidence that water contaminants from releases, leaks and spills have reached the ground surface.

9. Above Ground Tanks: The owner/operator shall ensure that all above ground tanks have impermeable secondary containment (e.g., liners and berms) with leak detection systems. The owner/operator shall retrofit all existing tanks before discharge permit renewal or within a proposed schedule approved by the OCD within 3 months of permit issuance. Tanks containing asphalt/pitch are exempt from the liner and leak detection requirement, but shall comply with the berm provision prescribed below (1+1/3 volume). Tanks that contain good quality fresh water or fluids that are gases at atmospheric temperature and pressure are exempt from this condition.

All new and existing above ground tanks containing chemicals must be placed or retrofitted over an impermeable pad (40-mil LLDPE reinforced liner with leak detection system) or liner system within a bermed secondary containment area approved by the OCD. The bermed areas shall be constructed to contain a volume of at least one and one-third (1+1/3) greater than the total volume of the largest tank and/or all interconnected tanks within a bermed containment area. Alternative secondary containment designs must be approved by the OCD.

The owner/operator shall submit a spreadsheet or table identifying all tanks with a work schedule to address this provision (Tank ID #, type of tank, new/used, volume, chemical stored, tank age, last Integrity test date, planned retrofit date and/or construction date, etc.) to the OCD for approval. The owner operator shall prioritize existing tanks for retrofit based on the toxicity and solubility (contaminant transport potential) of chemicals (BTEX, JP4, etc.) and site-specific threats to public health, safety, fresh water, and the environment. A work schedule with a phased approach extending beyond the standard 5-Year permit period may be approved by the OCD if the table is submitted within 3 months of permit issuance. The table(s) shall be considered approved if the OCD does not respond within 30 days of receipt of the table and work schedule.

10. Labeling: The owner/operator shall clearly label all tanks, drums, and containers to identify their contents and other emergency notification information. The owner/operator may use a tank code numbering system, which is incorporated into their emergency response plans. Per Section 7 above, all triple-rinsed drums stored outside of impermeable pad areas shall be demarcated to indicate they have been cleaned.

11. Below-Grade Tanks/Sumps and Pits/Ponds.

A. All below-grade tanks and sumps must be approved by the OCD prior to installation and must incorporate secondary containment with leak detection into the design. The owner/operator shall retrofit all existing systems without secondary containment and leak detection before discharge permit renewal or within a spreadsheet or table with a schedule submitted and approved by the OCD within 3 months of permit issuance. A list of all below-grade tanks and sumps with schedule for retrofit completion shall be included in the submittal. The table(s) shall be considered approved if the OCD does not respond within 30 days of receipt of the table and work schedule. Systems that have secondary containment with leak detection shall have a monthly inspection of the leak detection system to determine if the primary containment is leaking. Small sumps or depressions in secondary containment systems used to facilitate fluid removal are exempt from these requirements if fluids are removed within 72 hours.

Β. All pits and ponds, including modifications and retrofits, shall be designed by a certified registered professional engineer and approved by the OCD prior to installation. In general, all pits or ponds shall have approved hydrologic and geologic reports, location, foundation, 40-mil LLDPE liners or other liner approved by the OCD with dual thermal seam, and secondary containment with leak detection (with the exception of storm water retention or detention ponds that must meet the liner requirement only), monitoring and closure plans. Secondary containment at asphalt/pitch tanks shall also be exempt from the liner provision, but must meet the secondary containment requirement of 1 + 1/3 volume of the largest tank or interconnected tanks within a bermed containment area. All pits or ponds shall be designed, constructed and operated so as to contain liquids and solids in a manner that will protect fresh water, public health, safety and the environment for the foreseeable future. The owner/operator shall retrofit all existing systems without secondary containment and leak detection before discharge permit renewal or within a schedule submitted and approved within 3 months of permit issuance. A spreadsheet or table of all pits and ponds with schedule for completion shall be included in the submittal and OCD shall approve or deny the submittal within 30 days of receipt. The table(s) and work schedule(s) shall be considered approved if the OCD does not respond within 30 days of receipt.

C. The owner/operator shall ensure that all exposed pits, including lined pits and open top tanks (8 feet in diameter or larger) shall be fenced, screened, netted, or otherwise rendered non-hazardous to wildlife, including migratory birds. Where netting is not feasible, routine witnessing and/or discovery of dead wildlife and migratory birds shall be reported to the appropriate wildlife agency with notification to the OCD in order to assess and enact measures to prevent the above from reoccurring.

D. The owner/operator shall maintain the results of all tests and inspections at the facility covered by this discharge permit and made available for OCD inspection upon

request. The owner/operator shall report the discovery of any system which is found to be leaking or has lost integrity to the OCD within 15 days of discovery. The owner/ operator may propose various methods for testing such as pressure testing to 3 pounds per square inch greater than normal operating pressure and/or visual inspection of cleaned tanks and/or sumps, or other OCD-approved methods. The owner/operator shall notify the OCD at least 72 hours prior to all testing.

12. Evaporation Ponds: All wastewater discharged to the ponds shall be demonstrated that it meets the definition of EPA RCRA Non-hazardous pursuant to 40 CFR 260-261. A minimum freeboard of two feet shall be maintained in the ponds so that no over topping of wastewater occurs. Any major repairs or modifications to the ponds or leak detection systems must receive prior OCD approval. Any exceedance of the freeboard, rapid loss of head or any leaks or releases shall be reported pursuant to Section 16 (Spill Reporting) above of these conditions.

A. Inspections: Evaporation ponds shall be inspected a minimum of three times per week and after any major storm event. Weekly records shall be maintained for all flow rates from all flow meters, fluid levels, freeboard, seepage, flow channels, pipes, valves, liner and dike integrity.

B. Water Quality and Quantity Monitoring: All operational ponds shall be inspected, sampled and analyzed as proposed in the discharge plan renewal application Section 9.5 dated 04/27/04.

C. Temporary storage ponds: Any existing temporary ponds shall be identified and the owner/operator shall submit either a closure plan for OCD approval by September 01, 2009 or install liners, etc. as required under Section 11B by March 31, 2010.

13. Underground Process/Wastewater Lines:

A. The owner/operator shall provide a comprehensive spreadsheet/table listing of all underground process/wastewater pipelines within 3 months of permit issuance to establish the basis for compliance with this provision. The owner/ operator shall perform mechanical integrity testing (MIT) at least once every five (5) years and/or complete a minimum of 20% per year of the underground process/wastewater pipeline MITs before the expiration date of the permit to demonstrate the mechanical integrity of all underground process/wastewater pipelines, except lines containing fresh water or fluids that are gases at atmospheric temperature and pressure. Pressure rated pipe shall be tested by pressuring up to one and one-half times the normal operating pressure, if possible, or for atmospheric drain systems, to 3 pounds per square inch greater than normal operating pressure, and pressure held for a minimum of 30 minutes with no more than a 1% loss/gain in pressure. The owner/ operator may use other methods for testing if approved by the OCD. The OCD shall be notified at least 72 hours prior to all testing.

B. The owner/operator shall maintain underground process and wastewater pipeline schematic diagrams or plans showing all drains, vents, risers, valves, underground piping, pipe type, rating, size, and approximate location. All new underground piping (i.e., sanitary effluent lines, triple-rinse flow lines, etc.) must be approved by the OCD prior to installation. The owner/operator shall report any leaks or loss of integrity to the OCD within 15 days of discovery. The owner/operator shall maintain the results of all tests at the facility covered by this discharge permit and records shall be made available to OCD inspectors upon request. The owner/operator shall notify the OCD at least 72 hours prior to all testing.

14. Class V Wells: The owner/operator shall close all Class V wells (e.g., septic systems, underground sanitary discharge closed system tanks, leach fields, dry wells, etc.) that inject non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes unless it can be demonstrated that ground water will not be impacted in the reasonably foreseeable future. Leach fields and other wastewater disposal systems at OCD-regulated facilities that inject non-hazardous fluid into or above an underground source of drinking water are considered Class V injection wells under the EPA UIC program. Class V wells must be permitted by the New Mexico Environment Department (NMED) if sanitary waste water is injected into a leach field without processing, treatment or disposal within an OCD treatment system at the facility. Sanitary waste water effluent that is untreated and disposed at an OCD facility will require a permit from the NMED.

15. Housekeeping: The owner/operator shall inspect all systems designed for spill collection/prevention and leak detection at least monthly to ensure proper operation and to prevent over topping or system failure. All spill collection and/or secondary containment devices shall be emptied of fluids within 72 hours of discovery. The owner/operator shall maintain all discharge permit related records at the facility and make them available to OCD inspectors upon request (See Section 21C below).

16. Spill Reporting: The owner/operator shall report all unauthorized discharges, spills, leaks and releases and conduct corrective action pursuant to WQCC Regulation 20.5.12.1203 NMAC and OCD Rule 116 (19.15.3.116 NMAC). The owner/operator shall notify both the OCD District Office and the Santa Fe Office within 24 hours and file a written report within 15 days. Note that the owner/operator may have Federal reporting obligation(s) to the National Response Center when releases to the environment exceed the 40 CFR 302.4 (Designation of Hazardous Substances).

17. OCD Inspections: The OCD may place additional requirements on the facility and modify the permit conditions based on OCD inspections. Subsequent to the OCD's February 19-21, 2007 inspection; February 27, 2008 meeting in Santa Fe, and March 13, 2008 inspection of the facility, the following requirements apply:

i All unlined storm water retention/detention ponds or storm water basins shall be lined (40-mil LLDPE or other liner approved by the OCD) with dual thermal seams by October 21, 2011.

ii The owner/operator shall submit updated site maps by February 28, 2009, showing the current status of all recovery wells, monitor wells, domestic, and irrigation wells and pertinent features (i.e., new refinery units, new MWs, remediation systems, effluent pipeline(s) to Class I waste water disposal wells, oil and gas transmission lines within and proximal to the property, and ground water contamination, etc. including the storm water basins (detention ponds).

iii All explosions, fires, etc., regardless of magnitude, duration, etc., shall be considered "Major Releases" under OCD Rule 116 and shall be reported to the OCD accordingly. The owner/operator shall cooperate with the OCD to ensure that all explosions/fires are tracked or recorded and corrective action(s) is considered and taken to eliminate the reoccurrence and to protect human health, safety and the environment. The OCD shall assist by following up with the owner/operator to ensure that the refinery is working to address and find solutions to these type of occurrences as the situation warrants.

iv The owner/operator shall submit a sanitary waste water proposal to close all existing below ground sanitary effluent tanks; treat and/or dispose of all sanitary waste water effluent through the refinery process area(s) and refinery permitted UIC Class I Injection Wells east of the refinery within 3 months of permit issuance to the OCD. The owner/operator shall follow NMED guidelines for removal or in place decommissioning of all below ground sanitary waste water closed tank systems. The owner/operator shall stop discharging sanitary effluent waste water into the below ground closed tank systems within 24 months of completion of the City of Artesia's sewer upgrade project. Since the proposal will involve treatment and disposal via oil and gas operations at the facility, the owner/operator shall deal directly with OCD on the treatment and disposal of sanitary effluent at the refinery with a courtesy copy of the proposal sent to the NMED-Pollution Prevention Office. Currently, the refinery discharges a maximum of 50 bbl/day of sanitary effluent into underground tanks (closed tank systems) that are pumped out and disposed at the local WWTP as needed.

V All spills or releases of chemicals regardless of "Minor vs. Major Releases" under OCD Rule 116 and Section 16 herein shall be cleaned up. Contaminated soils/sediments shall be physically removed or excavated from the ground to eliminate point source contamination to surface and/or ground water throughout the refinery. The only exception would be Section 8 (Process, Maintenance and Yard Areas) above where the owner/operator shall either pave and curb or have some type of spill collection device incorporated into the design at all process, maintenance, and yard areas which show evidence that water contaminants from releases, leaks and spills have reached the ground surface.

vi The owner/operator shall store and manage records associated with the discharge permit on the premises and made available to an OCD Representative upon request (See Section 21C below).

18. Storm Water: The owner/operator shall implement and maintain run-on and runoff plans and controls. The owner/operator shall separate or isolate contact from non-contact areas at the plant. The owner/operator shall not discharge any water contaminant that exceeds the WQCC standards specified in 20.6.2.3101 NMAC or 20.6.4 NMAC (Water Quality Standards for Interstate and Intrastate Streams) including any oil sheen in any storm water run-off. The owner/operator shall notify the OCD within 24 hours of discovery of any releases and shall take immediate corrective action(s) to mitigate and remediate the discharge.

19. Unauthorized Discharges: The owner/operator shall not allow or cause water pollution, discharge or release of any water contaminant that exceeds the WQCC standards listed in 20.6.2.3101 NMAC or 20.6.4 NMAC (Water Quality Standards for Interstate and Intrastate Streams) unless specifically listed in the permit application and approved herein. *An unauthorized discharge is a violation of this permit.*

20. Surface Water / Ground Water / Vadose Zone Monitoring/ Remediation/ Abatement:

The owner/operator shall address any contamination through the discharge permit process or pursuant to WQCC 20.6.2.4000 - 4116 NMAC (Prevention and Abatement of Water Pollution). The OCD may require the owner/operator to modify its permit for investigation, remediation, abatement, and monitoring requirements for any vadose zone or water pollution. Failure to perform any required investigation, remediation, abatement and submit subsequent reports shall be a violation of the permit.

The owner/operator shall sample, analyze and report ground water contamination to the NMED and OCD in accordance with state and federal laws. All environmental analytical sampling and testing shall comply with Environmental Protection Agency Standards and Methods. Permanent and/or temporary monitoring and remediation changes must be approved in writing by the OCD.

A. Ground Water and Treatment System Monitoring: Ground water monitoring locations, sampling frequency, and laboratory analytical methods are specified in Attachment 1, "Navajo Refinery Company Groundwater Monitoring Schedule. All permanent changes to the ground water monitor plan must be approved in a "Minor Modification" in writing by the OCD in consultation with the NMED.

Β.

Ground Water and Treatment System Annual Monitoring Report: An annual report shall be submitted to the OCD and NMED by February 28th of each year. The annual report shall contain:

i A description of the monitoring and remediation activities, which occurred during the year including conclusions and recommendations.

ii Summary tables listing laboratory analytic results, of all water quality sampling for each monitoring point and plots of concentration vs. time for contaminants of concern from each monitoring point. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report. Copies of the most recent year's laboratory analytical data sheets will also be submitted.

iii Plots of semi-annual static water table elevation vs. time for each ground water monitoring point to assess water table fluctuations and potential for smear zones to develop in areas where PSHs are present.

iv Ground water table (piezometric) surface elevation map(s) using the static water level elevation data of the ground water in all refinery monitor wells in advance of sampling shall be included in the annual report. A corrected water table elevation shall be determined for all wells containing PSHs. This map shall show well locations, pertinent site features (i.e., pipelines, effluent lines to Class I wells, etc.), and the direction and magnitude of the hydraulic gradient.

v PSH thickness isocon maps of free phase product on ground water at monitoring locations.

vi Chemicals of concern (COC) at levels of concern isocon maps from monitoring data. These maps shall include isopleths or iso-concentration lines for products and COC.

vii The monthly and cumulative volumes of PSHs recovered from recovery wells or trenches during each quarter and the total recovered to date. Flow rates of all recovery or purge wells.

viii Electronic filing: File this report in an acceptable electronic format along with hard copies to the NMED and OCD.

C.

Additional Requirements: The following are additional requirements of the permit:

i. The owner/operator shall notify the OCD Santa Fe and local district office at least 2 weeks in advance of all scheduled activities such that the OCD has the opportunity to witness the events and split samples. For large facilities, i.e., refineries, an annual notification will suffice.

ii. The owner/operator shall notify the OCD within 15 days of the discovery of PSHs or the exceedance of WQCC standards in any monitor well where PSHs were not present or where contaminant concentrations did not exceed WQCC standards during the preceding monitoring event.

iii. The owner/operator shall install secondary containment at the former waste water API by the expiration date of this permit.

21. Additional Site Specific Conditions:

A. API Separators: The owner/operator shall notify the OCD of any inactive separators that are placed back into service. A RCRA decommissioning request from NMED or OCD for investigation and/or remediation purposes where an API Separator prohibits remediation may require the owner/operator to decommission an inactive API Separator Unit.

B. New Full-Time Automated Free-Product Recovery System(s): A fulltime automated Phase Separated Hydrocarbon (PSH) product recovery system shall be operational in KWB-8 by August 31, 2008. Full-time automated PSH dedicated recovery systems shall be installed and operational in wells MW-48, MW-64, MW-65, KWB-2R, KWB-4, KWB-5, and KWB-6 by December 31, 2009. All recovery trenches and all wells with PSHs must be checked at a minimum of once per month and recorded on a spreadsheet or table. The data must be presented in table form listing all of the recovery wells, date inspected, product thickness measured to 0.01 of a foot, and amount of product/water recovered. If PSH thickness is observed in a monitoring well, recovery well or trench at 0.5 ft or less, a passive or active recovery system must be installed. If PSH thickness is 0.5 ft or greater, a full-time automated free-product recovery system must be installed to recover the PSHs using the best available technology and must be approved by NMED and OCD. This information must be provided in the annual groundwater report. All recovered PSHs shall be routed to the refinery treatment system for processing.

C. Records: Navajo shall develop and submit spreadsheets or tables with records that contains all underground tanks/sumps/pits (group by category, i.e, underground tank, sumps, and pits) within 3 months of permit issuance. Each category shall have an identification, drawing reference, date installed, test date, test method, pass/fail/repair information with signature, and investigation results if applicable. Navajo shall test at a minimum 20% of the total below grade devices each year or at least once before the expiration of the permit. The tables shall be included in the annual report.

22. Annual Report: On an annual basis due by February 28th. of each year, Navajo shall submit a formal report to the OCD on the past year's activities. The report will include the following at a minimum:

A. A summary of all major refinery activities or events.

B. Results of all sampling and monitoring events.

C. Summary of the sump and underground wastewater lines tested.

E. Summary of all leaks, spills and releases and corrective actions taken.

F. Summary of discovery of new groundwater contamination. This should include recommendations for investigation and remediation.

G. Summary and copies of all EPA/NMED RCRA activity.

H. Summary of any other discharge permit item specified to be included in the annual report herein.

23. Transfer of Discharge Permit (WQCC 20.6.2.3111): Prior to any transfer of ownership, control, or possession (whether by lease, conveyance or otherwise) of a facility with a discharge permit, the transfer or shall notify the transferee in writing of the existence of the discharge permit, and shall deliver or send by certified mail to the department a copy of such written notification, together with a certification or other proof that such notification has in fact been received by the transferee. Upon receipt of such notification, the transferee shall have the duty to inquire into all of the provisions and requirements contained in such discharge permit, and the transferee shall be charged with notice of all such provisions and requirements as they appear of record in the department's file or files concerning such discharge permit. The transferee (new owner/operator) shall sign and return an original copy of these permit conditions and provide a written commitment to comply with the terms and conditions of the previously approved discharge permit.

24. Closure and Financial Assurance (20.6.2.3107A (11) NMAC): Pursuant to 20.6.2.3107 NMAC, an owner/operator shall notify the OCD when any operations of the facility are to be discontinued for a period in excess of six months. Prior to closure, or as a condition of this permit, or request from the OCD, the operator shall submit an approved closure plan, or modify an existing plan, and/or provide adequate financial assurance in the form of an OCD Letter of Credit.

The owner/operator shall submit a closure plan and financial assurance cost estimate for post-closure monitoring by December 31, 2008. The plan shall address how any remaining water contaminants will be monitored and/or abated to ensure the protection of public health, safety, and fresh water for a period of at least 30 years after facility closure.

25. Certification: Navajo Refining Company- Artesia Refinery, by the officer, whose signature appears below, accepts this permit and agrees to comply with all submitted commitments, including these terms and conditions contained herein. Navajo Refining Company- Artesia Refinery, further acknowledges that the OCD may, for good cause shown, as necessary to protect fresh water, public health, safety, and the environment, change the conditions and requirements of this permit administratively.

<u>Conditions accepted by</u>: "I certify under penalty of law that I have personally examined and am familiar with the information submitted in this document and all attachments and that, based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information including the possibility of fine and imprisonment."

Company Name-print name above

Company Representative- print name

Company Representative-Signature

Title:

Date:

ATTACHMENT 1

Navajo Refining Company Table 1, July 2008 Page 1 of 16

Table 1 Navajo Refining Company Groundwater Monitoring Schedule

Monitoring	Sampling	Water Quality 🗆	Analytical	Approximate Well
Well ID	Frequency =	Parameters	Suite	location
MW-1R	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	W. of the EPs
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	
MW-2A ¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	W. of the EPs
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-3 ¹	Semi -			S. of EP 1 & 2
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-4A ¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	S. of EP 1 & 2
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	· · ·
MW-5A ¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	S. of EP 2
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-6A ¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	S. of EP 1
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-7A ¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	S. of EP 3
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	Replacement of MW-
				7
MW-8	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	TMD, S. of E. draw
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	btw B and H Rd

The Analyte list for EPA Method 8260 must include MTBE

¹= Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

³ = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of each year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

 4 = Annual groundwater monitoring event must be conducted in the spring.

⁵ = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

Navajo Refining Company Table 1, July 2008 Page 2 of 16

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Well ID	Frequency	a da fal a da fa a da fal da		location
MW-10 ¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	S. of EPs
· · · ·	annual. ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-11A ¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	N. of U.S. Hwy 82
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	btw B & H Rd
MW-15 ¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	W of EP 1
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-16	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	E. of H Rd and S. of
ł	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	E draw
MW-18 ⁻¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (GRO,	N. Portion of
	annual ³	ORP, DO	DRO), RCRA metals, major cations & anions,	Refinery E. of the
			nitrates/nitrites	NCL
MW-18A ⁻¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	S of EPs
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	
MW-20	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	E. of B. Rd, S. of E.
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	draw
MW-21	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	S. of E. draw, btw B
	annual ³³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	& H Rd.
MW-22A ¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA method	S. of EPs
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	

The Analyte list for EPA Method 8260 must include MTBE

¹= Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

 3 = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of each year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

⁴ = Annual groundwater monitoring event must be conducted in the spring.

⁵ = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

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Monitoring	ann a bad and bergeretet	Water Quality		Approximate Well
Well ID	Frequency	Parameters	Suite	location
MW-23		pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	W. of TEL
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	
MW-25	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	S. of EP, W. of Pecos
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	River, E. of H Rd.
MW-26	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	S. of EP, W. of Pecos
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	River, E. of H Rd.
MW-27	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	E. of H Rd and S. of
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	E. draw
MW-28	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	E. of the SE. Tank
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	Farm Area
MW-29	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	In refinery N. of TEL
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	
MW-39	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	N. of the TEL
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	
MW-41	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	N. of the TEL
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	
MW-42	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	N of the TEL
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	
MW-43	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	NW. of the TEL
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	

The Analyte list for EPA Method 8260 must include MTBE

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 5 = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

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Monitoring Well ID	Sampling Frequency	the second	Analytical Suite	Approximate Well location
MW-45 ¹	Semi - annual ³	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	E. of Refinery, S. of E draw
MW-46	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	E. of Refinery, S. of E draw
	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of SE Tank farm Area
	Semi - annual ³	ORP, DO	EPA Method 8260 (VOCs), EPA Method 8015B (GRO, DRO), RCRA metals, major cations & anions, nitrates/nitrites	E. of Refinery, midpoint btw E. draw and U.S. Hwy 82
MW-50	Semi - annual ³		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	W. of Refinery, E. of U.S. Hwy 285 and N. of U.S. Hwy 82
	Semi - annual ³	- · · ·	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of the Refinery, S. of U.S Hwy 82
	Semi - annual ³	- · · · · ·	EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	W. of Refinery btw U.S. Hwy 285 and RR tracks
			EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	NW. of NCL

The Analyte list for EPA Method 8260 must include MTBE

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Monitoring Well ID	Sampling Frequency	Water Quality Parameters	Analytical Suite	Approximate Well- location
MW-55 ¹			EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	E. of NCL
MW-56 ¹			EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	NE of the Refinery
MW-58			EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of U.S. Hwy 82 and W. of B Rd
MW-61 ⁵			EPA Method 8260 (VOCs), EPA Method 8015B (GRO, DRO), RCRA metals, major cations & anions, nitrates/nitrites	SW of TEL
MW-62 ⁵	-	pH, Cond, Temp, ORP, DO	EPA Method 8260 (VOCs), EPA Method 8015B (GRO, DRO), RCRA metals, major cations & anions, nitrates/nitrites	SW of TEL
MW-63 ⁵			EPA Method 8260 (VOCs), EPA Method 8015B (GRO, DRO), RCRA metals, major cations & anions, nitrates/nitrites	SW of TEL
MW-64 ⁵			EPA Method 8260 (VOCs), EPA Method 8015B (GRO, DRO), RCRA metals, major cations & anions, nitrates/nitrites	In Refinery area, N. of U.S. HWY 82

The Analyte list for EPA Method 8260 must include MTBE

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⁵ = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

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and a state of the second	Bereit berte erter beiten er beitere bereiten beiter er	Water Quality Parameters		Approximate Well- location
MW-65 ⁵	· · ·			S. of the SE Tank Farm Area
1				E. of the SE Tank Farm Area
	2			E. of the Diesel Tank Farm Area
MW-68	-			S. of E draw, btw D and H Rd.
F	Semi - annual ³	- · · · · · ·	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	S. of Eps; Renamed from MW-19
MW-72	Semi - annual ³	• · · • • • • • • • • • • • • • • • • •	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 6
	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 3
1	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 2

The Analyte list for EPA Method 8260 must include MTBE

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In ale belle eret rent free beeting gertent er bei bei anteren erte	+ittererreite		Analytical	Approximate Well
	in Subshift and a blie was be self and an an an an	the state of the second s		location
1		1 / / 1/		In EP 2
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-76	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	In EP 2
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-77	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	In EP 2
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-78	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	In EP 2
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-79	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	In EP 5
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-80	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	In EP 5
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-81	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	In EP 5
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-82	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	In EP 1
	annual ³	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-83	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	In EP 1
			8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-84	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	In EP 1
			8015B (GRO, DRO), major cations & anions, nitrates/nitrites	

The Analyte list for EPA Method 8260 must include MTBE

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 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

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⁴ = Annual groundwater monitoring event must be conducted in the spring.

⁵ = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

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Monitoring Well ID	the straight in a state of the	The provide state of the second state of the s		Approximate Well location
MW-85	Semi -	pH, Cond, Temp,		In EP 1
MW-86			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	In EP 1
MW-87	-		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	Btw MW-7B and MW-18A,S of EP 3
MW-88			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	Btw MW-4A and MW-10 below EP 1
MW-89			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	East of H Rd, S. of E Richey Ave
MW-90		• · · •	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	NW of North API Separator
MW-91	•		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	N of North API Separator
MW-92			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	S of North AP1 Separator
		- · · · ·	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	E of North APl Separator
		• · · • • • • • • • • • • • • • • • • •	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	E of the Diesel Tank Farm

The Analyte list for EPA Method 8260 must include MTBE

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 $\frac{1}{2}$ = Annual groundwater monitoring event must be conducted in the spring.

⁵ = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

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MW-95	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	N of the North API
	annual	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	Separator
MW-96	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	S of Diesel Tank
	annual	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	Farm
MW-97	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	SE corner of the
	annual 👘 🤤	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	North API Separator
MW-98	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	E of the Alky Unit
	annual	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	
MW-99	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	North of the
	annual	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	Southeast Tank Farm
MW-100	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	SE corner of the
	annual	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	Southeast Tank Farm
MW-101	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	North of the
-	annual	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	Southeast Tank Farm
MW-102	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method	West of the Southeast
	annual	ORP, DO	8015B (GRO, DRO), major cations & anions, nitrates/nitrites	Tank Farm
KWB-1A	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	S. of E draw, W. of B
· · ·	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	Rd.
KWB-1C	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, major cations &	S. of E draw, W. of B
	annual ³	ORP, DO	anions, nitrates/nitrites	Rd.

The Analyte list for EPA Method 8260 must include MTBE

¹= Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

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Monitoring	anter and the start of a part of all the bar bar and the start of the set	Brenn bertebe finn effetbereite - a mittige finteringe beite ditterette	Analytical	Approximate Well
P. C. B. D. Statistical delta Press	de entretteretet anter tetter ite mer etter	feit unter an en foreig in servicitation state beige been the spirit	Suite	location
KWB-P2	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	E. of D Rd, N. of
 	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	U.E. Hwy 82
KWB-2R	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	S. of U.S. Hwy 82 on
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	G.G. Armstrong &
		·		Son
KWB-3R	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	Replacement well for
•	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	KWB-3A. S. of U.S.
				Hwy 82 btw B & D
	· .			Rd
KWB-4	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	N. of U.S. Hwy 82,
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	W. of B Rd.
KWB-5	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	N of U.S. Hwy 82,
· .	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	W. of B Rd.
KWB-6	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	N. of U.S. Hwy 82,
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	W. of B Rd.
KWB-7	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	N. of U.S. Hwy 82
· ·	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	btw B & D Rd
KWB-8	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), EPA Method 8015B (DRO),	N. of U.S. Hwy 82
	annual ³	ORP, DO	RCRA metals, major cations & anions, nitrates/nitrites	btw B & D Rd

The Analyte list for EPA Method 8260 must include MTBE

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Per a materia and a statistic and the deal of the state o		Hardenfie fin me bit findefielt eine an bertet in teller fiet gezinet effer er etter	Analytical Suite	Approximate Well
	-		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of U.S. Hwy 82, E. of B Rd.
			EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	E. of Refinery, S. of E. draw, N. of U.S. Hwy 82
	-		EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	N. of U.S. Hwy 82 btw B & D Rd
KWB-12A			EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of U.S. Hwy 82, E. of B Rd.
KWB-13			EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of U.S. Hwy 82, W. of B Rd
NP-1		pH, Cond, Temp, ORP, DO	EPA Method 8260 (VOCs)	S. of E. draw, W. of B Rd
NP-2	-	pH, Cond, Temp, ORP, DO	EPA Method 8260 (VOCs)	Directly E. of B Rd., S. of E draw
NP-3			EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	Directly N. of E. draw, NE. of B Rd.
NP-5			EPA Method 8260 (VOCs), EPA Method 8015B (DRO), RCRA metals, major cations & anions, nitrates/nitrites	S. of Richey Rd, N. of E. Draw, W. of B Rd.

The Analyte list for EPA Method 8260 must include MTBE

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Monitoring Well ID	Sampling Frequency	A second state of the seco		Approximate Well location
	Semi - annual ³			S. of E. draw, W. of B Rd.
NP-7 Well location unknown	Semi - annual ³			S. of E draw, btw D & H Rd.
1	Semi - annual ³	14 C 4. C	RCRA metals, major cations & anions, nitrates/nitrites	S. of Richey Rd, N. of E. Draw, W. of B Rd.
	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	NW. of EP 6
	Semi - ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	N. of EP 6
	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	NE. of EP 6
	Semi - annual ³		EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	NE. of EP 6
(·			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	NE of EP-6
1	Semi - annual ³	.	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	E. of EP-6

The Analyte list for EPA Method 8260 must include MTBE

¹= Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

 3 = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of each year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

⁴ = Annual groundwater monitoring event must be conducted in the spring.

⁵ = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

Navajo Refining Company Table 1, July 2008 Page 13 of 16

Monitoring Well ID	and the second of the second o			Approximate Well location
OCD-7A ¹	Semi -	pH, Cond, Temp,	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	SE. of EP-6
OCD-8A ¹		1 1	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	SE. of EP 3
NCL-32 ¹	· ·			NW. Portion of the Refinery
NCL-33 ¹				NW. Portion of the Refinery
NCL-34 ¹				NW. Portion of the Refinery
NCL-44 ¹				NW. Portion of the Refinery
NCL-49 ¹				NW. Portion of the Refinery
TEL-1 ¹			EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	NE. Portion of the Refinery
TEL-2 ¹		1 · · · ·	EPA Method 8260 (VOCs), RCRA metals, EPA Method 8015B (GRO, DRO), major cations & anions, nitrates/nitrites	NE. Portion of the Refinery

The Analyte list for EPA Method 8260 must include MTBE

¹= Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

 3 = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of each year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

⁴ = Annual groundwater monitoring event must be conducted in the spring.

⁵ = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

Navajo Refining Company Table 1, July 2008 Page 14 of 16

Monitoring Well ID	strengt filling for an and the second strength and and state	Water Quality Parameters		Approximate Well location
	Semi - annual ³	pH, Cond, Temp,		NE. Portion of the Refinery
TEL-4 ¹	Semi - annual ³	ORP, DO	EPA Method 8260 (VOCs), EPA Method 8015B (GRO, DRO), RCRA metals, major cations & anions, nitrates/nitrites	NE. Portion of the Refinery
	Annual ⁴ (Spring of each year)	· · ·	EPA Method 8260 (VOCs), RCRA metals, major cations & anions, nitrates/nitrites	³ North Portion of the Refinery
	Annual ⁴ (Spring of each year		EPA Method 8260 (VOCs), RCRA metals, major cations & anions, nitrates/nitrites	³ S. of E draw & W. of B Rd.
				N. of U.S. Hwy 82, W. of B Rd.
	Semi - annual ³			N. of U.S. Hwy 82, W. of B Rd.
				N. of U.S. Hwy 82, W. of B Rd.
	Semi - annual ³			S. of U.S. Hwy 82 and E. of B Rd.

The Analyte list for EPA Method 8260 must include MTBE

¹= Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

 3 = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of each year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

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⁵ = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

Navajo Refining Company Table 1, July 2008 Page 15 of 16

	14 - 19 - 19 - 19 - 19 - 19 - 19 - 19 -		Approximate Well location
RA 3353			S. of U.S. Hwy 82 and E. of B Rd
RA 4196			N. of U.S. Hwy 82 and E. of B Rd
RA 4798			E. of B Rd, N. of U. S. Hwy 82
Larue well	 	EPA Method 8260 (VOCs), major cations & anions, nitrates/nitrites	

Table date: May, 2006; Revision 1

Acronym List

N = North; S = South; E = East; W = West; NE = Northeast; NW = Northwest; SW = Southwest; SE = Southeast; Btw = between

B Rd = Bolton Road; H Rd = Haldeman Road; D Rd = Dirt Road; Hwy = highway;

EP = Evaporation Ponds; TMD = Three Mile Ditch; E. draw = Eagle Draw;

The Analyte list for EPA Method 8260 must include MTBE

¹= Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

³ = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of each year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

 4 = Annual groundwater monitoring event must be conducted in the spring.

 5 = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

Navajo Refining Company Table 1, July 2008 Page 16 of 16

NCL = North Colony Landfarm, TEL = Tetra Ethyl Lead Impoundment

DO = dissolved oxygen; ORP = oxygen reduction potential; temp = temperature; Cond = specific conductivity

VOCs - volatile organic compounds, SVOCs - semi volatile organic compounds, DRO - diesel-range organics,

BTEX – benzene, toluene, ethylbenzene, xylene, MTBE – Methyl Tertiary-Butyl Ether; GRO – gasoline-range organics

OCD - Oil Conservation Division

The Analyte list for EPA Method 8260 must include MTBE

¹= Wells requiring monitoring under the RCRA Post Closure Care Permit.

 2 = Recovery Wells must be sampled if they do not contain measurable phase-separated hydrocarbons.

³ = Semi-Annual groundwater monitoring event must be completed no more than 30 days prior to the start of the irrigation season but no later than April 30 of each year. Monitoring must be conducted no later than 30 days after the conclusion of the irrigation season but no later than November 15 of each year.

⁴ = Annual groundwater monitoring event must be conducted in the spring.

⁵ = New monitoring wells installed during the SWMU/AOC Group 1 Corrective Action Investigation.

ATTACHMENT 2

WASTE DISPOSAL FACILITY DIESEL CONTAMINATED SOIL GASOLINE CONTAMINATED SOIL KEROSENE CONTAMINATED SOIL NAPHTHA CONTAMINATED SOIL GAS OIL CONTAMINATED SOIL. CRUDE CONTAMINATED SOIL SLURRY CONTAMINATED SOIL CARBON BLACK CONTAMINATED SOIL ASPHALT CONTAMINATED SOIL REFRACTORY BRICK FLUORIDE PRECIPITATOR SOLIDS (CAF) DISSOLVED AIR FLOAT (DAF) FCC CAT FINES BLAST SAND ACTIVATED ALUMINA APPROVED OCD ARTESIA ASPHALT CANS FACILITY COOLING TOWER SLUDGF TRASH AND DEBRIS SALT FILTER PIPELINE FILTERS CHLORIDE :GUARD SULFUR GUARD D-350 CATALYST CERAMIC RINGS D-370/371 CATALYST D-342 CATYLYST. ISOM CARBON PALL RINGS OFFICE TRASH STEEL DRUMS TANK SEALS INJECTION WELLS PROCESS WASTE WATER CITY POTW R O REJECT NAVAJO FARMS SPENT CAUSTIC MERICHEM HOUSTON, TX SANITARY SEWER CITY POTW. INJECTION WELLS

CURRENT-ARGUS

ADVERTISING INVOICE/STATEMENT

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Mail Paymen To: Carlsbad Current-Argus P.O. Box 1629 Carlsbad, NM 88221-1629

DETACH THIS STUB AND RETURN WITH PAYMENT PAYABLE TO: Carlsbad Current-Argus 2008 HUG 12

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NM OIL & CONSERVATION, ENERGY, 1220 S SAINT FRANCIS DR SANTA FE NM 87505-4000

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NO I:: Bills are due and payable when rendered. If the ending balance of any statement is not paid in full during the following month, that portion of it which remains unpaid, after application of all payments and those credits which pertain to that balance (rather than to the current month's charges), will be assessed a FINANCE CHARGE of 1.35% per month (an ANNUAL PERCENTAGE RATE not to exceed 18% per year). The minimum FINANCE CHARGE (which will apply should there be any unpaid balance) will be \$0.50. No FINANCE will be made if the ending balance is paid in full within the ensuing month.

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ACCOUNT NO.		NAME		INVOICE NUMBER	AMOUNT PAID
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Affidavit of Publication

State of New Mexico, County of Eddy, ss.

Kathy McCarroll, being first duly sworn, on oath says:

That she is the Classified Supervisor of the Current-Argus, Carlsbad а newspaper published daily at the City of Carlsbad, in said county of Eddy, state of New Mexico and of general paid circulation in said county; that the same is a duly qualified newspaper under the laws of the State wherein legal advertisements may and notices be published; that the printed notice attached hereto was published in the regular and entire edition of said newspaper and not in supplement thereof on the date as follows, to wit:

July 16

2008

That the cost of publication is \$ 157.22 that Payment Thereof has been made and will be assessed as court costs.

Subscribed and sworn to before me this

00 0 day of My commission Expires on

Notary Public

OFFICIAL SEAL STEPHANIE DOBSON Notary Public State of New Mex My Comm. Expire JUL 21 PM 2 00

July 16; 2008 🏇 NOTICE OF

PUBLICATION STATE OF NEW ENERGY MINER RESOURCES DEPARTMENT

CONSERVATION is thereby pursuant co Water co Com New o Qualny mission n s appli been he Di s the Nev atostn (athe New Conserva sion or of ico Oil ion 55: NOCD" 1220 5. s Drive ("NMOCD"), 1220 S. Saint Francis Drive, Santa Fe, New Mexi co ~87505, Telephone (505) 476-3440

(505) 4/0-3440: (GW-028) Navajo Re tining Company. Arte sia Refinery, Darrell Woore, IEnviron mental Monager, P.O. Box 159 Artesio, New Mexico 82211, has sub mitted o renewal ap plication for the pre-viously approved div charge plan, for "their Artesia Refinery lo Section 1, E/2 of Sec-tion 8, W/2 of Section Re the E/2 of of Section of Section oction 12, South, East, Eddy County, theast of the section of the section of the source of the section of the rtesia New Mexico. he refinery dis out 14,000 bbl/day of vated wistewater to y 3 refinery permit EPA Class 1: (non-tardous), Injection IIs and/or POTW disposal, treat the and/or reve treated um water volu. 50 bbl/day is to vinderground am tankt closed system fanks for porn out and a dis posal at the WWP. There, are plans with in 24 hours of permit issuance, to process all sanitary effluent and dispose of at down any of the 35 EPA itary pose of it the isset it the isset it the isset owned by the fin e r ,000 roximately 7,000 'day of Reverse 'is (RO) treated woste woste is b t T proximately (/day of R mosis (RO) ste water, it enerated mporarily, st inks or con disposal or disposal edit ostes I be ed jin stored in containers ad off site al or recy n OCD op facility

Froundwater: mos kely ito be affecte y auspill; leak or a idental discharge i trad depth of, approx depth 10 approv total with a stored dissolved solids, con entration of approximately. 2500 mg/L. addresses how olitical, offined, prod ucts and wastes with be properly whandled, stored, and dispect of including how spils, leaks, and offic charges io the surface will be managed in order to protect fresh water.

order to protect fresh water Name NMOCD has de termined that the ope of a state above and has re-pared and has re-tread and the second statements of interest and and will create a facility specific mailing list for per sons who wish for per sons who wish for the ceive future notices ing to be on a facility specific mailing list for future notices may contact the Environ mental Bureau Chief of the Oil Conserva-tion Division at the address given above address given above address given above the administrative completeness deter mination and draft permit may be view ed at the MMOCD we b wiewen 8:00 contact at he MMOCD we b wiewen be the second the second at the address between 8:00 contact the second and the address between 8:00 contact the second at the address between 8:00 contact at the MMOCD we b wiewed at the MMOCD we b the second at the address between 8:00 contact the second contact the second at the MMOCD we b the second contact the second at the second contact the second second contact the second second contact the second second second second the second contact the second second second second second second the second s at b Persons interest obtaining a co the application the draft draft pern tact the the add above Pri he above. Prio on any propose charge permit or modification shall da (30) au, (30) au, is of public is notice) a interester a yess or s date this which ublic. aring: sno Id: Archearing held sife the D détérmines ma is significant

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Seol of N Oil Con Commission a tijo n Santa New Mex 10rth day Fe, this 2008. STATE OF

OIL CONSER

DIVISIO SEAL Mark Fesmire Director

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STATE OF NEW MEXICO ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT OIL CONSERVATION DIVISION

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Nuevo

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Notice is hereby given that pursuant to New Mexico Water Quality Control Commission Regulations (20.6.2.3106 NMAC), the following discharge permit application(s) has been submitted to the Director of the New Mexico Oil Conservation Division ("NMOCD"), 1220 S. Saint Francis Drive, Santa Fe, New Mexico 87505, Telephone (505) 476-3440: の意識に言語では、「なる」の語言である。

(GW-028) Navajo Refining Company- Artesia Refinery, Darrell Moore, Environmental Manager P.O. Box 159, Artesia, New Mexico 88211, has submitted a renewal application for the previously approved discharge plan for their Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM Eddy County, just northeast of the intersection of Hwy. 285 and Hwy. 82, in Artesia New Mexico The refinery discharges a total of about 14,000 bbl/day of treated wastewater to any 3 refinery permitted EPA Class I (non-hazardous) Injection Wells and/or POTW for disposal, treatment; and/or reuse. A maximum sanitary waste water volume rate of 50 bbl/day is routed to under ground closed system tanks for pump out and disposal at the WWTP. There are plans within 24 hours of permit issuance to process all sanitary effluent and dispose of it down any of the 3 EPA Class I Injection Wells owned by the refinery. Approximately 7,000 bbl/day of Reverse Osmosis (RO) treated waste water is used for nearby irrigation. All other wastes generated will be tem porarily stored in tanks or containers and shipped off site for disposal or recycling at an OCD approved facility. Groundwater most likely to be affected by a spill, leak or accidental discharge is at a depth of approximately 10 feet below the ground surface, with a total dissolved solids concentration of approximately 2500 mg/L. The discharge plan addresses how oilfield refined products and wastes will be properly handled, stored, and disposed of, including how spills, leaks, and other accidental discharges to the surface will be managed in order to protect fresh water.

The NMOCD has determined that the applications listed above are administratively complete and has prepared draft permits. The NMOCD will accept comments and statements of interest regarding this application and will create a facility-specific mailing list for persons who wish to receive future notices. Persons interested in obtaining further information, submitting comments or requesting to be on a facility-specific mailing list for future notices may contact the Environmental Bureau Chief of the Oil Conservation Division at the address given above. The administrative completeness determination and draft permit may be viewed at the above address between 8:00 a.m. and 4:00 p.m., Monday through Friday, or may also be viewed at the NMOCD web site http://www.emnrd.state.nm.us/ocd/. Persons interested in obtaining a copy of the application and draft permit may contact the NMOCD at the address given above. Prior to ruling on any proposed discharge permit or major modification, the Director shall allow a period of at least thirty (30) days after the date of publication of this notice, during which interested persons may submit comments or request that NMOCD hold a public hearing. Requests for a public hearing shall set forth the reasons why a hearing should be held. A hearing will be held if the Director determines that there is significant public interest.

If no public hearing is held, the Director will approve or disapprove the proposed permit based on information available, including all comments received. If a public hearing is held, the director will approve or disapprove the proposed permit based on information in the permit application and information submitted at the hearing.

Para obtener más información sobre esta solicitud en espan?ol, sirvase comunicarse por favor: New Mexico Energy, Minerals and Natural Resources Department (Depto. Del Energia, Minerals y Recursos Naturales de Nuevo México), Oil Conservation Division (Depto. Conservacio'n Del Petróleo), 1220 South St. Francis Drive, Santa Fe, New México (Contacto: Dorothy Phillips, 505-476-3461)

Ita Fe, GIVEN under the Seal of New Mexico Oil Conservation Commission at Santa Fe, New Mexico, on this 3rd day of July 2008.

STATE OF NEW MEXICO OIL CONSERVATION DIVISION

ANUNCIU DE PUBLICACIUN

ESTADO DE NUEVO MEXICO Departamento de Energía, Minerales y Recursos Naturales División de Conservación de Petróleo

Aviso dado que en virtud de Reglamentos de la Comisión de Control de Calidad del Agua de Nuevo Mexico (20.6.2.3106 NMAC), la siguiente solicitud de permiso de descarga (s) se ha presentado al Director de la División de Conservación de Petróleo de Nuevo Mexico ("NMOCD" por sus siglas en inglés), 1220 S. Saint Francis Drive, Santa Fe, Nuevo Mexico 87505, Teléfono (505) 476-3440:

(GW-028) Navajo Refining Company-Refinería Artesia, Darrell Moore, Gerente de Medio Ambiente, Apartado 159, Artesia, Nuevo Mexico 88211, ha presentado una solicitud de renovación para su plan de descarga aprobado con anterioridad para su refinería Artesia ubicada en la SE / 4 de la sección 1, E / 2 de la sección 8, W / 2 de la sección 9, N / 2 de la sección 12 el Municipio 17 Sur, Rango 26 Oriente, NMPM, Eddy County, justo al noreste de la intersección de la carretera. 285 y Hwy. 82, en Artesia New Mexico. La refinería descarga un total de alrededor de 14000 bbl / día de aguas residuales tratadas para cualquiera de 3 refinerías permiso Cláse I EPA (no peligrosos) pozos de inyección y / o POTW para su eliminación, tratamiento 💔 o reutilización. Un máximo de aguas residuales sanitarias de volumen de 50 bbl / día se dirige a sistema cerrado para la bomba de tanques y disposición a Planta de Tratamiento de Aquas Usadas. Está previsto dentro de un plazo de 24 horas el permiso de emisión para procesar todos los efluentes sanitarios y disponer de él bajo cualquiera de los 3 Clase I EPA pozos de inyección propiedad de la refinería. Aproximadamente 7,000 bbl / día de Osmosis Inversa (OI) de aquas residuales tratadas se utiliza para riego cerca. Todos los demás residuos generados se almacenan temporalmente en tanques o contenedores y enviadas fuera del sitio para disposición o reciclaje en una instalación aprobada como OCD. La mayoría de las aguas subterráneas que puedan verse afectadas por un derrame, fuga o descarga accidental se encuentra en una profundidad de aproximadamente 10 pies por debajo de la superficie del suelo, con un total de concentración de sólidos disueltos de aproximadamente 2,500 mg / L. El plan de cescraga que aborda la forma en que productos refinados en campos petroleros y desechos serán debidamente manipulados, almacenados, y eliminados, incluyendo cómo los derrames: filtraciones, y otras descargas accidentales a la superficie será gestionada con el fin de proteger el agua fresco.

El NMOCD (por sus siglas en ingles) ha determinado que las aplicaciones enumeradas anteres ormente son administrativamente completas y ha preparado un borrador de permisos. El NMOCD aceptará comentarios y declaraciones de interés respecto a esta solicitud y va a crear un listado de correo de instalación específica para las personas que deseen recibir futuras notificaciones. Las personas interesadas en obtener más información, enviar comentarios o solicitar estar en este listado de correo de instalación específica para futuras notificaciones puede ponerse en contacto con el Jefe de la Oficina Ambiental de la División de Conservación de Petróleo en la dirección que figura más arriba. La determinación administrative de integridady el borrador de permiso puede consultarse en la dirección antes mencionada entre las 8:00 am y 4:00 pm, de lunes a viernes, o también pueden ser vistos en la NMOCD sitio en web http://www.emnrd.state.nm.us/ocd/. Las personas interesadas en obtener una copia de la solicitud y el borrador de permiso podrán ponerse en contacto con el NMOCD en la dirección que figura más arriba. Antes de pronunciarse sobre la aprobación de cualquier permiso de descarga propuesto y borrador de descarga o modificación importante, el Director deberá contemplar un período de por lo menos treinta (30) días después de la fecha de publicación del presente anuncio, durante el cual las personas interesadas podrán presentar observaciones o pedir que NMOCD celebre una audiencia pública. En las solicitudes de audiencia pública se expondrán las razones por las que una audiencia se celebre. Una audiencia se llevará a cabo si el Director determina que existe un importante interés público.

Si no se celebró audiencia pública, el Director aprobará o rechazará el propuesto permiso con base en la información disponible, incluyendo todos los comentarios recibidos. Si una audiencia pública se celebró, el director aprobará o rechazará el propuesto permiso basado en la información en la solicitud de permiso y la información presentada en la audiencia.

Para obtener más información sobre esta Solicitud en español, sirvase comunicarse por favor



ARTESIA MINI-WAREHOUSE & STORAGE. Storage Units. Call 746-9611.

ARTESIA PRESCRIPTION PEST CONTROL Reasonable rates. Call Jerry Dodd at 746-4350 Lic.#53488

GRAMMY'S HOUSE. Domestic Violence & Crime Victims Assistance Programs. 748-1198 office, 365-5144/24hr.

Sanchez Carpet Cleaning 10% OFF Drv-Chem-"Hot" Citrus-Based Solution Commercial-Residential Free Estimates/746-4658

2 BEAUTY CARE

RITA RAINWATER. Mary Kay Independent Beauty Consultant. 748-9727 www.marykay.com/rrainwater1.

3 LOST & FOUND

Missing from Jerry Rd. Small Black & Tan Female Mix. Freshly Clipped. 4 mo.old. Please Call 513-2781 or 513-0042

HEALTH

In Touch with Judy Judy Davis, LMT 5440 **NEW LOCATION** 103 N. 7th **Behind Brannon Financial** 505-308-3060 Massage Therapy Infrared Sauna Ion Cleanse Gift Certificates Available. Give a gift of health and relaxation.

6 LANDSCAPING

non medical care to seniors. All shifts open. Must be available weekends, have driver's license and auto insurance. Work a flexible schedule while making a difference in someone's life. Call 748-2200 or stop by 502 W. Texas #C between 9am-Noon Mon, Wed, or Fridays to apply. We Pay Overtme.

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Health, Dental, Vision, 401k, Safety bonus, Coastal Transport is now seeking individuals to deliver petroleum product in surrounding areas. Must be 23 years of age, have a class A license with tanker and Haz- Mat endorsements. With 1 year tractor/trailer experience. Please contact us at 1-877-297-7300 or 575-748-8808

HEQUIPMENT OPERATOR/DRI-VER

Talon/LPE is seeking an experienced Equipment Operator/Driver for our Artesia Office. Prefer candidates that possess an active CDL and clean driving record. Required experience includes dump truck, tanker truck, backhoe, trackhoe, bulldozer, skid loader, and other heavy equipment. Experience in general construction/industrial activities including excavations, leveling, demolition, trenching/boring, and roadways a plus. Talon/LPE is an equal opportunity employer. Call 432-238-6388, send resume to jford@talonipe.com or fax resume to 806-467-0622

Full Time parts counter person needed. Experience preferred, but are willing to train. Direct inquires to Tommy at 575-748-1400, or pick up application at 312 W. Richey in Artesia or 1015 S. Atkinson in Roswell.

NANCE @ FLETC

Federal Law Enforcement Training Center, Artesia, NM Facilities Maintenance Pyramid Services, Inc. is currently hiring, for the following position: Administrative Assistant @ 10.10 per hour Temporary Grounds workers @

\$11.38 per hour.

Temporary Janitorial workers @ \$10.97 per hour,

Must be able to pass background check and pre employment drug screening. Pyramid Services values its employees and rewards them with competitive compensation, a generous benefits plan; 401(k), medical, vision and dental insurance, and much more. Pyramid Services, Inc. is an equal

opportunity employer who values diversity in the workplace. Please send resume to 1300 W. Richey Ave bldg #10 Artesia NM 88210 email to

esartain@pyramidsvc.com or fax to 505-748-9894, ATTN: Erica Garcia include cover sheet with position applying for.

Now Hiring Wait Staff, Bartender, Dishwasher, Line cooks. Bilingual and serving license a big + Please apply @ Artesia Country Club. See Jole Bell or Call 746-2055

Pecos Valley Regional Education Cooperative #8 is seeking to fill position of PHYSICAL THERA-PIST; this is a full time position working with our member school districts. This person must have a Board Certified Physical Therapy License. We offer competitive pay, great benefits and an excellent work environment. We will accept applications until the position is filled If interested please contact of send resume to: Pecos Valley

REC# Attn: Janet Grice P.O Box 155 Artesia NM 88211

NM EMNRD Oil Conservation Carl J. Chavez 1220 S. St. Francis Drive Santa Fe, NM 87505

ALTERNATE ACCOUNT: 56689 AD NUMBER: 00261352 ACCOUNT: 00002212 LEGAL NO: 85659 P.O. #: 52100-0000075 229 LINES 1 TIME(S) 199.36 AFFIDAVIT: 7.00 TAX: 16.38 TOTAL: 222.74

AFFIDAVIT OF PUBLICATION

THE SANTA FE

Founded 1849

NEW MEXICA

STATE OF NEW MEXICO COUNTY OF SANTA FE

I, L. Paquin, being first duly sworn declare and say that I am Legal Advertising Representative of THE SANTA FE NEW MEXICAN, a daily newspaper published in the English language, and having a general circulation in the Counties of Santa Fe and Los Alamos, State of New Mexico and being a newspaper duly qualified to publish legal notices and advertisements under the provisions of Chapter 167 on Session Laws of 1937; that the publication # 85659 a copy of which is hereto attached was published in said newspaper 1 day(s) between 07/16/2008 and 07/16/2008 and that the notice was published in the newspaper proper and not in any supplement; the first date of publication being on the 16th day of July, 2008 and that the undersigned has personal knowledge of the matter and things set forth in this affidavit.

ADVERTISEMENT REPRESENTATIVE

Subscribed and sworn to before me on this 16th day of July, 2008

Our Beach) anel Notary

Commission Expires:



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STATE OF NEW MEX ENERGY, MINERALS AND NATURAL RE-SOURCES DEPART-DEPART-

NOTICE OF PUBLICATION

MENT CONSERVATION DIVISION

Notice is hereby given that pursuant to New Mexico Water Quality Control, Commission Regulations (20.62.3106 NMAC), the following discharge (permit) application(s) has been submitted to the Di-rector of the New Mexico Oil Conservation Division ("NMOCD"), 1220 S. Saint Francis Drive, Division Santa Fe, New Mexico 87505, Telephone (505) 476-3440:

(GW-028) Navajo Refining Company- Arte-sia Refinery, Darrell Moore, Environmental Manager, P.O 159, Artesia, P.O. Box New Mexico 88211, has submitted a renewal application for the applica... previously appli-barge plan approved for discharge plan for their Artesia Refinery located in the SE/41of Section 1, E/2 of Sec-tion 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy Coounty, just northeast of the internortheast of the inter-section of Hwy. 285 and Hwy. 82 in Artesia New Mexico. The refinery discharges a total of about 14,000 bbl/day of treated wastewater to any 3 efinery permitted EPA Class I (non-hazardous) Injection Wells and/or POTW for disposal, treatardõus) ment, and/or reuse, A maximum sanitary waste water volume rate of 50 bbl/day is

ily stored in tanks or containers and shipped off site for disposal or recycling at an OCD approved facility. Groundwater most likely to be af-fected by a spill, leak or accidental dis-charge is at a depth of approximately 10 feet below the ground feet below the ground surface, with a total dissolved solids con-centration of approxi-mately 2500 mg/L. The discharge plan addresses how oil-field refined products and wastes will be properly handled, stored, and disposed of, including how spills, leaks, and spills, leaks, and other accidental dis-charges to the sur-face will be managed in order to protect fresh water.

is significant public interest. The NMOCD has de-termined that the ap-plications listed termined that the ap-plications listed above are administra-tively complete and has prepared draft permits. The NMOCD will accept comments and statements of in-terest regarding this application and will create a facility-spe-cific mailing list for persons who wish to receive future no-tices. Persons inter-ested in obtaining fur-

routed to under-ground closed system initing comments or and disposal at the WWTP. There are plans within 24 hours of permit issuance to process all sanitary effluent and dispose of, permit issuance to process all sanitary effluent and dispose of, permit issuance to process all sanitary effluent and dispose of, permit issuance to process all sanitary effluent and dispose of, the off the Oil Con-process all sanitary effluent and dispose of, the off the Oil Con-process all sanitary effluent and dispose of, the oil con-the address given above. The adminis-trative completeness (RO) treated waste water is used for nearby irrigation. All other wastes gener-ated will be temporar-ily stored in tanks or containers and shipped off site for disposal or recycling at an OCD amproved Prior*to ruling on any proposed discharge STATE OF NEW MEX-permit or major modi fication, the Director shall allow a period of at least thirty (30) days after the date of publication of this no-tice, during which in terested persons may least No. 85659 treested persons may submit comments or, request that NMOCD hold a public hearing Requests for a public hearing shall set forth the reasons why a hearing should be held. A hearing will be held if the Director determines that there

GIVEN under the Seal of New Mexico Oil Conservation. Com-mission at Santa Fe, New Mexico, on this 10rth day of July 2008.

Legal No. 85659 Pub. July 16, 2008

Affidavit of Publication

State of New Mexico, County of Eddy, ss.

Kathy McCarroll, being first duly sworn, on oath says:

That she is the Classified Supervisor of the Carlsbad Current-Argus, a newspaper published daily at the City of Carlsbad, in said county of Eddy, state of New Mexico and of general paid circulation in said county; that the same is a duly qualified newspaper under the laws of the State wherein legal notices advertisements mav and be published; that the printed notice attached hereto was published in the regular and entire edition of said newspaper and not in supplement thereof on the date as follows, to wit:

<u>July 16</u>

2008 1/22/08 04-5= tun July 18, 2008

STATE OF NEW

That the cost of publication is \$ **157.22** that Payment Thereof has been made and will be assessed as court costs.

Subscribed and sworn to before me this

00 day of My commission Expires on

Notary Public

OFFICIAL SEAL STEPHANIE DOBSON Notary Public state of New Me: My Comm. Expires 88 TUL 21 PM 2 0

Chavez, Carl J, EMNRD

From:	Chavez, Carl J, EMNRD
Sent:	Friday, July 11, 2008 8:00 AM
То:	'Moore, Darrell'
Cc:	'Lackey, Johnny'
Subject:	FW: Navajo Refining Company- Artesia Refinery (GW-028) Discharge Permit Renewal
Attachmanta	Panawal WOCC Nation Rags add: PN Flow Chart 20.6 2ronowal add

Attachments: Renewal WQCC Notice Regs.pdf; PN Flow Chart.20.6.2renewal.pdf

Darrell:

Good morning. By receipt of this e-mail and the message below, a signed administrative completeness letter will be mailed to you today. This marks the beginning of the WQCC public notice period as per 20.6.2.3108 (see attachments).

Please contact me if you have questions. Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3491 Fax: (505) 476-3462 E-mail: <u>CarlJ.Chavez@state.nm.us</u> Website: <u>http://www.emnrd.state.nm.us/ocd/</u>index.htm (Pollution Prevention Guidance is under "Publications")

From: Chavez, Carl J, EMNRD

Sent: Friday, July 11, 2008 7:54 AM

To: Thompson, Bruce C., DGF; Warren, Alvin, DIA; Kiger, Stephanie P, DIA; 'ddapr@nmda.nmsu.edu';
'Linda_Rundell@nm.blm.gov'; 'psisneros@nmag.gov'; 'lsouthard@nmag.gov'; 'r@rthicksconsult.com';
'sricdon@earthlink.net'; 'nmparks@state.nm.us'; Dantonio, John, OSE; 'sreid@nmoga.org'; Martinez, Elysia, NMENV; 'lazarus@glorietageo.com'; Stone, Marissa, NMENV; 'ron.dutton@xcelenergy.com'; 'cgarcia@fs.fed.us';
'jbarnett@barnettwater.com'; Kieling, John, NMENV; 'bsg@garbhall.com'; Olson, Bill, NMENV;
'claudette.horn@pnm.com'; 'ekendrick@montand.com'; 'staff@ipanm.org'; Williams, Chris, EMNRD; Johnson, Larry, EMNRD; Gum, Tim, EMNRD; Bratcher, Mike, EMNRD; Perrin, Charlie, EMNRD; Powell, Brandon, EMNRD; Martin, Ed, EMNRD; 'dseawright@gmail.com'; 'jharris@rwdhc.com'
Cc: 'Moore, Darrell'; Monzeglio, Hope, NMENV; Price, Wayne, EMNRD
Subject: Navajo Refining Company- Artesia Refinery (GW-028) Discharge Permit Renewal

Ladies and Gentlemen:

The New Mexico Oil Conservation Division (OCD) recently posted a draft discharge permit, public notice and administrative completeness letter on its website at <u>http://www.emnrd.state.nm.us/ocd/ENV-DraftPublicEtc.htm</u> for the above subject facility.

For more information about this facility, please go to OCD Online at <u>http://ocdimage.emnrd.state.nm.us/imaging/AEOrderFileView.aspx?appNo=pENV000GW00029</u>. (enter "GW" and "28").

Please contact me if you have questions. Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3491 Fax: (505) 476-3462 E-mail: <u>CarlJ.Chavez@state.nm.us</u> Website: <u>http://www.emnrd.state.nm.us/ocd/index.htm</u> (Pollution Prevention Guidance is under "Publications")

Chavez, Carl J, EMNRD

From: Chavez, Carl J, EMNRD

Sent: Friday, July 11, 2008 7:54 AM

To: Thompson, Bruce C., DGF; Warren, Alvin, DIA; Kiger, Stephanie P, DIA; 'ddapr@nmda.nmsu.edu'; 'Linda_Rundell@nm.blm.gov'; 'psisneros@nmag.gov'; 'Isouthard@nmag.gov'; 'r@rthicksconsult.com'; 'sricdon@earthlink.net'; 'nmparks@state.nm.us'; Dantonio, John, OSE; 'sreid@nmoga.org'; Martinez, Elysia, NMENV; 'lazarus@glorietageo.com'; Stone, Marissa, NMENV; 'ron.dutton@xcelenergy.com'; 'cgarcia@fs.fed.us'; 'jbarnett@barnettwater.com'; Kieling, John, NMENV; 'bsg@garbhall.com'; Olson, Bill, NMENV; 'claudette.horn@pnm.com'; 'ekendrick@montand.com'; 'staff@ipanm.org'; Williams, Chris, EMNRD; Johnson, Larry, EMNRD; Gum, Tim, EMNRD; Bratcher, Mike, EMNRD; Perrin, Charlie, EMNRD; Powell, Brandon, EMNRD; Martin, Ed, EMNRD; 'dseawright@gmail.com'; 'jharris@rwdhc.com'

Cc: 'Moore, Darrell'; Monzeglio, Hope, NMENV; Price, Wayne, EMNRD

Subject: Navajo Refining Company- Artesia Refinery (GW-028) Discharge Permit Renewal

Ladies and Gentlemen:

The New Mexico Oil Conservation Division (OCD) recently posted a draft discharge permit, public notice and administrative completeness letter on its website at <u>http://www.emnrd.state.nm.us/ocd/ENV-DraftPublicEtc.htm</u> for the above subject facility.

For more information about this facility, please go to OCD Online at http://ocdimage.emnrd.state.nm.us/imaging/AEOrderFileView.aspx?appNo=pENV000GW00029. (enter "GW" and "28").

Please contact me if you have questions. Thank you.

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505 Office: (505) 476-3491 Fax: (505) 476-3462 E-mail: <u>CarlJ.Chavez@state.nm.us</u> Website: <u>http://www.emnrd.state.nm.us/ocd/index.htm</u> (Pollution Prevention Guidance is under "Publications") New Mexico Energy, Minerals and Natural Resources Department

Bill Richardson Governor

Joanna Prukop Cabinet Secretary Reese Fullerton Deputy Cabinet Secretary Mark Fesmire Division Director Oil Conservation Division



July 10, 2008

Mr. Darrell Moore Environmental Manager for Water & Waste Navajo Refining Company- Artesia Refinery P.O. Box 159 Artesia, New Mexico 88211

Re: Discharge Plan Renewal Permit (GW-028) Navajo Refining Company- Artesia Refinery Eddy County, New Mexico

Dear Mr. Moore:

The New Mexico Oil Conservation Division (NMOCD) has received Navajo Refining Company's request and initial fee, dated June 27, 2006, to renew GW-028 for the Navajo Refining Company- Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico. The initial submittal provided the required information in order to deem the application "administratively" complete.

Therefore, the New Mexico Water Quality Control Commission regulations (WQCC) notice requirements of 20.6.2.3108 NMAC must be satisfied and demonstrated to the NMOCD. NMOCD will provide public notice pursuant to the WQCC notice requirements of 20.6.2.3108 NMAC to determine if there is any public interest.

If there are any questions regarding this matter, please do not hesitate to contact me at (505) 476-3491 or <u>carlj.chavez@state.nm.us</u>. On behalf of the staff of the NMOCD, I wish to thank you and your staff for your cooperation during this discharge permit review.

Sincerely,

Coul A. Chaver

Carl J.^eChávez Environmental Engineer

CJC/cjc

xc: OCD District Office





REFINING COMPANY, LLC

(575) 746-5283 DIV. ORDERS (575) 746-5481 TRUCKING (575) 746-5458 PERSONNEL

501 EAST MAIN STREET • P. O. BOX 159 ARTESIA, NEW MEXICO 88211-0159 TELEPHONE (575) 748-3311 FAX (575) 746-5419 ACCOUNTING (575) 746-5451 ENV/PURCH/MKTG (575) 746-5421 ENGINEERING

May 20, 2008

Wayne Price Environmental Bureau Chief New Mexico Energy, Minerals and Natural Resources Department Oil Conservation Division 1220 South St. Francis Drive Santa Fe, NM 87505

Certified Mail/Return Receipt 7002 0510 0002 6870 5838

RE: Alternate Storage Tank Containment Proposal Navajo Refining Company, L.L.C. 7002 0510 0002 6870 5838 t

Dear Wayne:

This letter is a follow-up to our meeting with Carl Chavez on May 8, 2008 concerning the renewal of Discharge Permits GW-028 for the Artesia Refinery and GW-014 for the Lovington Refinery. During the meeting we discussed OCD's expected inclusion of permit conditions requiring Navajo to install liners under the tanks and throughout the bermed areas at the refineries and to complete the retrofit by the end of the permit term, now expected to be 3 years.

As we discussed, Navajo has serious questions about OCD's authority to require those measures as part of a discharge permit issued under the Water Quality Act and believes that it is appropriately addressing OCD's concerns through the implementation of operational measures. The Water Quality Act, NMSA 1978, §74-6-5 (2005) and the WQCC regulations, 20.6.2 NMAC, only authorize OCD to place reasonable conditions in a discharge permit related to the discharge for which the permit is sought. *See Phelps Dodge Tyrone v. New Mexico Water Quality Control Commission*, 2006-NMCA-115, 140 N.M. 464, 470, 143 P3d 502, 509. Navajo is unaware of any authority to the contrary and requests that you advise us on the legal and technical bases for the condition.

Based on our review, Navajo believes the proposed conditions to be unreasonable. Navajo expects that the conditions will require an expenditure in excess of 25 Million dollars to install the required liners, plus the loss of revenue during the facility down time to retrofit the tanks and berms. The risks associated with potential releases from the tanks do not justify the enormous expenses associated with the installation of liners under the tanks and throughout the bermed areas.

Moreover, Navajo believes that it is unreasonable to complete the retrofit within the next 3 years. While the OCD could issue the permit for a term of 5 years, 20.6.2.3109.H NMAC, even that term is insufficient for Navajo to complete the required retrofits.

During our recent meetings, you stated that the OCD would consider alternatives to a proposed requirement that Navajo Refining Company line the areas underneath our existing product storage tanks and the "bermed" areas surrounding the tanks at the Artesia and Lovington refinery sites. As an alternative to the installation of liners, Navajo proposes that the following measures should be included as options in any OCD order.

1.A. Installation of Leak Detection and Use of Tracer Testing—Navajo has contacted Praxair Services, Inc. to provide a proposal for the installation of leak detection probes underneath each

An Independent Refinery Serving . . . NEW MEXICO • ARIZONA • WEST TEXAS • NORTHERN MEXICO tank at Artesia and Lovington. Praxair's process utilizes a proprietary "tracer" that is injected into the product stored within each tank. Within 24 hours, the probes are sampled and analyzed using gas chromatography, which will detect the "tracer" if a leak exists. This approach is currently being used in various refineries and refined product terminals. Praxair has agreed to present this approach in more detail to the OCD in Santa Fe at your request. If a leak is detected, Navajo will promptly remove the tank from service, clean, inspect and repair according to API 653 standards. If approved by the OCD, Navajo would retrofit all tanks at the Artesia and Lovington Refineries over a period of at least 10 years. As tanks are retrofitted, initial testing would be conducted and then tested at a rate of 20% of the tanks each year for 5 years. We would prioritize the installation to begin the installation on the higher priority tanks, as OCD has suggested.

-- or --

1.B Another alternative would be to retrofit each tank by constructing a double bottom in each tank with leak detection "tell-tales" inserted between the floors and spaced around each tank. This would involve taking the tank out of service, isolating and cleaning for entry, then welding in the new floor on top of the existing floor with a space between the floors. Each tank would then have to be filled with fresh water for hydrotesting, and then discharged to ground upon approval from the OCD. If approved, Navajo would retrofit all tanks at the Artesia and Lovington Refineries over a period of at least 10 years. These improvements would be done during our API 653 inspections described in Item 2.

2. API 653 Inspections—Navajo currently conducts API 653 inspections on its tanks at the recommended 10-year intervals. The tank is emptied, isolated, entered and cleaned to conduct a complete internal inspection by certified inspectors. Navajo proposes to continue to conduct API 653 inspections on our tanks at 10 year intervals. Any problems discovered during those inspections will be addressed promptly.

3. Electronic Tank Level Indicators--Navajo has recently installed electronic tank level indication, complete with High and High High level alarms, on all the storage tanks. Signals from these indicators are sent to a control room and are monitored on a 24 hour 7 day a week basis. Through computer monitoring, an audible alarm immediately brings the high level to the operator's attention, identifying the exact location of the problem. This allows the operator to take immediate action to prevent an overflow condition. In addition, every tank level is physically checked and compared with the electronic level device on a weekly basis to ensure its accuracy. Any noted deviation results in the electronic level device being fully calibrated. Navajo responds rapidly to overflow situations and measures are taken to remove any free liquid and remediate contaminated soil before groundwater can be impacted.

Navajo feels that with the installation of the Praxair Leak Detection Technology, or installing double floors within the tanks, the tank inspection program and the steps taken to minimize overflow situations we will have systems in place to quickly identify leaks and greatly reduce the impact of leaks to ground water at these locations.

Please contact me at 575-746-5497 if you have questions or wish to discuss.

Sincerely, James Resinger

Vice President, Refining

Electronic cc:	Navajo: DGM, JEL Holly: Gary Fuller, David Jelmini, Dave Lamp
cc:	Carl Chaves New Mexico Energy, Minerals and Natural Resources Department Oil Conservation Division 1220 South St Francis Dr., Santa Fe, NM 87505

Environmental File: environmental\$ on 'nmartnas02' (M:) Artesia Discharge Permits – OCD Alternate Proposal Discharge Permit (4) - Clean

.

Chavez, Carl J, EMNRD

From: Moore, Darrell [Darrell.Moore@hollycorp.com]

Sent: Tuesday, June 27, 2006 11:25 AM

To: Chavez, Carl J, EMNRD

Cc: Price, Wayne, EMNRD

Subject: FW: discharge plan

Carl,

Enclosed, please find our renewal notice for our discharge plans for our Lovington and Artesia facilities. Hard copies and filing fees will follow by US Mail. If you have any questions, please call me at 505-746-5281.

60.028

From: Byrd, Jeff Sent: Tuesday, June 27, 2006 11:21 AM To: Moore, Darrell Subject: discharge plan

Jefferson L. Byrd Sr. Environmental Speicialist Navajo Refining - Environmental Department Artesia New Mexico Office - 505-746-5468 Cell - 505-703-5068 District I 1625 N. French Dr., Hobbs, NM 88240 District II 1301 W. Grand Avenue, Artesia, NM 88210 District III 1000 Rio Brazos Road, Aztec, NM 87410 District IV 1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico Energy Minerals and Natural Resources

> Oil Conservation Division 1220 South St. Francis Dr. Santa Fe, NM 87505

Revised June 10, 2003

Submit Original Plus 1 Copy to Santa Fe I Copy to Appropriate District Office

DISCHARGE PLAN APPLICATION FOR SERVICE COMPANIES, GAS PLANTS, REFINERIES, COMPRESSOR, GEOTHERMAL FACILITES AND CRUDE OIL PUMP STATIONS

(Refer to the OCD Guidelines for assistance in completing the application)

New Renewal Modification
1. Type:Oil Refinery
2. Operator: Navajo Refining Company
Address: PO Box 159 Artesia, NM 88211
Contact Person: Darrell Moore Phone: 505-746-5281
3. Location: 4 4 4 4 9 Township 17s Range 26e Submit large scale topographic map showing exact location.
4. Attach the name, telephone number and address of the landowner of the facility site.
5. Attach the description of the facility with a diagram indicating location of fences, pits, dikes and tanks on the facility.
6. Attach a description of all materials stored or used at the facility.
7. Attach a description of present sources of effluent and waste solids. Average quality and daily volume of waste water must be included.
8. Attach a description of current liquid and solid waste collection/treatment/disposal procedures.
9. Attach a description of proposed modifications to existing collection/treatment/disposal systems.
10. Attach a routine inspection and maintenance plan to ensure permit compliance.
11. Attach a contingency plan for reporting and clean-up of spills or releases.
12. Attach geological/hydrological information for the facility. Depth to and quality of ground water must be included.
13. Attach a facility closure plan, and other information as is necessary to demonstrate compliance with any other OCD rules, regulations and/or orders.
14. CERTIFICATIONI hereby certify that the information submitted with this application is true and correct to the best of my knowledge and belief.
Name: <u>Darrell Moore</u> Title: Env. Mgr. for Water & Waste
Signature: Dauel Moore Date: 6/27/06
E-mail Address: <u>darrell.moore@navajo~refining.co</u> m

<u>District 1</u> 1625 N. French Dr., Hobbs, NM 88240 <u>District II</u> 1301 W. Grand Avenue, Artesia, NM 88210 <u>District III</u> 1000 Rio Brazos Road, Aztee, NM 87410 <u>District IV</u> 1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico Energy Minerals and Natural Resources

> Oil Conservation Division 1220 South St. Francis Dr. Santa Fe, NM 87505

Revised June 10, 2003

Submit Original Plus 1 Copy to Santa Fe I Copy to Appropriate District Office

DISCHARGE PLAN APPLICATION FOR SERVICE COMPANIES, GAS PLANTS, REFINERIES, COMPRESSOR, GEOTHERMAL FACILITES AND CRUDE OIL PUMP STATIONS

(Refer to the OCD Guidelines for assistance in completing the application)

New 😰 Renewal 🗌 Modification
1. Type:Oil Refinery
2. Operator: Navajo Refining Company
Address: PO Box 159 Artesia, NM 88211
Contact Person: Darrell Moore Phone: 505-746-5281
3. Location:/4/4 Section 36Township 16sRange 36e Submit large scale topographic map showing exact location.
4. Attach the name, telephone number and address of the landowner of the facility site.
5. Attach the description of the facility with a diagram indicating location of fences, pits, dikes and tanks on the facility.
6. Attach a description of all materials stored or used at the facility.
7. Attach a description of present sources of effluent and waste solids. Average quality and daily volume of waste water must be included.
8. Attach a description of current liquid and solid waste collection/treatment/disposal procedures.
9. Attach a description of proposed modifications to existing collection/treatment/disposal systems.
10. Attach a routine inspection and maintenance plan to ensure permit compliance.
11. Attach a contingency plan for reporting and clean-up of spills or releases.
12. Attach geological/hydrological information for the facility. Depth to and quality of ground water must be included.
13. Attach a facility closure plan, and other information as is necessary to demonstrate compliance with any other OCD rules, regulations and/or orders.
14. CERTIFICATIONI hereby certify that the information submitted with this application is true and correct to the best of my knowledge and belief.
Name: <u>Darrell Moore</u> Title: <u>Env. Mgr. for Water & Waste</u>
Signature: Chull Moore Date: 6/27/06
E-mail Address: <u>darrell.moore@navajo-refining.co</u> m



RIEFINRECONNARY)L.P

AUG 30 2005

FAX (505) 746-5283 DIV. ORDERS (505) 746-5481 TRUCKING (505) 746-5458 PERSONNEL

FAX (505) 746-5419 ACCOUNTING (505) 746-5451 EXEC/MKTG (505) 746-5421 ENGINEERING (505) 746-5480 PIPELINE

Carl J. Chavez, CHMM New Mexico Energy, Minerals & Natural Resources Dept. Oil Conservation Division, Environmental Bureau 1220 South St. Francis Dr., Santa Fe, New Mexico 87505

RE: Discharge Permit Fees, Artesia and Lovington facilities

Dear Carl

Enclosed, please find two \$100 checks for the filing fees for our discharge permits for our facilities at Artesia and Lovington. These fees cover GW-14 and GW-28.

If you have any questions, please call me at 505-746-5281.

Sincerely, NAVAJO REFINING COMPANY

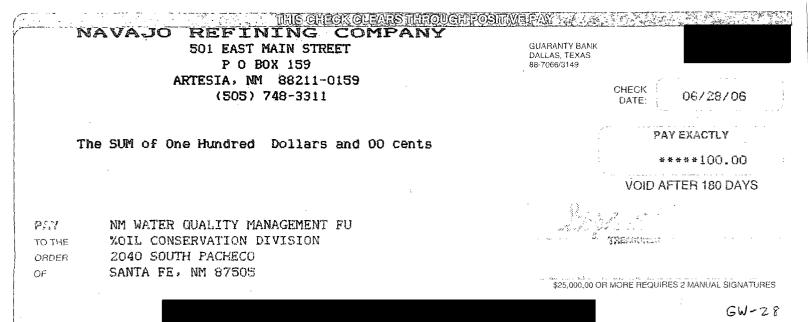
aull Moore

Darrell Moore Environmental Manager for Water and Waste

Encl.

ACKNOWLEDGEMENT OF RECEIPT OF CHECK/CASH

I hereby acknowledge re	ceipt of check No	dated	28/06
or each received on	in the amount of	5 100 <u>00</u>	
MAUAJO	ReFineral C	Q	
6 GW-28	•		
Submitted by: LAW	ente Rome	0 Date. 8/31/2 Date: 8/31/2)6
Submitted to ASD by: 4	Juizon Korr	Date: 8/51/0	6
Received in ASD by:		Date:	
	New Facility		
Filing Fee 🔟		Renewal	
Filing Fee	New Facility	Renewal	
Filing Fee Modification Organization Code	New Facility Other	Renewal licable FY2004	



2151 11

TABATELEWATERWARK

KEVENUE IRANAMILIAL FURM

Description	FUND	CE8	OFA ORG	DEA T	ED ORG	ED ACCT	AMOUNT
CY Reimbursement Project	064	01		· ·			
Gross Receipt Tax	064	01		2329	900000		
Air Quality Title V	092	13	1300	1696	000009	4169134	
	248	14	1400	9696	900000	4969014	
PRP Prepayments	248	14	1400	9696	900000	4969015	
Climax Chemical Co.	248	14	1400	9696	900008		
Circle K Reimbursements	339	27	2700	1698	900000		-
Hazardous Waste Permits	339	27	2700	1896	900000		
Hazardous Waste Annual Generator Fees	341	29	2100	2329	900000		20000
Water Quality - Oil Conservation Division		29	2900	1696	900000		
Water Quality - GW Discharge Permit	341		2500	1696	900000		
Air Quality Permits	631	31	2000	2919	900000	2919033	
Payments under Protest	651	33			900000	2349001	
Zerox Copies	652	34		2349		2349002	
Ground Water Penalties	652	34		2349	900000		
Winess Fees	652	34		2349	900000	2439003	
Air Quality Penalties	652	34		2349	900000	2349004	
OSHA Penalties	652	34		2349	800000	2349005	
Prior Year Reimbursement	652	34		2349	900000	2349006	······
Surface Water Quality Certification	652	34		2349	900000	2340009	فليبعث بمير بروسيت المراجع
Jury Duty	662	34		2349	900000	2349012	والمحادث والمح
CY Reimbursements (I.e. telephone)	652	34	,	2349	900000	2349014	
UST Owner's List	783	24	2500	9696	900000	4969201	
Hazardous Waste Notifiara List	783	24	2500	9096	800000	4969202	
UST Maps	783	24	2500	9696	800000	4989203	
UST Owner's Update	783	24	2500	9696	900000	4989205	·
Hazardous Weste Regulations	783	24	2500	9696	900000	4959207	
Radiologic Tech. Regulations	783	24	2500	9696	900000	4969208	
Superfund CERLIS List	783	24	2500	9696	900000	4869211	
Solid Waste Permit Fees	783	24	2500	9696	900000	4989213	
Smoking School	783	24	2500	9696	800000	4959214	· · · · · · · · · · · · · · · · · · ·
SWQB - NP5 Publications	783	24	2500	9690	900000	4969222	
	783	24	2500	8886	800000	4969228	
Radiation Licensing Regulation	783	24	2500	9696	900000	4969301	
Sale of Equipment	783	24	2500	9696	900000	4969302	
Sale of Automobile	783	24	2500	9696	900000	4969614	**** • • • • • • • • • • • • • • • • •
Lust Recoveries	783	24	2500	9696	900000	4969615	
Lust Repayments	783	24	2500	9696	800000	4969801	
Surface Water Publication				9695	800000	4969242	
Exxon Rese Drive Ruidoso - CAF	783	24	2500	1698	900000	4164032	······································
Emerg, Hazardous Waste Penalties NOV	957	32	9600			-	
Radiologic Tech. Certification	987	05	0500	1696	900000	4169005	
Ust Permit Fees	989	20	3100	1696	900000	4169020	
UST Tank Installers Fees	989	20	3100	1696	900000	4169021	
Food Permit Feas	991	26	2600	1696	900000	4169026	
_ Other			·				
Receipt Tax Required	ect Code Req	ulrod					20000
Person: WAYNY Price	•		345		Date:	8/31	1

Date:

RT #:

.: FSB025 Revised 07/07/00

ST # :

ontact Person:

eceived in ASD By;

ACKNOWLEDGEMENT OF RECEIPT OF CHECX/CASH

I hereby acknowledge receipt of check No. dated $\frac{\partial 8/os/s}{\partial 2}$ or cash received on _____ in the amount of \$ 840 from REFINING CO. for REFINERY GU Submitted by: WAYNE PRICE ____ Date:____ Submitted to ASD by: 1 ____Date: Received in ASD by: _____Date:____ Filing Fee ____ New Facility ____ Renewal ____ Modification ____ Other ____ Organization Code 521.07 Applicable FY 200 To be deposited in the Water Quality Management Fund. Full Payment <u>_____</u> or Annual Increment _____ THIS CHECK CLEARS THROUGH POSITIVE PAY NAVAJO REFINING COMPANY GUARANTY BANK 501 EAST MAIN STREET - DALLAS, TEXAS P 0 BOX 159 88-7066/3149 ARTESIA. NM 88211-0159 CHECK (505) 748-3311 08/05/03 DATE: PAY EXACTLY The SUM of Eight Thousand Four Hundred Dollars and OO cents ****8,400.00 VOID AFTER 180 DAYS PAY NM WATER QUALITY MANAGEMENT FU TO THE %OIL CONSERVATION DIVISION ORDER 2040 SOUTH PACHECO OF SANTA FE, NM 87505 \$25,000.00 OR MORE REQUIRES 2 MANUAL SIGNATURES



NEW MEXICO ENERGY, MINERALS & NATURAL RESOURCES DEPARTMENT



OIL CONSERVATION DIVISION 2040 South Pacheco Street Santa Fe, New Mexico 87505 (505) 827-7131

December 18, 1996

CERTIFIED MAIL RETURN RECEIPT NO. P-288-258-883

Mr. Phillip Youngblood Navajo Refining Company P. O. Drawer 159 Artesia, New Mexico 88211-0159

RE: Discharge Plan GW-028 Permit Condition Amendment Artesia Refinery Eddy County, New Mexico

Dear Mr. Youngblood:

Pursuant to the request received from Navajo Refining Company (Navajo), permit conditions 5 and 13 have been amended. Enclosed are two copies of the conditions of approval with the amended conditions. Please sign and return one copy to the New Mexico Oil Conservation Division (OCD) Santa Fe Office within 10 working days of receipt of this letter.

Please be advised that the amendment of this plan does not relieve Navajo of liability should operations result in pollution of surface water, ground water, or the environment.

The OCD hopes that this has clarified your concern, and we appreciate your input into this process.

Sincerely,

Rogér C. Anderson Environmental Bureau Chief

RCA/mwa

xc: OCD Artesia Office

ATTACHMENT TO THE DISCHARGE PLAN GW-028 RENEWAL NAVAJO REFINING COMPANY ARTESIA REFINERY DISCHARGE PLAN APPROVAL CONDITIONS (AMENDED) (December 18, 1996)

- 1. <u>Payment of Discharge Plan Fees:</u> The \$50 filing fee is due upon receipt of this approval. The \$3,910 flat fee shall be submitted upon receipt of this approval. The required flat fee may be paid in a single payment due at the time of approval, or in equal annual installments over the duration of the plan, with the first payment due upon receipt of this approval.
- 2. <u>Navajo Commitments:</u> Navajo will abide by all commitments submitted in the discharge plan application dated June 19, 1996.
- 3. <u>Reverse Osmosis Reject Water:</u>
 - A. The discharge of reject water from the reverse osmosis treatment facility to Eagle Draw shall not exceed the following standards:

Constituent	Concentration	Unit
Aluminum	87	ug/l
Arsenic	100	ug/l
Beryllium	18	ug/l
Barium	1000	ug/l
Boron	750	ug/l
Cadmium	10	ug/l
Chlordane	0.015	ug/l
Chlorine	30	ug/l
Chromium	50	ug/l
Cobalt	50	ug/l

Copper	1000	ug/l
Cyanide	18	ug/l
Fluoride	1600	ug/l
Iron	1000	ug/l
Manganese	200	ug/l
Lead	6	ug/l
Mercury	0.042	ug/l
Nickel	200	ug/l
NH3 as N	0.07	ug/l
Radium 226+228	30	pCi/l
Selenium	12	ug/l
Silver	0.4	ug/l
Vanadium	282	ug/l
Zinc	10	mg/l
Sulfate	2661	mg/l
Chloride	275	mg/l
Total Dissolved Solids	4555	mg/l
Chemical Oxygen Demand	125	mg/l
рН	6.6 to 8.6	S.U.

- B. Constituents not listed in A. above for which there are standards established pursuant to WQCC Regulation 3103 will not exceed the set numerical standard in that regulation.
- C. No toxic pollutant listed in WQCC regulation 1101 TT. will be present in the discharge.

- D. SAMPLING: samples of the discharge will be taken and analyzed on the following schedule:
 - i. Major cations/anions and heavy metals will be sampled quarterly.
 - ii. All other constituents will be sampled annually.
 - iii. Analysis for all parameters will be pursuant to EPA approved methods.
 - iv. Sampling and analytical QA/QC records will be retained for all sampling events.
 - v. All samples will be "grab" samples.
 - vi. Discharge flow will be monitored and recorded on a daily basis.
 - vii. Sampling frequency can be reduced, on a parameter by parameter basis, upon application and OCD approval provided all analytical data in the previous year was no greater than seventy-five (75) percent of the effluent limit.
 - viii. All samples collected in a monitoring period will be reported.
 - ix. Sampling and flow measurement will be representative of the volume and nature of the discharge.
 - x. Sample data and analytical results will be reported to the OCD on a quarterly basis and are due prior to the 15th day of the month following the calender quarter. (e.g. 1st quarter results are due prior to April 15th).

4. <u>Effluent Pipeline:</u>

- A. Navajo Refining Company will be required to demonstrate integrity of its three-mile long effluent pipeline between the main refinery complex and the disposal ponds by January 1, 1997. Results will be submitted to the OCD by February 14 1997.
- B. Effluent from the pipeline shall be sampled annually where it enters the ponds. Field pH and conductivity shall be measured. Analysis shall include aromatic and halogenated volatile organics, major cations/anions plus fluoride, WQCC metals and PAH's.

5. Product and Waste Disposal:

All recovered product, waste filters or treatment system waste products will be recycled and/or disposed of at an OCD approved facility or in an OCD approved manner. Commercial solid waste from Navajo's offices, warehouses and lunch rooms, which include but is not limited to paper trash, packaging materials, and food scraps along with construction and demolition debris, which include but is not limited to steel, glass, brick, concrete, roofing materials, pipe, wallboard, lumber, rocks, soil, trees and other vegetative matter is approved for disposal at a municipal solid waste facility servicing the area. The disposal of these commercial solid wastes, construction and demolition debris as defined in 20 NMAC 9.1.105.O and T shall not result in a violation of 20 NMAC 9.1.107.C or any other applicable section of the New Mexico solid waste regulations or the New Mexico Oil Conservation Division regulations.

6. Lead Contamination:

A plan and schedule for delineating, testing and disposing of any lead contaminated soil located between tanks 417 and 418 will be submitted to the OCD by February 14, 1997.

- 7. Ground Water and Treatment System Monitoring:
 - A. Ground water from monitor wells, the remediation and the treatment system will be sampled and analyzed according to the following schedule. All water quality sampling will be conducted according to EPA approved protocol and laboratory techniques.

Sampling point	Biweekly	Monthly	Quarterly	Annually
Air Stripper Effluent		601** 602** PAH's		Cations/anions Heavy metals
RA-2723	602**			
RA-4196	······································	602**		
RA-4798		602**		
RA-313*	<u></u>	602**		
RA-314*		602**		
RA-1331*		602**		
RA-307*		602**		
RA-1227*		602**		
RA-3156		l 	602**	

RA-3353	602**	
KWB-1A	601** 602**	PAH's Cation/anions Heavy metals
KWB-1C	601** 602**	PAH's Cation/anions Heavy metals
KWB-2A	601** 602**	PAH's Cation/anions Heavy metals
KWB-3A	601** 602**	PAH's Cation/anions Heavy metals
KWB-7	601** 602**	PAH's Cation/anions Heavy metals
KWB-9	601** 602**	PAH's Cation/anions Heavy metals

* - Sampled during irrigation season

- EPA laboratory method

- B. An annual report will be submitted to the OCD by February 28 of each year. The annual reports will contain:
 - i. A description of the monitoring and remediation activities which occurred during the year including conclusions and recommendations.
 - ii. Summary tables listing past and present laboratory analytic results of all water quality sampling for each monitoring point and plots of concentration vs. time for contaminants of concern from each monitoring point. Copies of the most recent years laboratory analytical data sheets will also be submitted
 - iii. A quarterly water table elevation map using the water table elevation of the ground water in all refinery monitor wells.
 - iv. Plots of water table elevation vs. time for each ground water monitoring point.
 - v. A quarterly product thickness map based on the thickness of free phase product on ground water in all refinery monitor wells.

- vi. The volume of product recovered in the remediation/treatment system during each quarter and the total recovered to date.
- vii. The volume of total fluids pumped from all recovery wells and trenches during each quarter and the total volume recovered to date.
- 8. Drum Storage: All drums containing materials other than fresh water must be stored on an impermeable pad with curbing. All empty drums will be stored on their sides with the bungs in and lined up on a horizontal plane. Chemicals in other containers such as sacks or buckets will also be stored on an impermeable pad and curb type containment. A plan and schedule will be provided to the OCD by February 14, 1997 for properly storing all drums which do not meet OCD requirements.
- 9. <u>Process Areas:</u> All process and maintenance areas which show evidence that leaks and spills are reaching the ground surface must be either paved and curbed or have some type of spill collection device incorporated into the design. A plan and schedule will be provided to the OCD by February 14, 1997 for properly containing all process areas which do not meet OCD requirements.
- 10. <u>Above Ground Tanks:</u> All above ground tanks which contain fluids other than fresh water must be bermed to contain a volume of one-third more than the total volume of the largest tank or of all interconnected tanks. All new facilities or modifications to existing facilities must place the tank on an impermeable type pad within the berm. A plan and schedule will be provided to the OCD by February 14, 1997 for properly containing all above ground tanks which do not meet OCD requirements.
- 11. <u>Above Ground Saddle Tanks:</u> Above ground saddle tanks must have impermeable pad and curb type containment unless they contain fresh water or fluids that are gases at atmospheric temperature and pressure. A plan and schedule will be provided to the OCD by February 14, 1997 for properly containing all above ground saddle tanks which do not meet OCD requirements.
- 12. <u>Labeling:</u> All tanks, drums and containers should be clearly labeled to identify their contents and other emergency information necessary if the tank were to rupture, spill, or ignite. A plan and schedule will be provided to the OCD by February 14, 1997 for properly labeling all tanks, drums and containers which do not meet OCD requirements.
- 13. <u>Below Grade Tanks/Sumps:</u> All below grade tanks, sumps, and pits must be approved by the OCD prior to installation or upon modification and must incorporate secondary containment and leak-detection into the design. All pre-existing sumps and below-grade tanks must demonstrate integrity on an annual basis. Integrity tests include pressure testing to 3 pounds per square inch above normal operating pressure and/or visual inspection of

cleaned out tanks and/or sumps, or other OCD approved methods. The OCD will be notified at least 72 hours prior to all testing so that an OCD representative may witness the testing. All required testing will be completed by December 31, 1996. A plan and schedule will be provided to the OCD by February 14, 1997 for properly containing, repairing and/or replacing all below grade tanks, sumps, and pits which do not meet OCD requirements.

- 14. <u>Underground Process/Wastewater Lines:</u> All underground process/wastewater pipelines must be tested to demonstrate their mechanical integrity at present and then every 5 years there after, or prior to discharge plan renewal. Permittees may propose various methods for testing such as pressure testing to 3 pounds per square inch above normal operating pressure or other means acceptable to the OCD. The OCD will be notified at least 72 hours prior to all testing so that an OCD representative may witness the testing. All required testing will be completed by December 31, 1996. A plan and schedule will be provided to the OCD by February 14, 1997 for properly repairing and/or replacing all below grade lines for which integrity could not be achieved.
- 15. <u>Class V Wells</u>: Leach fields and other wastewater disposal systems at OCD regulated facilities which inject fluid other than domestic waste sewage below the surface are considered Class V injection wells under the EPA UIC program. All class V wells will be closed unless, it can be demonstrated that protectable groundwater will not be impacted in the reasonably foreseeable future. Class V wells must be closed through the Santa Fe Office. The OCD allows industry to submit closure plans which are protective of human health, environment and groundwater as defined by the WQCC, and are cost effective.

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16. <u>Housekeeping:</u> All systems designed for spill collection/prevention should be inspected to ensure proper operation and to prevent overtopping or system failure.

Any non-exempt contaminated soils that are collected at the facility will be tested for hazardous constituents, and after receiving OCD approval, will be disposed of at an OCD approved site.

- 17. <u>Spill Reporting:</u> All spills/releases shall be reported pursuant to OCD Rule 116 and WQCC 1203 to the OCD Artesia District Office.
- 18. <u>Transfer of Discharge Plan</u>: The OCD will be notified prior to any transfer of ownership, control, or possession of a facility with an approved discharge plan. A written commitment to comply with the terms and conditions of the previously approved discharge plan must be submitted by the purchaser and approved by the OCD prior to transfer.
- 19. <u>Closure:</u> The OCD will be notified when operations of the facility are discontinued for a period in excess of six months. Prior to closure of the facility a closure plan will be

submitted for approval by the Director. Closure and waste disposal will be in accordance with the statutes, rules and regulations in effect at the time of closure.

20. <u>Certification:</u> Navajo, by the officer whose signature appears below, accepts this permit and agrees to comply with all terms and conditions contained herein. Navajo further acknowledges that these conditions and requirements of this permit may be changed administratively by the Division for good cause shown as necessary to protect fresh water, human health and the environment.

Accepted:

NAVAJO REFINING COMPANY 22/15/F Title 1/7/97

ACKNOWLEDGEMENT OF RECEIPT OF CHECK/CASH

	I hereby acknowledge	receipt of check No	dated 11/22/96.
	or cash received on _	in t	the amount of \$ <u>7976.00</u>
	from Davajo	Refining	Gw-028
	yar	960,00	GW-014
	Submitted by:		Date:
	Submitted to ASD by:	Rada	Date: 1-24-97
	Received in ASD by:		Date:
	Filing Fee 🔜	New Facility	Reneval X
	Modification	Other	
	To be deposited in t	521.07 App the Water Quality Ma X or Annual Inc.	anagement fund.
N	AVAJO REFINING COMPANY 501 EAST MAIN ST P O BOX 159 ARTESIA NM 88211-0159	· · · ·	NationsBank of Texas N.A. Wichita Falls, TX 76301 CHECK DATE: 11/22/96
****	**Seven Thousand Nine Hundred	i Seventy and no/100*****	PAY EXACTLY \$7,970.00
PAY TO THE ORDER OF	NMED - Water Quality Manage % NMOCD 2040 S. Pacheco Santa Fe, New Mexico 87505		- Kith, HWilher Poge Juan

STATE OF NEW MEXICO

THE STATES

ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION 2040 S. PACHECO SANTA FE, NEW MEXICO 87505 (505) 827-7131

November 13, 1996

CERTIFIED MAIL RETURN RECEIPT NO. P-288-258-861

Mr. Phillip Youngblood Navajo Refining Company P. O. Drawer 159 Artesia, New Mexico 88211-0159

RE: Discharge Plan GW-028 Artesia Refinery Eddy County, New Mexico

Dear Mr. Youngblood:

The groundwater discharge plan renewal, GW-028, for the Navajo Refining Company (Navajo) Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico, is hereby approved under the conditions contained in the enclosed attachment. The discharge plan consists of the original discharge plan as approved October 21, 1991, and the discharge plan renewal application dated June 19, 1996. Enclosed are two copies of the conditions of approval. Please sign and return one copy to the New Mexico Oil Conservation Division (OCD) Santa Fe Office within five working days of receipt of this letter.

The discharge plan was submitted pursuant to Section 3106 of the New Mexico Water Quality Control Commission (WQCC) Regulations. It is approved pursuant to Section 3109.A. Please note Sections 3109.E and 3109.F., which provide for possible future amendments or modifications of the plan. Please be advised that approval of this plan does not relieve Navajo of liability should operations result in pollution of surface water, ground water, or the environment.

Please be advised that all exposed pits, including lined pits and open tanks (tanks exceeding 16 feet in diameter), shall be screened, netted, or otherwise rendered nonhazardous to wildlife including migratory birds.





Mr. Philip Youngblood November 13, 1996 Page 2

Please note that Section 3104 of the regulations require "When a facility has been approved, discharges must be consistent with the terms and conditions of the plan." Pursuant to Section 3107.C. Navajo is required to notify the Director of any facility expansion, production increase, or process modification that would result in any change in the discharge of water quality or volume.

Pursuant to Section 3109.G.4., this plan is for a period of five years. This approval will expire on October 21, 2001, and Navajo should submit an application in ample time before this date. Note that under Section 3106.F. of the regulations, if a discharger submits a discharge plan renewal application at least 120 days before the discharge plan expires and is in compliance with the approved plan, then the existing discharge plan will not expire until the application for renewal has been approved or disapproved. It should be noted that all discharge plan facilities will be required to submit the results of an underground drainage testing program as a requirement for discharge plan renewal.

The discharge plan renewal application for the Navajo Refining Company Artesia Refinery is subject to WQCC Regulation 3114. Every billable facility submitting a discharge plan will be assessed a fee equal to the filing fee of \$50 plus one half of the flat fee or \$3,910 for refineries. The OCD has not received the \$50 filing fee or the \$3,910 flat fee. The \$50 filing fee is due upon receipt of this approval. The flat fee of \$3,910 may be paid in a single payment due on the date of the discharge plan approval or in five equal installments over the expected duration of the discharge plan. Installment payments shall be remitted yearly, with the first installment due on the date of the discharge plan approval and subsequent installments due on this date of each calendar year.

Please make all checks payable to: **NMED-Water Quality Management** and addressed to the OCD Santa Fe Office.

On behalf of the staff of the OCD, I wish to thank you and your staff for your cooperation during this discharge plan review.

Sincerely William J. Le Director WJL/mwa Attachment

xc: OCD Artesia Office

ATTACHMENT TO THE DISCHARGE PLAN GW-028 RENEWAL NAVAJO REFINING COMPANY ARTESIA REFINERY DISCHARGE PLAN APPROVAL CONDITIONS (November 13, 1996)

- 1. <u>Payment of Discharge Plan Fees:</u> The \$50 filing fee is due upon receipt of this approval. The \$3,910 flat fee shall be submitted upon receipt of this approval. The required flat fee may be paid in a single payment due at the time of approval, or in equal annual installments over the duration of the plan, with the first payment due upon receipt of this approval.
- 2. <u>Navajo Commitments:</u> Navajo will abide by all commitments submitted in the discharge plan application dated June 19, 1996.
- 3. <u>Reverse Osmosis Reject Water:</u>
 - A. The discharge of reject water from the reverse osmosis treatment facility to Eagle Draw shall not exceed the following standards:

Constituent	Concentration	Unit
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Boron	750	ug/l
Cadmium	10	ug/l
Chlordane	0.015	ug/l
Chlorine	30	ug/l
Chromium	50	ug/l
Cobalt	50	ug/l

		the second s
Copper	1000	ug/l
Cyanide	18	ug/l
Fluoride	1600	ug/l
Iron	1000	ug/l
Manganese	200	ug/l
Lead	6	ug/l
Mercury	0.042	ug/l
Nickel	200	ug/l
NH3 as N	0.07	ug/l
Radium 226+228	30	pCi/l
Selenium	12	ug/1
Silver	0.4	ug/l
Vanadium	282	ug/l
Zinc	10	mg/l
Sulfate	2661	mg/1
Chloride	275	mg/l
Total Dissolved Solids	4555	mg/1
Chemical Oxygen Demand	125	mg/l
рН	6.6 to 8.6	S.U.

- B. Constituents not listed in A. above for which there are standards established pursuant to WQCC Regulation 3103 will not exceed the set numerical standard in that regulation.
- C. No toxic pollutant listed in WQCC regulation 1101 TT. will be present in the discharge.

9

- D. SAMPLING: samples of the discharge will be taken and analyzed on the following schedule:
 - i. Major cations/anions and heavy metals will be sampled quarterly.
 - ii. All other constituents will be sampled annually.
 - iii. Analysis for all parameters will be pursuant to EPA approved methods.
 - iv. Sampling and analytical QA/QC records will be retained for all sampling events.
 - v. All samples will be "grab" samples.
 - vi. Discharge flow will be monitored and recorded on a daily basis.
 - vii. Sampling frequency can be reduced, on a parameter by parameter basis, upon application and OCD approval provided all analytical data in the previous year was no greater than seventy-five (75) percent of the effluent limit.
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 - ix. Sampling and flow measurement will be representative of the volume and nature of the discharge.
 - x. Sample data and analytical results will be reported to the OCD on a quarterly basis and are due prior to the 15th day of the month following the calender quarter. (e.g. 1st quarter results are due prior to April 15th).

4. Effluent Pipeline:

- A. Navajo Refining Company will be required to demonstrate integrity of its three-mile long effluent pipeline between the main refinery complex and the disposal ponds by January 1, 1997. Results will be submitted to the OCD by February 14 1997.
- B. Effluent from the pipeline shall be sampled annually where it enters the ponds. Field pH and conductivity shall be measured. Analysis shall include aromatic and halogenated volatile organics, major cations/anions plus fluoride, WQCC metals and PAH's.

5. <u>Product and Waste Disposal:</u>

All recovered product, waste filters or treatment system waste products will be recycled and/or disposed of at an OCD approved facility or in an OCD approved manner.

6. Lead Contamination:

A plan and schedule for delineating, testing and disposing of any lead contaminated soil located between tanks 417 and 418 will be submitted to the OCD by February 14, 1997.

7. Ground Water and Treatment System Monitoring:

A. Ground water from monitor wells, the remediation and the treatment system will be sampled and analyzed according to the following schedule. All water quality sampling will be conducted according to EPA approved protocol and laboratory techniques.

Sampling point	Biweekly	Monthly	Quarterly	Annually
Air Stripper Effluent		601** 602** PAH's		Cations/anions Heavy metals
RA-2723	602**			
RA-4196		602**		
RA-4798		602**		
RA-313*		602**		
RA-314*		602**		
RA-1331*		602**		
RA-307*		602**		
RA-1227*		602**		
RA-3156			602**	
RA-3353			602**	
KWB-1A			601** 602**	PAH's Cation/anions Heavy metals
KWB-1C			601** 602**	PAH's Cation/anions Heavy metals

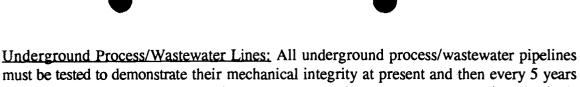
KWB-2A	601** 602**	PAH's Cation/anions Heavy metals
KWB-3A	601** 602**	PAH's Cation/anions Heavy metals
KWB-7	601** 602**	PAH's Cation/anions Heavy metals
KWB-9	601** 602**	PAH's Cation/anions Heavy metals

Sampled during irrigation season

- EPA laboratory method

- B. An annual report will be submitted to the OCD by February 28 of each year. The annual reports will contain:
 - i. A description of the monitoring and remediation activities which occurred during the year including conclusions and recommendations.
 - ii. Summary tables listing past and present laboratory analytic results of all water quality sampling for each monitoring point and plots of concentration vs. time for contaminants of concern from each monitoring point. Copies of the most recent years laboratory analytical data sheets will also be submitted
 - iii. A quarterly water table elevation map using the water table elevation of the ground water in all refinery monitor wells.
 - iv. Plots of water table elevation vs. time for each ground water monitoring point.
 - v. A quarterly product thickness map based on the thickness of free phase product on ground water in all refinery monitor wells.
 - vi. The volume of product recovered in the remediation/treatment system during each quarter and the total recovered to date.
 - vii. The volume of total fluids pumped from all recovery wells and trenches during each quarter and the total volume recovered to date.

- 8. <u>Drum Storage:</u> All drums containing materials other than fresh water must be stored on an impermeable pad with curbing. All empty drums will be stored on their sides with the bungs in and lined up on a horizontal plane. Chemicals in other containers such as sacks or buckets will also be stored on an impermeable pad and curb type containment. A plan and schedule will be provided to the OCD by February 14, 1997 for properly storing all drums which do not meet OCD requirements.
- 9. <u>Process Areas:</u> All process and maintenance areas which show evidence that leaks and spills are reaching the ground surface must be either paved and curbed or have some type of spill collection device incorporated into the design. A plan and schedule will be provided to the OCD by February 14, 1997 for properly containing all process areas which do not meet OCD requirements.
- 10. <u>Above Ground Tanks:</u> All above ground tanks which contain fluids other than fresh water must be bermed to contain a volume of one-third more than the total volume of the largest tank or of all interconnected tanks. All new facilities or modifications to existing facilities must place the tank on an impermeable type pad within the berm. A plan and schedule will be provided to the OCD by February 14, 1997 for properly containing all above ground tanks which do not meet OCD requirements.
- 11. <u>Above Ground Saddle Tanks:</u> Above ground saddle tanks must have impermeable pad and curb type containment unless they contain fresh water or fluids that are gases at atmospheric temperature and pressure. A plan and schedule will be provided to the OCD by February 14, 1997 for properly containing all above ground saddle tanks which do not meet OCD requirements.
- 12. <u>Labeling:</u> All tanks, drums and containers should be clearly labeled to identify their contents and other emergency information necessary if the tank were to rupture, spill, or ignite. A plan and schedule will be provided to the OCD by February 14, 1997 for properly labeling all tanks, drums and containers which do not meet OCD requirements.
- 13. <u>Below Grade Tanks/Sumps:</u> All below grade tanks, sumps, and pits must be approved by the OCD prior to installation or upon modification and must incorporate secondary containment and leak-detection into the design. All pre-existing sumps and below-grade tanks must demonstrate integrity on an annual basis. Integrity tests include pressure testing to 3 pounds per square inch above normal operating pressure and/or visual inspection of cleaned out tanks and/or sumps. The OCD will be notified at least 72 hours prior to all testing so that an OCD representative may witness the testing. All required testing will be completed by December 31, 1996. A plan and schedule will be provided to the OCD by February 14, 1997 for properly containing, repairing and/or replacing all below grade tanks, sumps, and pits which do not meet OCD requirements.



- 14. <u>Underground Process/Wastewater Lines:</u> All underground process/wastewater pipelines must be tested to demonstrate their mechanical integrity at present and then every 5 years there after, or prior to discharge plan renewal. Permittees may propose various methods for testing such as pressure testing to 3 pounds per square inch above normal operating pressure or other means acceptable to the OCD. The OCD will be notified at least 72 hours prior to all testing so that an OCD representative may witness the testing. All required testing will be completed by December 31, 1996. A plan and schedule will be provided to the OCD by February 14, 1997 for properly repairing and/or replacing all below grade lines for which integrity could not be achieved.
- 15. <u>Class V Wells</u>: Leach fields and other wastewater disposal systems at OCD regulated facilities which inject fluid other than domestic waste sewage below the surface are considered Class V injection wells under the EPA UIC program. All class V wells will be closed unless, it can be demonstrated that protectable groundwater will not be impacted in the reasonably foreseeable future. Class V wells must be closed through the Santa Fe Office. The OCD allows industry to submit closure plans which are protective of human health, environment and groundwater as defined by the WQCC, and are cost effective.
- 16. <u>Housekeeping:</u> All systems designed for spill collection/prevention should be inspected to ensure proper operation and to prevent overtopping or system failure.

Any non-exempt contaminated soils that are collected at the facility will be tested for hazardous constituents, and after receiving OCD approval, will be disposed of at an OCD approved site.

- 17. <u>Spill Reporting:</u> All spills/releases shall be reported pursuant to OCD Rule 116 and WQCC 1203 to the OCD Artesia District Office.
- 18. <u>Transfer of Discharge Plan:</u> The OCD will be notified prior to any transfer of ownership, control, or possession of a facility with an approved discharge plan. A written commitment to comply with the terms and conditions of the previously approved discharge plan must be submitted by the purchaser and approved by the OCD prior to transfer.
- 19. <u>Closure:</u> The OCD will be notified when operations of the facility are discontinued for a period in excess of six months. Prior to closure of the facility a closure plan will be submitted for approval by the Director. Closure and waste disposal will be in accordance with the statutes, rules and regulations in effect at the time of closure.





20. <u>Certification:</u> Navajo, by the officer whose signature appears below, accepts this permit and agrees to comply with all terms and conditions contained herein. Navajo further acknowledges that these conditions and requirements of this permit may be changed administratively by the Division for good cause shown as necessary to protect fresh water, human health and the environment.

Accepted:

NAVAJO REFINING COMPANY

by_

Title



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JUN 3 0 200? OIL CONSERVATION DIVISION

April 17, 2003

الأفجيج والمعجب والمعرفين فالتدو

CERTIFIED MAIL RETURN RECEIPT NO. 5357 7133

Mr. Darrell Moore Environmental Manager for Water and Waste Navajo Refining Company L.P. P.O. Box 159 Artesia, New Mexico 88211-0159

RE: Discharge Permit GW-028 Artesia Refinery Eddy County, New Mexico

Dear Mr. Moore:

The groundwater discharge permit renewal, GW-028, for the Navajo Refining Company L.P. (Navajo) Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico, is hereby approved under the conditions contained in the enclosed attachment. Enclosed are two copies of the conditions of approval. Please sign and return one copy to the New Mexico Oil Conservation Division (OCD) Santa Fe Office within 30 working days of receipt of this letter.

The original discharge permit was approved on October 21, 1991 with an expiration date of October 21, 1996. The discharge permit renewal application dated June 20, 2001 including attachments, and subsequent information dated March 15, 2002, discharge permit addendum dated May 31, 2002 submitted pursuant to Section 3106 of the New Mexico Water Quality Control Commission (WQCC) Regulations also includes all earlier applications and all conditions later placed on those approvals.

The discharge permit is renewed pursuant to Section 3109.C. Please note Section 3109.G, which provides for possible future amendment of the permit. Please be advised that approval of this permit does not relieve Navajo Refining Company L.P. of responsibility should operations result in pollution of surface water, ground water or the environment. Nor does it relieve Navajo Refining Company L.P. of its responsibility to comply with any other governmental authority's rules and regulations. Please be advised that all exposed pits, including lined pits and open top tanks (exceeding 16 feet in diameter) shall be screened, netted, or otherwise rendered nonhazardous to wildlife including migratory birds.





Please note that Section 3104. of the regulations requires that "when a permit has been approved, discharges must be consistent with the terms and conditions of the permit." Pursuant to Section 3107.C., Navajo Refining Company L.P. is required to notify the Director of any facility expansion, production increase, or process modification that would result in any change in the discharge of water quality or volume.

Pursuant to Section 3109.H.4., this approval is for a period of five years. **This approval will expire October 21, 2006** and an application for renewal should be submitted in ample time before that date. Pursuant to Section 3106.F. of the regulations, if a discharger submits a discharge permit renewal application at least 120 days before the discharge permit expires and is in compliance with the approved permit, then the existing discharge permit will not expire until the application for renewal has been approved or disapproved.

The discharge permit application for the Navajo Refining Company L.P., Artesia Refinery is subject to the WQCC Regulation 3114. Every billable facility submitting a discharge permit will be assessed a fee equal to the filing fee of \$100.00 plus flat fee of \$8400.00 for Oil Refineries. The OCD has not received the \$8400.00 flat fee.

Please make all checks payable to: Water Quality Management Fund C/o: Oil Conservation Division 2040 South Pacheco Santa Fe, New Mexico 87505.

If you have any questions, please contact Wayne Price of my staff at (505-476-3487) or E-mail WPRICE@state.nm.us. On behalf of the staff of the OCD, I wish to thank you and your staff for your cooperation during this discharge permit review.

Sincerely,

Roger C. Anderson Environmental Bureau Chief RCA/lwp Attachment-1 xc: OCD Artesia Office

ATTACHMENT TO THE DISCHARGE PERMIT GW-028 APPROVAL Navajo Refining Company L.P., Artesia Refinery DISCHARGE PERMIT APPROVAL CONDITIONS April 17, 2003

- 1. Payment of Discharge Permit Fees: The \$100.00 filing fee has been received by the OCD. There is a required flat fee of \$8400.00 for Oil Refineries. The fee may be paid in a single payment due at the time of approval, or in equal annual installments over the duration of the discharge plan, with the first payment due upon receipt of this approval. OCD recommends that Navajo pay the required flat fee 30 days after permit approval. If Navajo chooses to make annual payments then OCD will require documentation of payment to be included in the annual report.
- 2. <u>Commitments:</u> Navajo Refining Company L.P. will abide by all commitments submitted in the discharge permit renewal application dated June 20, 2001 including attachments, subsequent information dated March 15, 2002, discharge permit addendum dated May 31, 2002 and these conditions for approval.
- 3. Drum Storage: All drums containing materials other than fresh water must be stored on an impermeable pad with curbing. All empty drums should be stored on their sides with the bungs in place and lined up on a horizontal plane. Chemicals in other containers such as sacks or buckets must also be stored on an impermeable pad with curbing.
- 4. <u>Process Areas:</u> All process and maintenance areas which show evidence that leaks and spills are reaching the ground surface must be either paved and curbed or have some type of spill collection device incorporated into the design.
- 5. <u>Above Ground Tanks</u>: All above ground tanks which contain fluids other than fresh water must be bermed to contain a volume of one-third more than the total volume of the largest tank or of all interconnected tanks. All new facilities or modifications to existing facilities must place the tank on an impermeable type pad within the berm.
- 6. <u>Above Ground Saddle Tanks</u>: Above ground saddle tanks must have impermeable pad and curb type containment unless they contain fresh water or fluids that are gases at atmospheric temperature and pressure.

- 7. Labeling: All tanks, drums, and other containers should be clearly labeled to identify their contents and other emergency information necessary if the tank were to rupture, spill, or ignite. OCD will allow master plans to be used that identifies all tanks, location, size and contents with a numbering system marked on the tanks which corresponds to plot plans contained in the plan.
- 8. Below Grade Tanks/Sumps/Pits/Ponds: All below grade tanks, sumps, pits and ponds must be approved by the OCD prior to installation or upon modification and must incorporate secondary containment and leak-detection into the design. All below grade tanks, sumps and pits must be tested annually or as specified below (Additional Conditions), except systems that have secondary containment with leak detection. These systems with leak detection shall have a monthly inspection of the leak detection to determine if the primary containment is leaking. Results of tests and inspections shall be maintained at the facility covered by this discharge plan and available for NMOCD inspection. Any system found to be leaking shall be reported pursuant to Item # 12. Permit holders may propose various methods for testing such as pressure testing to 3 pounds per square inch above normal operating pressure and/or visual inspection of cleaned out tanks and/or sumps, or other OCD approved methods. The OCD will be notified at least 72 hours prior to all testing.

APL Separators: A closure plan for OCD approval shall be filed by February 28, 2004 for the Old API separator (South Plant), the North and South Plant current API Separators and the Wastewater Plant Separator.

New Wastewater (Total Plant) API Separator: Navajo must conform to permit condition Item #8. above.

Additional Conditions: Navajo shall develop a spreadsheet that contains all underground tanks/sumps/pits. Each device or system shall have an identification number, drawing reference, date installed, test dates, test method, pass/fail/repair information with signature, and investigation results if applicable. Navajo shall test at a minimum 20% of the total below grade devices each year.

9. Underground Process/Wastewater Lines: All underground process/wastewater pipelines including the effluent pipeline between the main refinery complex and the disposal wells, must be approved by the OCD prior to installation and must be tested to demonstrate their mechanical integrity every five (5) years. Results of such tests shall be maintained at the facility covered by this discharge plan and available for NMOCD inspection. Permit holders may propose various methods for testing such as pressure testing to 3 pounds per square inch above normal operating pressure or other means acceptable to the OCD. The OCD will be notified at least 72 hours prior to all testing.

Additional Conditions: Navajo shall develop a spreadsheet that contains all underground process and wastewater lines. Each line shall have an identification number, drawing reference, date installed, test dates, test method, pass/fail/repair information with signature, and investigation results if applicable. Navajo shall test at a minimum 20% of the underground process/wastewater pipelines each year.

- 10. Class V Wells: No Class V wells that inject non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes will be approved for construction and/or operation unless it can be demonstrated that groundwater will not be impacted in the reasonably foreseeable future. Leach fields and other wastewater disposal systems at OCD regulated facilities which inject non-hazardous fluid into or above an underground source of drinking water are considered Class V injection wells under the EPA UIC program. Class V wells that inject domestic waste only must be permitted by the New Mexico Environment Department.
- 11. Housekeeping: All systems designed for spill collection/prevention, and leak detection will be inspected monthly to ensure proper operation and to prevent over topping or system failure. All open to atmosphere spill collection devices will be emptied of fluids, other than rainwater, within 48 hours of discovery. Enclosed secondary containment devices shall be emptied of all fluids within 48 hours to ensure that the primary device is not leaking. A record of inspection will be retained on site for a period of five years.
- 12. Spill Reporting: All spills/releases shall be reported pursuant to OCD Rule 116. and WQCC 1203. to the OCD Artesia District Office.
- 13. Waste Disposal: All wastes will be disposed of at an OCD approved facility. Only oilfield exempt wastes shall be disposed of down Class II injection wells. Non-exempt oilfield wastes that are non-hazardous may be disposed of at an OCD approved facility upon proper waste determination per 40 CFR Part 261. Any waste stream that is not listed in the discharge permit will be approved by OCD on a case-by-case basis.

OCD is attaching a copy of the Non-Hazardous Material Flow Diagram supplied in the discharge plan addendum dated May 31, 2002.

Rule 712 Waste: Pursuant to Rule 712, disposal of certain non-domestic waste is allowed at solid waste facilities permitted by the New Mexico Environment Department as long as the waste stream is identified in the discharge permit, and existing process knowledge of the waste stream does not change without notification to the Oil Conservation Division. The following waste is hereby approved: Solid Waste (Trash/Refuse).

- 14. <u>OCD Inspections:</u> Additional requirements may be placed on the facility based upon results from OCD inspections.
- 15. Storm Water Plan: Navajo Refining Company L.P. shall maintain stormwater runoff controls. As a result of operations if any water contaminant that exceeds the WQCC standards listed in 20 NMAC 6.2.3101 is discharged in any stormwater run-off then Navajo shall notify the OCD within 24 hours, modify the permit within 15 days and submit for OCD approval. Navajo shall also take immediate corrective actions pursuant to Item 12 of these conditions.

Unlined Stormwater Retention Basins: These basins shall be lined, monitored, and records maintained pursuant to Item #8 of these conditions of approval or Navajo may propose an alternate method subject to OCD approval.

- 16. Reverse Osmosis Reject Water:
 - A. The discharge of reject water from the reverse osmosis treatment facility to Navajo Farms shall not exceed the following standards: **Discharge to Eagle Draw is prohibited.**

Constituent	Concentration	Unit
Aluminum	87	ug/l
Arsenic	100	ug/l
Beryllium	18	ug/l
Barium	1000	ug/l
Boron	750	ug/l

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Cadmium	10	ug/l
Chlordane	0.015	ug/l
Chlorine	30	ug/l
Chromium	50	ug/l
Cobalt	50	ug/l
Copper	1000	ug/l
Cyanide	18	ug/l
Fluoride	2500 *	ug/l
Iron	1000	ug/l
Manganese	200	ug/l
Lead	6	ug/l
Mercury	0.042	ug/l
Nickel	200	ug/l
NH3 as N	0.07	ug/l
Radium 226+228	30	pCi/l
Selenium	12	ug/l
Silver	0.4	ug/l
Vanadium	282	ug/l
Zinc	10	mg/l
Sulfate	2661	mg/l
Chloride	275	mg/l
Total Dissolved Solids	4555	mg/l
Chemical Oxygen Demand	125	mg/l
pH	6.6 to 8.6	S.U.

Bod	< 30	mg/l
TSS	<.5	mg/l
Fecal Coloform Bacteria	<500 organisms	Per/ 100 ml

*Amended June 29, 1993

- B. Constituents not listed in A. above for which there are standards established pursuant to WQCC Regulation 3103 will not exceed the set numerical standard in that regulation.
- C. No toxic pollutant listed in WQCC regulation 1101 TT. will be present in the discharge.
- D. SAMPLING: samples of the discharge will be taken and analyzed on the following schedule:
 - i. Major cations/anions and heavy metals will be sampled at a minimum of semi-annually.
 - ii. All other constituents will be sampled annually, including the constituents in the above table and Volatile, Semi-Volatile Organic Compounds including Pesticides using EPA methods 624,625 and 608 respectively.
 - iii. Analysis for all parameters will be pursuant to EPA approved methods.
 - iv. Sampling and analytical QA/QC records will be retained for all sampling events.
 - v. All samples will be "grab" samples.
 - vi. Discharge flow will be monitored and recorded on a daily basis.
 - vii. Sampling frequency can be reduced, on a parameter-by-parameter basis, upon application and OCD approval provided all analytical data in the previous year was no greater than seventy-five (75) percent of the effluent limit.
 - viii. All samples collected in a monitoring period will be reported.
 - ix. Sampling and flow measurement will be representative of the volume and

nature of the discharge.

- x. Any constituent that exceeds the standards listed above shall be cause for Navajo to stop discharging to the farm area and provide OCD immediate notification. Navajo may not resume discharging until the problem has been corrected.
- xi. Sample data, analytical results and flow measurements shall be reported to the OCD in the annual report.
- 17. <u>Vadose Zone and Water Pollution</u>: The previously submitted investigation(s) and remediation permits were submitted pursuant to the discharge permit and all future discoveries of contamination will be addressed through the discharge permit process.

Ground Water and Treatment System Monitoring:

- A. Navajo shall collect perimeter groundwater samples on a semi-annual basis from monitoring wells MW-52, KWB-2R, KWB-13, KWB-9, KWB-3A, KWB-11A, KWB-7, NP-1, NP-2, KWB-45, and MW-18. The samples shall be analyzed for concentrations of benzene, toluene, ethylbenzene and xylene (BTEX), and methyl tertiary butyl ether (MTBE) pursuant to EPA approved methods.
- B. Navajo shall collect groundwater samples on an annual basis from monitoring wells KWB-1A, KWB-1C, KWB-2R, KWB-3A, KWB-4, KWB-5, KWB-6, KWB-8, KWB-9, KWB-10, MW- 18, MW-28, MW-29, MW-45, MW-48, MW-49 and from the following recovery trenches that do not have measurable phase-separated hydrocarbons (PSH's); RW-1 through RW-15, and Bolton Road # 1-4. These samples shall be analyzed for Volatiles, Semi-Volatiles, WQCC Metals, General Chemistry including Major Anions and Cations, nitrate/nitrite, dissolved oxygen and oxidation-reduction potential (ORP) all pursuant to EPA approved methods.
- C. All Recovery Trenches and all wells (including North Colony Landfarm and Tetraethyl-lead wells) with phase-separated hydrocarbons (PSH's) shall be checked at a minimum of once per month and recorded on a spreadsheet. The sheet shall be in table form containing all of the recovery wells, date inspected, product thickness measured to .01 inch, amount of product/water recovered. If product is observed then appropriate steps will be taken to recover product as reasonably possible using the best available technology.

- D. Navajo shall collect groundwater samples from the following irrigation wells at the beginning and end of the irrigation season; RA 313, RA 314, RA3723, RA3156, RA 3353, RA 1331, RA 4196, RA 4798 and Larue well. The samples shall be analyzed for concentrations of benzene, toluene, ethylbenzene and xylene (BTEX), methyl tertiary butyl ether (MTBE), Volitale Organic Compounds (VOC's), Semi-Volatile Compounds, WQCC Metals, General Chemistry including Major Anions and Cations all pursuant to EPA approved methods.
- E. Evaporation Ponds near Pecos River (Out-of-Service): Navajo shall collect perimeter groundwater samples on a bi-annual basis with at least one half of these wells being analyzed each year. The samples shall be analyzed for concentrations of benzene, toluene, ethylbenzene and xylene (BTEX), and methyl tertiary butyl ether (MTBE), Semi-Volatiles, WQCC Metals and General Chemistry including anions and cations pursuant to EPA approved methods. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report.
- F. RCRA Solid Waste Management Units (SMUS) or AREAS OF CONCERN:

Navajo shall collect groundwater samples on a quarterly basis from monitoring wells NCL-32, 33, 34, 44, 49, TEL-1, 2, 3, 4, and from the following monitor wells MW-53, 54A, 55. These samples shall be analyzed for Volatiles, Semi-Volatiles, WQCC Metals, General Chemistry including Major Anions and Cations, nitrate/nitrite, dissolved oxygen and oxidation-reduction potential (ORP) all pursuant to EPA approved methods. Navajo shall incorporate these findings into a summary table with all other monitor points on-site. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report.

- G. <u>ANNUAL REPORT</u>: An annual report will be submitted to the OCD by February 28 of each year. The annual reports will contain:
 - i. A description of the monitoring and remediation activities which occurred during the year including conclusions and recommendations.
 - ii. Summary tables listing past and present laboratory analytic results of all water quality sampling for each monitoring point and plots of concentration vs. time for contaminants of concern from each monitoring point. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report. Copies of the most recent years laboratory analytical data sheets will also be submitted
 - iii. An annual water table potentiometric elevation map using the water table

elevation of the ground water in all refinery monitor wells. A corrected water table elevation shall be determined for all wells containing phase-separated hydrocarbons. This map shall show well locations, pertinent site features, and the direction and magnitude of the hydraulic gradient.

- iv. Plots of water table elevation vs. time for each ground water monitoring point.
- v. A annual product thickness map based on the thickness of free phase product on ground water in all refinery monitor wells. This map shall include isopleth lines for products and contaminants of concern.
- vi. The volume of product recovered in the remediation/treatment system during each quarter and the total recovered to date.
- vii. The volume of total fluids pumped from all recovery wells and trenches during each quarter and the total volume recovered to date.
- viii. <u>Electronic filing:</u> OCD would like to encourage Navajo to file this report in an acceptable electronic format.

H. Additional Requirements:

- i. Up-date all on-site and off-site maps, showing the current status of all recovery/monitor/ domestic, irrigation wells and pertinent features including the stormwater basins.
- ii. Navajo shall investigate the area between monitor well KWB-2R and the refinery to determine if a new remediation recovery trench system is required in this area. The results of this investigation shall be submitted to the OCD by July 15, 2003.
- iii. Replace MW-1 at the evaporation ponds.
- iv. If phase separated hydrocarbons are found east of the Bolton Road recovery system, then a new recovery system shall be installed in this area including down-gradient monitor wells. Any wells that reveal contaminants that exceed WQCC groundwater standards shall be reason to install addition wells to determine the extent of contamination. All new

wells shall be added to the maps and included in the annual report.

- v. Bolton Road recovery trench #1 and 2 were noted to be dry. OCD is concerned that contaminants may be flowing under and past these trenches. Please modify these trenches or install monitor wells directly east of these devices by November 15, 2003.
- vi. Navajo shall investigate the area between RW-10 and RW-5 and the refinery to determine if a new remediation recovery trench system is required in this area. The results of this investigation shall be submitted to the OCD by November 15, 2003.
- vii. Navajo shall install an additional monitor well northeast of MW-45. OCD is concerned about contamination migrating off of Navajo property in this area by November 15, 2003.
- viii. Navajo shall notify the OCD Santa Fe and local district office at least 2 weeks in advance of all scheduled activities such that the OCD has the opportunity to witness the events and split samples. For large facilities, i.e. referinies, an annual notification will suffice.
- ix. Navajo shall notify the NMOCD of the discovery of separated-phase hydrocarbons or the exceedance of a WQCC standard in any down gradient monitor well where separate-phase hydrocarbons were not present or where contaminant concentrations did not exceed WQCC standards during the preceding monitoring event pursuant to NMOCD Rule 116.
- 18. <u>Transfer of Discharge permit:</u> The OCD will be notified prior to any transfer of ownership, control, or possession of a facility with an approved discharge permit. A written commitment to comply with the terms and conditions of the previously approved discharge permit must be submitted by the purchaser and approved by the OCD prior to transfer.
- 19. Closure: The OCD will be notified when operations of the facility are discontinued for a period in excess of six months. Prior to closure of the facility a closure permit will be submitted for approval by the Director. Closure and waste disposal will be in accordance with the statutes, rules and regulations in effect at the time of closure.

20. Certification: Navajo Refining Company L.P. by the officer whose signature appears below, accepts this and agrees to comply with all terms and conditions contained herein. Navajo Refining Company L.P. further acknowledges that these conditions and requirements of this may be changed administratively by the Division for good cause shown as necessary to protect fresh water, human health and the environment.

Conditions accepted by:

Navajo Refining Company L.P.

OHALLIP L. YOUNG BLOD Company Representative- print name / 11 pate 6/25/63 Company Representative- Sign Title 6/1 DIRECTUR DE ENURDONMENTAL AFFAIRS



NEW MEXICO ENERGY, MISERALS and NATURAL RESOURCES DEPARTMENT

BILL RICHARDSON Governor Joanna Prukop Cabinet Secretary

April 17, 2003

Lori Wrotenbery Director Oil Conservation Division

CERTIFIED MAIL RETURN RECEIPT NO. 5357 7133

Mr. Darrell Moore Environmental Manager for Water and Waste Navajo Refining Company L.P. P.O. Box 159 Artesia, New Mexico 88211-0159

RE: Discharge Permit GW-028 Artesia Refinery Eddy County, New Mexico

Dear Mr. Moore:

The groundwater discharge permit renewal, GW-028, for the Navajo Refining Company L.P. (Navajo) Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico, is hereby approved under the conditions contained in the enclosed attachment. Enclosed are two copies of the conditions of approval. Please sign and return one copy to the New Mexico Oil Conservation Division (OCD) Santa Fe Office within 30 working days of receipt of this letter.

The original discharge permit was approved on October 21, 1991 with an expiration date of October 21, 1996. The discharge permit renewal application dated June 20, 2001 including attachments, and subsequent information dated March 15, 2002, discharge permit addendum dated May 31, 2002 submitted pursuant to Section 3106 of the New Mexico Water Quality Control Commission (WQCC) Regulations also includes all earlier applications and all conditions later placed on those approvals.

The discharge permit is renewed pursuant to Section 3109.C. Please note Section 3109.G, which provides for possible future amendment of the permit. Please be advised that approval of this permit does not relieve Navajo Refining Company L.P. of responsibility should operations result in pollution of surface water, ground water or the environment. Nor does it relieve Navajo Refining Company L.P. of its responsibility to comply with any other governmental authority's rules and regulations. Please be advised that all exposed pits, including lined pits and open top tanks (exceeding 16 feet in diameter) shall be screened, netted, or otherwise rendered nonhazardous to wildlife including migratory birds.

Please note that Section 3104. of the regulations requires that "when a permit has been approved, discharges must be consistent with the terms and conditions of the permit." Pursuant to Section 3107.C., Navajo Refining Company L.P. is required to notify the Director of any facility expansion, production increase, or process modification that would result in any change in the discharge of water quality or volume.

Pursuant to Section 3109.H.4., this approval is for a period of five years. **This approval will expire October 21, 2006** and an application for renewal should be submitted in ample time before that date. Pursuant to Section 3106.F. of the regulations, if a discharger submits a discharge permit renewal application at least 120 days before the discharge permit expires and is in compliance with the approved permit, then the existing discharge permit will not expire until the application for renewal has been approved or disapproved.

The discharge permit application for the Navajo Refining Company L.P., Artesia Refinery is subject to the WQCC Regulation 3114. Every billable facility submitting a discharge permit will be assessed a fee equal to the filing fee of \$100.00 plus flat fee of \$8400.00 for Oil Refineries. The OCD has not received the \$8400.00 flat fee.

- IS - TRANSFE - SAMALE (D)		
Please make all checks	payable to: Water Quality Mai	nagement Fund
	C/o: Oil Conser	reation Division
	2040 Sou	ith Pacheco
	Santa Pa	New Mexico 87505.
	Santa re,	INCW MEXICU 67 JUJ.

If you have any questions, please contact Wayne Price of my staff at (505-476-3487) or E-mail WPRICE@state.nm.us. On behalf of the staff of the OCD, I wish to thank you and your staff for your cooperation during this discharge permit review.

Sincerely,

Roger C. Anderson Environmental Bureau Chief RCA/lwp Attachment-1 xc: OCD Artesia Office

ATTACHMENT TO THE DISCHARGE PERMIT GW-028 APPROVAL Navajo Refining Company L.P., Artesia Refinery DISCHARGE PERMIT APPROVAL CONDITIONS April 17, 2003

- 1. Payment of Discharge Permit Fees: The \$100.00 filing fee has been received by the OCD. There is a required flat fee of \$8400.00 for Oil Refineries. The fee may be paid in a single payment due at the time of approval, or in equal annual installments over the duration of the discharge plan, with the first payment due upon receipt of this approval. OCD recommends that Navajo pay the required flat fee 30 days after permit approval. If Navajo chooses to make annual payments then OCD will require documentation of payment to be included in the annual report.
- 2. <u>Commitments:</u> Navajo Refining Company L.P. will abide by all commitments submitted in the discharge permit renewal application dated June 20, 2001 including attachments, subsequent information dated March 15, 2002, discharge permit addendum dated May 31, 2002 and these conditions for approval.
- 3. Drum Storage: All drums containing materials other than fresh water must be stored on an impermeable pad with curbing. All empty drums should be stored on their sides with the bungs in place and lined up on a horizontal plane. Chemicals in other containers such as sacks or buckets must also be stored on an impermeable pad with curbing.
- 4. <u>Process Areas:</u> All process and maintenance areas which show evidence that leaks and spills are reaching the ground surface must be either paved and curbed or have some type of spill collection device incorporated into the design.
- 5. <u>Above Ground Tanks</u>: All above ground tanks which contain fluids other than fresh water must be bermed to contain a volume of one-third more than the total volume of the largest tank or of all interconnected tanks. All new facilities or modifications to existing facilities must place the tank on an impermeable type pad within the berm.
- 6. <u>Above Ground Saddle Tanks</u>: Above ground saddle tanks must have impermeable pad and curb type containment unless they contain fresh water or fluids that are gases at atmospheric temperature and pressure.

- 7. Labeling: All tanks, drums, and other containers should be clearly labeled to identify their contents and other emergency information necessary if the tank were to rupture, spill, or ignite. OCD will allow master plans to be used that identifies all tanks, location, size and contents with a numbering system marked on the tanks which corresponds to plot plans contained in the plan.
- 8. Below Grade Tanks/Sumps/Pits/Ponds: All below grade tanks, sumps, pits and ponds must be approved by the OCD prior to installation or upon modification and must incorporate secondary containment and leak-detection into the design. All below grade tanks, sumps and pits must be tested annually or as specified below (Additional Conditions), except systems that have secondary containment with leak detection. These systems with leak detection shall have a monthly inspection of the leak detection to determine if the primary containment is leaking. Results of tests and inspections shall be maintained at the facility covered by this discharge plan and available for NMOCD inspection. Any system found to be leaking shall be reported pursuant to Item # 12. Permit holders may propose various methods for testing such as pressure testing to 3 pounds per square inch above normal operating pressure and/or visual inspection of cleaned out tanks and/or sumps, or other OCD approved methods. The OCD will be notified at least 72 hours prior to all testing.

APL Separators: A closure plan for OCD approval shall be filed by February 28, 2004 for the Old API separator (South Plant), the North and South Plant current API Separators and the Wastewater Plant Separator.

New Wastewater (Total Plant) API Separator: Navajo must conform to permit condition Item #8. above.

Additional Conditions: Navajo shall develop a spreadsheet that contains all underground tanks/sumps/pits. Each device or system shall have an identification number, drawing reference, date installed, test dates, test method, pass/fail/repair information with signature, and investigation results if applicable. Navajo shall test at a minimum 20% of the total below grade devices each year.

9. Underground Process/Wastewater Lines: All underground process/wastewater pipelines including the effluent pipeline between the main refinery complex and the disposal wells, must be approved by the OCD prior to installation and must be tested to demonstrate their mechanical integrity every five (5) years. Results of such tests shall be maintained at the facility covered by this discharge plan and available for NMOCD inspection. Permit holders may propose various methods for testing such as pressure testing to 3 pounds per square inch above normal operating pressure or other means acceptable to the OCD. The OCD will be notified at least 72 hours prior to all testing.

Additional Conditions: Navajo shall develop a spreadsheet that contains all underground process and wastewater lines. Each line shall have an identification number, drawing reference, date installed, test dates, test method, pass/fail/repair information with signature, and investigation results if applicable. Navajo shall test at a minimum 20% of the underground process/wastewater pipelines each year.

- 10. <u>Class V Wells</u>: No Class V wells that inject non-hazardous industrial wastes or a mixture of industrial wastes and domestic wastes will be approved for construction and/or operation unless it can be demonstrated that groundwater will not be impacted in the reasonably foreseeable future. Leach fields and other wastewater disposal systems at OCD regulated facilities which inject non-hazardous fluid into or above an underground source of drinking water are considered Class V injection wells under the EPA UIC program. Class V wells that inject domestic waste only must be permitted by the New Mexico Environment Department.
- 11. Housekeeping: All systems designed for spill collection/prevention, and leak detection will be inspected monthly to ensure proper operation and to prevent over topping or system failure. All open to atmosphere spill collection devices will be emptied of fluids, other than rainwater, within 48 hours of discovery. Enclosed secondary containment devices shall be emptied of all fluids within 48 hours to ensure that the primary device is not leaking. A record of inspection will be retained on site for a period of five years.
- 12. Spill Reporting: All spills/releases shall be reported pursuant to OCD Rule 116. and WQCC 1203. to the OCD Artesia District Office.
- 13. Waste Disposal: All wastes will be disposed of at an OCD approved facility. Only oilfield exempt wastes shall be disposed of down Class II injection wells. Non-exempt oilfield wastes that are non-hazardous may be disposed of at an OCD approved facility upon proper waste determination per 40 CFR Part 261. Any waste stream that is not listed in the discharge permit will be approved by OCD on a case-by-case basis.

OCD is attaching a copy of the Non-Hazardous Material Flow Diagram supplied in the discharge plan addendum dated May 31, 2002.

Rule 712 Waste: Pursuant to Rule 712, disposal of certain non-domestic waste is allowed at solid waste facilities permitted by the New Mexico Environment Department as long as the waste stream is identified in the discharge permit, and existing process knowledge of the waste stream does not change without notification to the Oil Conservation Division. The following waste is hereby approved: Solid Waste (Trash/Refuse).

- 14. <u>OCD Inspections:</u> Additional requirements may be placed on the facility based upon results from OCD inspections.
- 15. Storm Water Plan: Navajo Refining Company L.P. shall maintain stormwater runoff controls. As a result of operations if any water contaminant that exceeds the WQCC standards listed in 20 NMAC 6.2.3101 is discharged in any stormwater run-off then Navajo shall notify the OCD within 24 hours, modify the permit within 15 days and submit for OCD approval. Navajo shall also take immediate corrective actions pursuant to Item 12 of these conditions.

Unlined Stormwater Retention Basins: These basins shall be lined, monitored, and records maintained pursuant to Item #8 of these conditions of approval or Navajo may propose an alternate method subject to OCD approval.

- 16. Reverse Osmosis Reject Water:
 - A. The discharge of reject water from the reverse osmosis treatment facility to Navajo Farms shall not exceed the following standards: *Discharge to Eagle Draw is prohibited.*

Constituent	Concentration	Unit
Aluminum	87	ug/l
Arsenic	100	ug/l
Beryllium	18	ug/l
Barium	1000	ug/l
Boron	750	ug/l

Cadmium	10	ug/l
Chlordane	0.015	ug/l
Chlorine	30	ug/l
Chromium	50	ug/l
Cobalt	50	ug/l
Copper	1000	ug/l
Cyanide	18	ug/l
Fluoride	2500 *	ug/l
Iron	1000	ug/l
Manganese	200	ug/l
Lead	6	ug/l
Mercury	0.042	ug/l
Nickel	200	ug/l
NH3 as N	0.07	ug/l
Radium 226+228	30	pCi/l
Selenium	12	ug/l
Silver	0.4	ug/l
Vanadium	282	ug/l
Zinc	10	mg/l
Sulfate	2661	mg/l
Chloride	275	mg/l
Total Dissolved Solids	4555	mg/l
Chemical Oxygen Demand	125	mg/l
pH	6.6 to 8.6	S.U.

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Bod	< 30	mg/l
TSS	<.5	mg/l
Fecal Coloform Bacteria	<500 organisms	Per/ 100 ml

*Amended June 29, 1993

- B. Constituents not listed in A. above for which there are standards established pursuant to WQCC Regulation 3103 will not exceed the set numerical standard in that regulation.
- C. No toxic pollutant listed in WQCC regulation 1101 TT. will be present in the discharge.
- D. SAMPLING: samples of the discharge will be taken and analyzed on the following schedule:
 - i. Major cations/anions and heavy metals will be sampled at a minimum of semi-annually.

2

- ii. All other constituents will be sampled annually, including the constituents in the above table and Volatile, Semi-Volatile Organic Compounds including Pesticides using EPA methods 624,625 and 608 respectively.
- iii. Analysis for all parameters will be pursuant to EPA approved methods.
- iv. Sampling and analytical QA/QC records will be retained for all sampling events.
- v. All samples will be "grab" samples.
- vi. Discharge flow will be monitored and recorded on a daily basis.
- vii. Sampling frequency can be reduced, on a parameter-by-parameter basis, upon application and OCD approval provided all analytical data in the previous year was no greater than seventy-five (75) percent of the effluent limit.
- viii. All samples collected in a monitoring period will be reported.
- ix. Sampling and flow measurement will be representative of the volume and

nature of the discharge.

- x. Any constituent that exceeds the standards listed above shall be cause for Navajo to stop discharging to the farm area and provide OCD immediate notification. Navajo may not resume discharging until the problem has been corrected.
- xi. Sample data, analytical results and flow measurements shall be reported to the OCD in the annual report.
- 17. <u>Vadose Zone and Water Pollution</u>: The previously submitted investigation(s) and remediation permits were submitted pursuant to the discharge permit and all future discoveries of contamination will be addressed through the discharge permit process.

Ground Water and Treatment System Monitoring:

- A. Navajo shall collect perimeter groundwater samples on a semi-annual basis from monitoring wells MW-52, KWB-2R, KWB-13, KWB-9, KWB-3A, KWB-11A, KWB-7, NP-1, NP-2, KWB-45, and MW-18. The samples shall be analyzed for concentrations of benzene, toluene, ethylbenzene and xylene (BTEX), and methyl tertiary butyl ether (MTBE) pursuant to EPA approved methods.
- B. Navajo shall collect groundwater samples on an annual basis from monitoring wells KWB-1A, KWB-1C, KWB-2R, KWB-3A, KWB-4, KWB-5, KWB-6, KWB-8, KWB-9, KWB-10, MW- 18, MW-28, MW-29, MW-45, MW-48, MW-49 and from the following recovery trenches that do not have measurable phase-separated hydrocarbons (PSH's); RW-1 through RW-15, and Bolton Road # 1-4. These samples shall be analyzed for Volatiles, Semi-Volatiles, WQCC Metals, General Chemistry including Major Anions and Cations, nitrate/nitrite, dissolved oxygen and oxidation-reduction potential (ORP) all pursuant to EPA approved methods.
- C. All Recovery Trenches and all wells (including North Colony Landfarm and Tetraethyl-lead wells) with phase-separated hydrocarbons (PSH's) shall be checked at a minimum of once per month and recorded on a spreadsheet. The sheet shall be in table form containing all of the recovery wells, date inspected, product thickness measured to .01 inch, amount of product/water recovered. If product is observed then appropriate steps will be taken to recover product as reasonably possible using the best available technology.

- D. Navajo shall collect groundwater samples from the following irrigation wells at the beginning and end of the irrigation season; RA 313, RA 314, RA3723, RA3156, RA 3353, RA 1331, RA 4196, RA 4798 and Larue well. The samples shall be analyzed for concentrations of benzene, toluene, ethylbenzene and xylene (BTEX), methyl tertiary butyl ether (MTBE), Volitale Organic Compounds (VOC's), Semi-Volatile Compounds, WQCC Metals, General Chemistry including Major Anions and Cations all pursuant to EPA approved methods.
- E. Evaporation Ponds near Pecos River (Out-of-Service): Navajo shall collect perimeter groundwater samples on a bi-annual basis with at least one half of these wells being analyzed each year. The samples shall be analyzed for concentrations of benzene, toluene, ethylbenzene and xylene (BTEX), and methyl tertiary butyl ether (MTBE), Semi-Volatiles, WQCC Metals and General Chemistry including anions and cations pursuant to EPA approved methods. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report.
- F. RCRA Solid Waste Management Units (SMUS) or AREAS OF CONCERN:

Navajo shall collect groundwater samples on a quarterly basis from monitoring wells NCL-32, 33, 34, 44, 49, TEL-1, 2, 3, 4, and from the following monitor wells MW-53, 54A, 55. These samples shall be analyzed for Volatiles, Semi-Volatiles, WQCC Metals, General Chemistry including Major Anions and Cations, nitrate/nitrite, dissolved oxygen and oxidation-reduction potential (ORP) all pursuant to EPA approved methods. Navajo shall incorporate these findings into a summary table with all other monitor points on-site. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report.

- G. <u>ANNUAL REPORT</u>: An annual report will be submitted to the OCD by February 28 of each year. The annual reports will contain:
 - i. A description of the monitoring and remediation activities which occurred during the year including conclusions and recommendations.
 - ii. Summary tables listing past and present laboratory analytic results of all water quality sampling for each monitoring point and plots of concentration vs. time for contaminants of concern from each monitoring point. Any WQCC constituent found to exceed the groundwater standard shall be highlighted and noted in the annual report. Copies of the most recent years laboratory analytical data sheets will also be submitted
 - iii. An annual water table potentiometric elevation map using the water table

> elevation of the ground water in all refinery monitor wells. A corrected water table elevation shall be determined for all wells containing phaseseparated hydrocarbons. This map shall show well locations, pertinent site features, and the direction and magnitude of the hydraulic gradient.

- iv. Plots of water table elevation vs. time for each ground water monitoring point.
- v. A annual product thickness map based on the thickness of free phase product on ground water in all refinery monitor wells. This map shall include isopleth lines for products and contaminants of concern.
- vi. The volume of product recovered in the remediation/treatment system during each quarter and the total recovered to date.
- vii. The volume of total fluids pumped from all recovery wells and trenches during each quarter and the total volume recovered to date.
- viii. <u>Electronic filing:</u> OCD would like to encourage Navajo to file this report in an acceptable electronic format.

H. Additional Requirements:

- i. Up-date all on-site and off-site maps, showing the current status of all recovery/monitor/ domestic, irrigation wells and pertinent features including the stormwater basins.
- ii. Navajo shall investigate the area between monitor well KWB-2R and the refinery to determine if a new remediation recovery trench system is required in this area. The results of this investigation shall be submitted to the OCD by July 15, 2003.
- iii. Replace MW-1 at the evaporation ponds.
- iv. If phase separated hydrocarbons are found east of the Bolton Road recovery system, then a new recovery system shall be installed in this area including down-gradient monitor wells. Any wells that reveal contaminants that exceed WQCC groundwater standards shall be reason to install addition wells to determine the extent of contamination. All new

wells shall be added to the maps and included in the annual report.

- v. Bolton Road recovery trench #1 and 2 were noted to be dry. OCD is concerned that contaminants may be flowing under and past these trenches. Please modify these trenches or install monitor wells directly east of these devices by November 15, 2003.
- vi. Navajo shall investigate the area between RW-10 and RW-5 and the refinery to determine if a new remediation recovery trench system is required in this area. The results of this investigation shall be submitted to the OCD by November 15, 2003.
- vii. Navajo shall install an additional monitor well northeast of MW-45. OCD is concerned about contamination migrating off of Navajo property in this area by November 15, 2003.
- viii. Navajo shall notify the OCD Santa Fe and local district office at least 2 weeks in advance of all scheduled activities such that the OCD has the opportunity to witness the events and split samples. For large facilities, i.e. referinies, an annual notification will suffice.
- ix. Navajo shall notify the NMOCD of the discovery of separated-phase hydrocarbons or the exceedance of a WQCC standard in any down gradient monitor well where separate-phase hydrocarbons were not present or where contaminant concentrations did not exceed WQCC standards during the preceding monitoring event pursuant to NMOCD Rule 116.
- 18. Transfer of Discharge permit: The OCD will be notified prior to any transfer of ownership, control, or possession of a facility with an approved discharge permit. A written commitment to comply with the terms and conditions of the previously approved discharge permit must be submitted by the purchaser and approved by the OCD prior to transfer.
- 19. Closure: The OCD will be notified when operations of the facility are discontinued for a period in excess of six months. Prior to closure of the facility a closure permit will be submitted for approval by the Director. Closure and waste disposal will be in accordance with the statutes, rules and regulations in effect at the time of closure.

20. Certification: Navajo Refining Company L.P. by the officer whose signature appears below, accepts this and agrees to comply with all terms and conditions contained herein. Navajo Refining Company L.P. further acknowledges that these conditions and requirements of this may be changed administratively by the Division for good cause shown as necessary to protect fresh water, human health and the environment.

Conditions accepted by: Navajo Refining Company L.P.

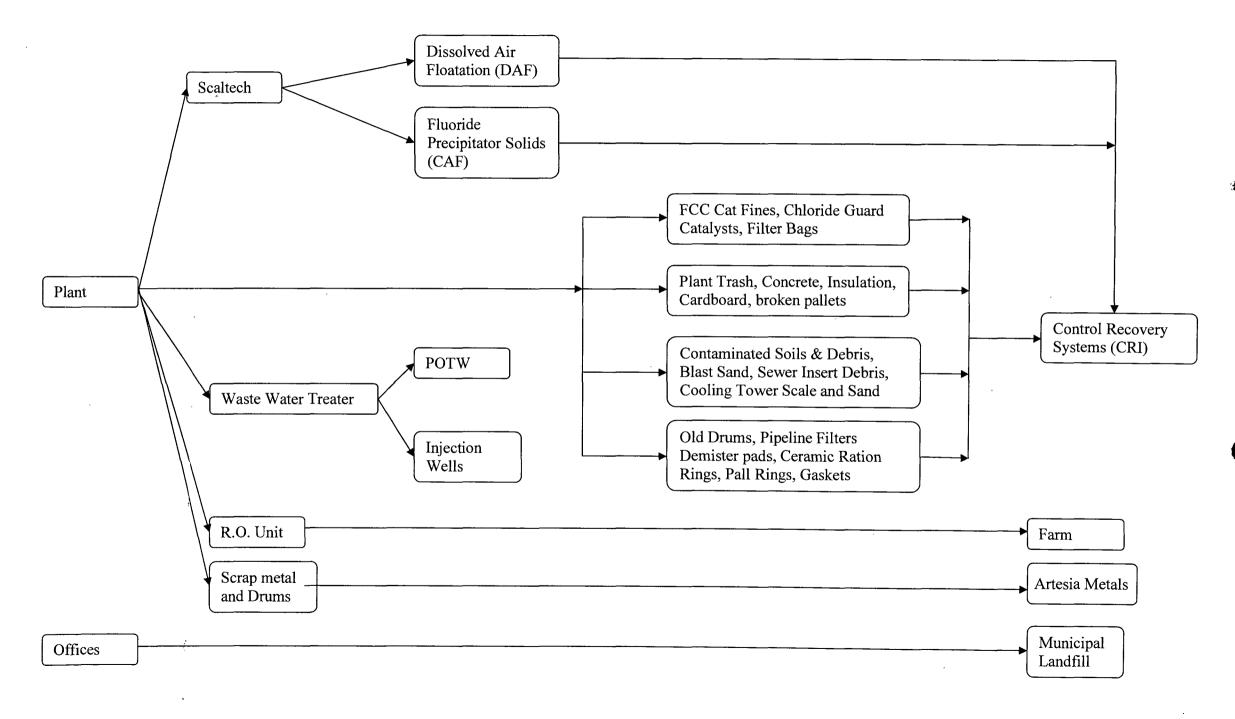
Company Representative- print name

Date

Company Representative- Sign

Title

NON-HAZARDOUS MATERIAL FLOW DIAGRAM





NEW MEXICO ENERGY, MINERALS & NATURAL RESOURCES DEPARTMENT



OIL CONSERVATION DIVISION 2040 South Pacheco Street Santa Fe, New Mexico 87505 (505) 827-7131

March 27, 1999

CERTIFIED MAIL RETURN RECEIPT NO. Z 357 870 114

Mr. Darrell Moore Environmental Manager for Water and Waste Navajo Refining Company P.O. Box 159 Artesia, New Mexico 88211-0159

Re: Minor Permit Modification to GW-28, Navajo Refining Co., Eddy County, NM

Dear Mr. Moore:

The New Mexico Oil Conservation Division (NMOCD) is in receipt of Navajo Refining Company's (NRC) letter dated January 26, 1999 requesting that permit GW-28 be modified to include using "RO Reject" water to be used as irrigation water on additional property owned and operated by Navajo which is adjacent to the existing farm property. This request is hereby approved.

Please be advised that NMOCD approval of this site does not relieve NRC of liability should their operations pose a threat to ground water, surface water, human health or the environment. In addition, NMOCD approval does not relieve NRC of responsibility for compliance with any other federal, state, or local laws and/or regulations.

If you have any questions, please contact Wayne Price of my staff at (505)827-7155.

Sincerely Yours,

Roger C. Anderson Environmental Bureau Chief

xc: OCD Artesia District Office

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TELEPHONE (505) 748-3311

> EASYLINK 62905278

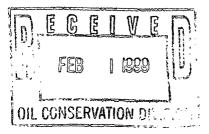


REFINING COMPANY

FAX (505) 746-6410 ACCTG (505) 746-6155 EXEC (505) 748-9077 ENGR (505) 746-4438 P / L

501 EAST MAIN STREET ° P. O. BOX 159 ARTESIA, NEW MEXICO 88211-0159

January 26, 1999



Mr. Wayne Price New Mexico Oil Conservation Division Environmental Bureau 2040 S. Pacheco St. Santa Fe, NM 87505-5472

RE: Minor Permit Modification to GW-28, Navajo Refining Co., Eddy County, NM

Dear Wayne,

As we discussed on the phone, Navajo currently irrigates a farm that we own with a stream of water that we call our "RO Reject". Navajo has recently acquired another farm that we would like to irrigate with this "RO Reject" water also.

Enclosed is a map that shows the current location of the outfall of this stream (blue), along with a proposed additional outfall (red). Navajo would pipe this stream and add valves to allow us to put this RO Reject on either farm at any time. This would give us some flexibility during planting and harvesting seasons.

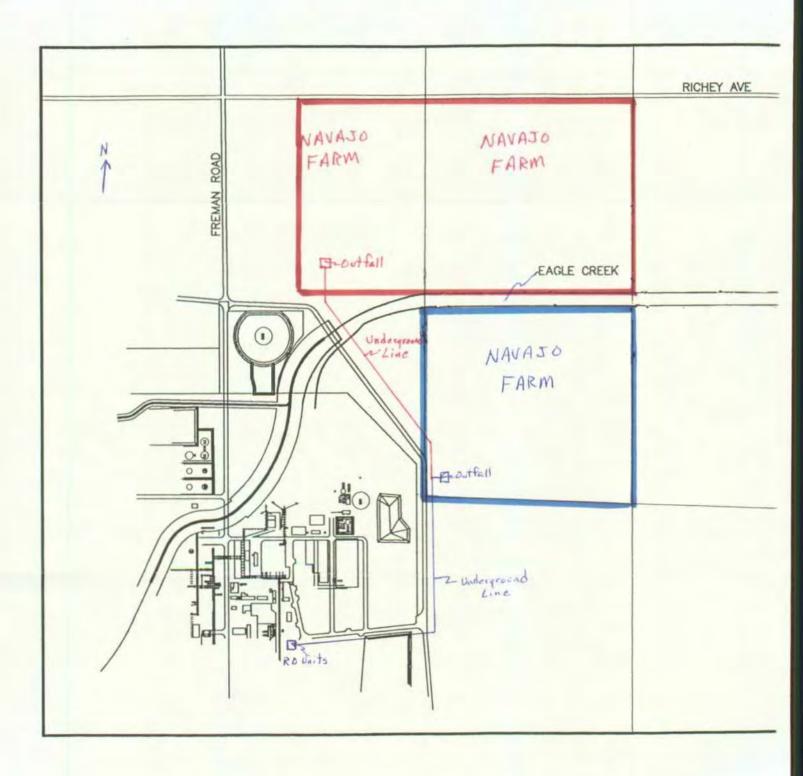
As we discussed, a minor modification to our Discharge Permit GW-28 should take care of this problem. If I can answer any questions, please feel free to call me at 505-748-3311. Thank you for your time in this matter.

Sincerely, NAVAJO REFINING COMPANY

Of More

Darrell Moore Environmental Manager for Water and Waste

Encl.



STATE OF NEW MEXICO

THURSDAY OF THE STATE

ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION 2040 S. PACHECO SANTA FE, NEW MEXICO 87505 (505) 827-7131

June 14, 1996

CERTIFIED MAIL RETURN RECEIPT NO. P-269-269-163

Mr. Darrell Moore Environmental Specialist Navajo Refining Company P.O. Box 159 Artesia, New Mexico 88211-0159

RE: GROUND WATER REMEDIATION DISCHARGE PLAN GW-28 MODIFICATION NAVAJO ARTESIA REFINERY EDDY COUNTY, NEW MEXICO

Dear Mr. Moore:

The New Mexico Oil Conservation Division (OCD) has completed a review of Navajo Refining Company's April 3, 1996 "QUARTERLY INJECTION REPORT, NAVAJO REFINING COMPANY, EDDY CO., NEW MEXICO". This document contains Navajo's proposal to modify discharge plan GW-28's ground water remediation and monitoring reporting frequency from quarterly to annually.

The above referenced requested modification of the previously approved ground water discharge plan, GW-28, for the Artesia Refinery located in SE/4 Section 1, E/2 Section 8, W/2 Section 9, N/2 Section 12, Township 17 South, Range 26 East (NMPM), Eddy County, New Mexico is hereby approved under the conditions contained in the enclosed attachment.

The discharge plan (GW-28) was originally approved on October 21, 1991. The modification does not significantly alter the discharge streams, therefore, public notice was not issued.

The application for modification was submitted pursuant to Water Quality Control Commission (WQCC) Regulation 3107.C and is approved pursuant to WQCC Regulation 3109.

Please note that Section 3104 of the WQCC regulations requires that "When a plan has been approved, discharges must be consistent with the terms and conditions of the plan". Pursuant to Section 3107.C, you are required to notify the Director of any facility expansion, production increase or process modification that would result in a significant modification in the discharge of potential ground water contaminants. Mr. Darrell Moore June 14, 1996 Page 2

Please be advised that OCD approval does not relieve you of liability should your remediation and monitoring program fail to adequately monitor or remediate ground water contamination related to Navajo's operations. In addition, this approval does not relieve you of responsibility for compliance with any other federal, state or local laws and/or regulations.

If you have any questions please, contact William Olson of my staff at (505) 827-7154.

Sincerely,

Roger C. Anderson Environmental Bureau Chief

WJL/WCO

xc: OCD Artesia District Office Richard D. Mayer, EPA Region VI Benito Garcia, NMED Hazardous & Radioactive Materials Bureau

ATTACHENT TO THE DISCHARGE PLAN -28 APPROVAL NAVAJO REFINING COMPANY ARTESIA REFINERY DISCHARGE PLAN MODIFICATION CONDITIONS (June 14, 1996)

1. <u>Product and Waste Disposal:</u>

All recovered product, waste filters or treatment system waste products will be recycled and/or disposed of at an OCD approved facility or in an OCD approved manner.

2. Ground Water and Treatment System Monitoring:

Ground water from monitor wells and the treatment system will be sampled and analyzed according to the attached Appendix A "NAVAJO REFINERY GROUND WATER REMEDIATION SYSTEM MONITORING, SAMPLING AND REPORTING PROGRAM". All water quality sampling will be conducted according to EPA approved protocol and laboratory techniques.

3. <u>Annual Reports:</u>

An annual report will be submitted to the OCD by February 28 of each year. The annual reports will contain:

- a. A description of the monitoring and remediation activities which occurred during the year including conclusions and recommendations.
- b. Summary tables listing past and present laboratory analytic results of all water quality sampling for each monitoring point and plots of concentration vs. time for contaminants of concern from each monitoring point. Copies of the most recent years laboratory analytical data sheets will also be submitted
- c. A quarterly water table elevation map using the water table elevation of the ground water in all refinery monitor wells.
- d. Plots of water table elevation vs. time for each ground water monitoring point.
- e. A quarterly product thickness map based on the thickness of free phase product on ground water in all refinery monitor wells.
- f. The volume of product recovered in the remediation/treatment system during each quarter and the total recovered to date.
- g. The volume of total fluids pumped from all recovery wells and trenches during each quarter and the total volume recovered to date.



APPENDIX A NAVAJO REFINERY GROUND WATER REMEDIATION MONITORING, SAMPLING AND REPORTING PROGRAM (June 14, 1996)

Sampling point	Biweekly	Monthly	Quarterly	Annually
Air Stripper Effluent	· · · · · · · · · · · · · · · · · · ·	601** 602** PAH's		Cations/anions Heavy metals
RA-2723	602**			
RA-4196		602**		
RA-4798		602**		
RA-313*		602**		
RA-314*		602**		
RA-1331*		602**		
RA-307*		602**		
RA-1227*		602**		
RA-3156			602**	
RA-3353			602**	
KWB-1A			601** 602**	PAH's Cation/anions Heavy metals
KWB-1C			601** 602**	PAH's Cation/anions Heavy metals
KWB-2A			601** 602**	PAH's Cation/anions Heavy metals
KWB-3A			601** 602**	PAH's Cation/anions Heavy metals
KWB-7			601** 602**	PAH's Cation/anions Heavy metals
KWB-9			601** 602**	PAH's Cation/anions Heavy metals

Sampled during irrigation season EPA laboratory method



APPENDIX A (continued) NAVAJO REFINERY GROUND WATER REMEDIATION MONITORING, SAMPLING AND REPORTING PROGRAM (June 14, 1996)

Sampling point	Biweekly	Monthly	Quarterly	Annually
KWB-11A			601** 602**	PAH's Cations/anions Heavy metals
KWB-12A			601** 602**	PAH's Cations/anions Heavy metals
MW-18			601** 602.~*	PAH's Cations/anions Heavy metals
MW-28			601** 602**	PAH's Cations/anions Heavy metals
MW-29			601** 602**	PAH's Cations/anions Heavy metals
MW-45			601** 602**	PAH's Cations/anions Heavy metals

** - EPA laboratory method

1. --



NEW MEXICO EL RGY, MINERALS & NATURAL RESOURCES DEPARTMENT



OIL CONSERVATION DIVISION 2040 South Pacheco Street Santa Fe, New Mexico 87505 (505) 827-7131

April 10, 1996

CERTIFIED MAIL RETURN RECEIPT NO. Z-765-962-941

Mr. David Griffin Navajo Refining Company P. O. Drawer 159 Artesia, New Mexico 88211-0159

RE: Discharge Plan GW-028 Renewal Artesia Refinery Eddy County, New Mexico

Dear Mr. Griffin:

On October 21, 1991, the groundwater discharge plan, GW-028, for the Artesia Refinery located in the SE/4 of Section 1, E/2 of Section 8, W/2 of Section 9, N/2 of Section 12, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico, was approved by the Director of the New Mexico Oil Conservation Division (OCD). This discharge plan was required and submitted pursuant to Water Quality Control Commission (WQCC) regulations and was approved for a period of five years. The approval will expire on October 21, 1996.

If the facility continues to have potential or actual effluent or leachate discharges and wishes to continue operation, the discharge plan must be renewed. Pursuant to Section 3106.F., if an application for renewal is submitted at least 120 days before the discharge plan expires (on or before June 21, 1996), then the existing approved discharge plan for the same activity shall not expire until the application for renewal has been approved or disapproved. The OCD is reviewing discharge plan submittals and renewals carefully and the review time can extend for several weeks to months. Please indicate whether Navajo has made, or intends to make, any changes in the system, and if so, please include these modifications in the application for renewal.

Mr. David Griffin April 10, 1996 Page 2

The discharge plan renewal application for the Artesia Refinery is subject to WQCC Regulation 3114. Every billable facility submitting a discharge plan for renewal will be assessed a fee equal to the filing fee of \$50 plus a flat fee of \$3,910.00 for oil refineries.

The \$50 filing fee is to be submitted with the discharge plan renewal application and is nonrefundable. The flat fee for an approved discharge plan renewal may be paid in a single payment due at the time of approval, or in equal annual installments over the duration of the discharge plan - with the first payment due the at the time of approval. Please make all checks payable to: NMED-Water Quality Management and addressed to the OCD Santa Fe Office.

Please submit the original discharge plan renewal application and one copy to the OCD Santa Fe Office and one copy to the OCD Artesia District Office. Note that the completed and signed application form must be submitted with your discharge plan renewal request.

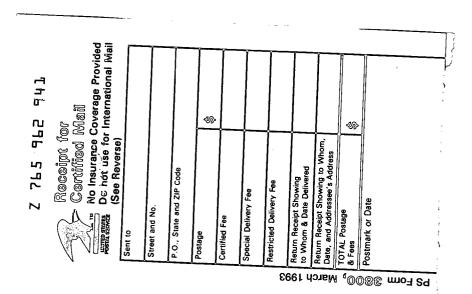
If Navajo no longer has any actual or potential discharges and a discharge plan is not needed, please notify this office. If Navajo has any questions, please do not hesitate to contact Mark Ashley at (505) 827-7155.

Sincerely,

Roger C. Anderson Environmental Bureau Chief

RCA/mwa

xc: OCD Artesia Office



TELEPHONE (505) 748-3311



EASYLINK 62905278 FAX (505) 746-6410 ACCTG 75 D(505) 746-6155 EXEC (505) 748-9077 ENGR (505) 748-9077 ENGR (505) 748-4438 P / L

501 EAST MAIN STREET . P. O. BOX 1591

REFINING COMPAT

April 8, 1996

Mr. Roger C. Anderson Environmental Bureau Chief New Mexico Oil Conservation Division 2040 S. Pacheco Santa Fe, NM 87505

Re: Return of Signed Acceptance of Modification to Discharge Plan GW-28

Dear Roger:

Navajo would like to thank you, your staff and Director LeMay for issuing this modification to Navajo's discharge plan. It was a pleasant surprise to receive the modification after the temporary loss of the application during your relocation. Enclosed is the signed attachment for the discharge plan.

Sincerely,

David G. Griffin Manager of Environmental Affairs for Water & Waste

DGG/sj

Enc.





OIL CONSERVATION DIVISION 2040 South Pacheco Street Santa Fe, New Mexico 87505 (505) 827-7131

March 27, 1996

CERTIFIED MAIL RETURN RECEIPT NO. Z-765-962-938

Mr. David Griffin Navajo Refining Company P. O. Box 159 Artesia, New Mexico 88211-0159

RE: Discharge Plan GW-28 Modification Discharge to City of Artesia POTW Eddy County, New Mexico

Dear Mr. Griffin:

The discharge plan modification GW-28 to discharge approximately 5,000 gallons per day of effluent from the Navajo Refining Company (Navajo) Evaporation Pond #6 located in the SE/4 of Section 1, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico to the City of Artesia's Sewage Treatment Plant (POTW), is hereby approved under the conditions contained in the enclosed attachment. The discharge plan modification consists of the request dated October 13, 1994. Enclosed are two copies of the conditions of approval. Please sign and return one copy to the New Mexico Oil Conservation Division (OCD) Santa Fe Office within five working days of receipt of this letter.

The discharge plan modification was submitted pursuant to Section 3107.C of the New Mexico Water Quality Control Commission (WQCC) Regulations. Based on the information provided in the modification request and in the approved discharge plan, it is approved pursuant to Section 3109. Please be advised the approval of this plan does not relieve you of liability should your operation result in actual pollution of surface water, ground water, or the environment.

Please note that Section 3104 of the regulations require "When a facility has been approved, discharges must be consistent with the terms and conditions of the plan". Pursuant to Section 3107.C. you are required to notify the Director of any facility expansion, production increase, or

Mr. David Griffin March 27, 1996 Page 2

process modification that would result in any change in the discharge of water quality or volume.

On behalf of the staff of the New Mexico Oil Conservation Division (OCD), I wish to thank you and your staff for your cooperation during this discharge plan modification review.

Sincerely, William J. LeMay Director WJL/mwa

xc: OCD Artesia Office

ATTACHMENT TO THE DISCHARGE PLAN GW-28 MODIFICATION APPROVAL NAVAJO REFINING COMPANY ARTESIA REFINERY DISCHARGE PLAN MODIFICATION REQUIREMENTS (March 27, 1996)

- 1. <u>Navajo Commitments:</u> Navajo will abide by all commitments submitted in the modification application letter dated October 13,1994 from Navajo as well as the discharge plan approval dated October 21, 1991.
- 2. Navajo will abide by the agreement reached with the City of Artesia for discharging effluent that has been pretreated in Navajo's waste water treatment system. Effluents discharged to the POTW will be within compliance of the pretreatment standards for petroleum refineries (40 CFR 419.25 and 419.27).
- 3. <u>Housekeeping</u>: All systems designed for spill collection/prevention should be inspected frequently to ensure proper operation and to prevent overtopping or system failure.

The two inch pipeline laid from Pond #6 to the POTW will be inspected monthly for integrity.

- 4. <u>Spill Reporting</u>: All spills/releases shall be reported pursuant to OCD Rule 116 and WQCC 1203 to the appropriate OCD District Office.
- 5. Conditions accepted by:

Company Representative

Date

Title

ATTACHMENT TO THE DISCHARGE PLAN GW-28 MODIFICATION APPROVAL NAVAJO REFINING COMPANY ARTESIA REFINERY DISCHARGE PLAN MODIFICATION REQUIREMENTS (March 27, 1996)

- 1. <u>Navajo Commitments:</u> Navajo will abide by all commitments submitted in the modification application letter dated October 13,1994 from Navajo as well as the discharge plan approval dated October 21, 1991.
- 2. Navajo will abide by the agreement reached with the City of Artesia for discharging effluent that has been pretreated in Navajo's waste water treatment system. Effluents discharged to the POTW will be within compliance of the pretreatment standards for petroleum refineries (40 CFR 419.25 and 419.27).
- 3. <u>Housekeeping</u>: All systems designed for spill collection/prevention should be inspected frequently to ensure proper operation and to prevent overtopping or system failure.

The two inch pipeline laid from Pond #6 to the POTW will be inspected monthly for integrity.

4. <u>Spill Reporting</u>: All spills/releases shall be reported pursuant to OCD Rule 116 and WQCC 1203 to the appropriate OCD District Office.

5. Conditions accepted by:

ACKNOWLEDGEMENT OF RECEIPT OF CHECK/CASH

	. /
I hereby acknowledge receipt of check No.	dated 1/5/96,
or cash received on 1/8/9/2 in the	a amount of \$ 56,00
from Varajo Refining	
cor artesia Refinery	GUIDOSC
Submitted by:	Data:
Submitted to ASD by: Rollinger	Date: 1/16/96
	ha Date: 1-17-96
Filing Fee X New Facility	
Modification Other	
Organization Code <u>52/.07</u> Appl To be deposited in the Water Quality Man Full Payment or Annual Incre	agement Fund.
NAVAJO REFINING COMPANY 501 EAST MAIN STREET	
P O BOX 159 Artesia, NM 88211-0159	NationsBank of Texas N.A. Wichita Falls, TX 76301 CHECK DATE: 01/05/96
	CHECK

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ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION OIVISION 2040 S. PACHECO SANTA FE, NEW MEXICO 87505 (505) 827-7131

December 12, 1995

CERTIFIED MAIL RETURN RECEIPT NO. Z-765-962-914

Mr. David Griffin Navajo Refining Company P. O. Box 159 Artesia, New Mexico 88211-0159

RE: Discharge Plan GW-28 Modification Artesia Refinery, Evaporation Pond Dikes Raising Eddy County, New Mexico

Dear Mr. Griffin:

The discharge plan modification GW-28 requesting permission to raise the perimeter dikes around the Evaporation Ponds in order to maintain the minimum freeboard required by GW-28 for the Navajo Refining Company Artesia Refinery located in the W/2 of Section 9, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico, is hereby approved under the conditions contained in the enclosed attachment. The discharge plan modification consists of the request dated December 8, 1995.

The discharge plan modification was submitted pursuant to Sections 3106 and 3107.C of the New Mexico Water Quality Control Commission (WQCC) Regulations. Based on the information provided in the modification request and in the approved discharge plan, it is approved pursuant to Sections 3109 and 5101.A. Please be advised the approval of this plan does not relieve you of liability should your operation result in actual pollution of surface water, ground water, or the environment which may be actionable under other laws and/or regulations.

Please note that Section 3104 of the regulations require "When a facility has been approved, discharges must be consistent with the terms and conditions of the plan". Pursuant to Section

Mr. David Griffin December 12, 1995 Page 2

3107.C. you are required to notify the Director of any facility expansion, production increase, or process modification that would result in any change in the discharge of water quality or volume.

The discharge plan modification for the Navajo Refining Company Artesia Refinery is subject to WQCC Regulation 3114. Every billable facility submitting a discharge plan modification will be assessed a fee equal to the filing fee of \$50 plus the flat rate \$3,910 for refineries. The New Mexico Oil Conservation Division (OCD) considers this modification to be minor in nature, therefore the flat fee has been waived. As of this date the OCD has not received your \$50 filing fee which will be due upon receipt of this letter.

Please make all checks payable to: **NMED-Water Quality Management** and addressed to the OCD Santa Fe Office.

On behalf of the staff of the OCD, I wish to thank you and your staff for your cooperation during this discharge plan modification review.

Sincerely William J. LeMa Director WJL/mwa

xc: OCD Artesia Office

ATTACHMENT TO THE DISCHARGE PLAN GW-28 MODIFICATION APPROVAL NAVAJO REFINING COMPANY ARTESIA REFINERY DISCHARGE PLAN MODIFICATION REQUIREMENTS (December 12, 1995)

- 1. The additional diking will not exceed two feet in height. The soil used to raise the dikes will be done by compacting six inch lifts of the same clay loam that was used to build the existing dikes.
- 2. The previously approved minimum freeboard will be maintained.

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- 2. All diking will be compacted to a minimum of 95 proctor. Fluids used to compact lifts will be similar to fluids placed in ponds, without hydrocarbons.
- 3. The previously approved inside and outside grade of the dikes will be maintained.
- 4. This approval will expire on the corresponding date of EPA closure of the ponds.
- 4. The OCD will be notified at least 72 hours in advance of all activities such that the OCD may have the opportunity to witness the activities and/or split samples.

TELEPHONE

(505) 748-3311

EASYLINK 62905278



5 DF 501 EAST MAIN STREET O P. O. BOX 159 ARTESIA, NEW MEXICO 88211-0159

December 8, 1995

Mr. Roger C. Anderson **Environmental Bureau Chief Oil Conservation Division** 2040 S. Pacheco Santa Fe, NM 87505

FAX: (505) 827-8177

OIL CONSERVE

TING COMPANEL: , EC(505) 746-6410 ACCTG

. N HEVESTIFAX

(505) 746-6155 EXEC (505) 748-9077 ENGR

(595) ⊉46-4438 P / L

Minor Modification to Navajo's Discharge Permit GW-28 Re: Evaporation Pond Dikes Raising

Dear Mr. Anderson:

Navajo needs to raise the perimeter dikes around the Evaporation Ponds in order to maintain the minimum freeboard required in permit GW-28. Colder winter weather has reduced the rate of evaporation with the current influx to the ponds exceeding the loss from the ponds. The ponds are presently very near minimum allowable freeboard and therefore Navajo finds itself in a near emergency situation needing to add additional height to the existing dikes. Navajo feels that two (2) additional feet added to the dikes will be sufficient to carry us through the winter and maintain required freeboard.

As you are well aware, Navajo has dramatically reduced the volume of water discharged to the evaporation ponds (65% reduction) by pioneering the use of feedwater pretreatment by Reverse Osmosis. Along with this reduction in discharge to the ponds Navajo has been removing ponds from service and closing them down as part of the settlement of our Department of Justice case.

Navajo finds it frustrating to have to request this authorization since we have been trying since mid-summer 1994 to remove another significant volume of water currently flowing to the ponds. This water is coming from our hydrocarbon recovery wells. In 1994 you permitted Navajo to separately treat and reinject this remediation water back into the ground from which it came. Since your authorization, Navajo ran into a long delay by NMED -Hazardous Waste while they reviewed and finally (November 14, 1995) decided that this remediation and reinjection did not have to be done under their jurisdiction. Navajo then thought that everything was approved and construction could start immediately on the treatment and reinjection system. These hopes have now been set back following a meeting on November 28, 1995 with the Air Pollution Control Bureau (APCB). During this meeting, Navajo was informed that it is now APCB policy that any new installation of air emitting equipment at a Major source facility must go through a full permit process even if there are no change in overall refinery emissions or even if there is a decrease in emissions. The current permit process is taking from 6 months to possibly as long as 2 years for permit issuance. So,

it appears the permit cannot be obtained in time to do us any good this winter, although we continue to work with the APCB to possibly obtain an exemption.

The APCB policy has also affected the pending remediation at our Lovington Refinery. The same delay to obtain an air permit applies as long as Navajo owns or operates the remediation system. What we have worked out with the APCB is that, if Navajo turn-key contracts the remediation so that the equipment is owned and operated by others, there is no permit required. The remediation contractor would be considered a separate source of emissions and would therefore be entitled to a permit exemption if air emissions are kept below 1 lb/hr after controls. Having to turn over ownership and operational control of this remediation costs Navajo unnecessary additional expense plus it complicates the operation of the remediation.

The two (2) feet to be added to the pond dikes will be done by compacting 6 inch lifts of the same clay loam soil that was used to build the existing dikes. Moisture will be added as needed for optimum compaction. Compaction will be done by vibratory roller to a minimum 85 proctor. The existing dike slopes will be maintained and since the top of the existing dikes average 15 ft. in width, the additional 2 ft. in height will still allow for a roadway on the top of the dikes.

Your prompt approval is needed for this addition so that construction can be done before more freeboard is lost. If you have any questions or need further information, please call me at 505-748-3311.

Sincerely yours,

David G. Griffin Manager of Environmental Affairs for Water & Waste

DGG/sj



ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION 2040 S. PACHECO SANTA FE, NEW MEXICO 87505 (505) 827-7131

May 16, 1995

CERTIFIED MAIL RETURN RECEIPT NO. Z-765-962-725

Mr. David Griffin Navajo Refining Company P. O. Drawer 159 Artesia, New Mexico 88211-0159

RE: Discharge Plan GW-28 Modification Artesia Refinery, Fire Training Fluids Eddy County, New Mexico

Dear Mr. Griffin:

The discharge plan modification GW-28 requesting an emergency clay lined pit to hold overflow fluids from fire training exercises for the Navajo Refining Company Artesia Refinery located in the W/2 of Section 9, Township 17 South, Range 26 East, NMPM, Eddy County, New Mexico, is hereby approved under the conditions contained in the enclosed attachment. The discharge plan modification consists of the modification request and analytical results for the fire training fluids submitted by Navajo Refining Company on July 21, 1994.

The discharge plan modification was submitted pursuant to Sections 3-106 and 3-107.C of the New Mexico Water Quality Control Commission (WQCC) Regulations. Based on the information provided in the modification request and in the approved discharge plan, it is approved pursuant to Sections 3-109 and 5-101.A. Please be advised the approval of this plan does not relieve you of liability should your operation result in actual pollution of surface water, ground water, or the environment which may be actionable under other laws and/or regulations.

Please note that Section 3-104 of the regulations require "When a facility has been approved, discharges must be consistent with the terms and conditions of the plan". Pursuant to Section 3-107.C. you are required to notify the Director of any facility expansion, production increase,

Mr. David Griffin May 16, 1995 Page 2

or process modification that would result in any change in the discharge of water quality or volume.

The discharge plan modification for the Navajo Refining Company Artesia Refinery is subject to WQCC Regulation 3-114.B.1.(b).3 discharge plan modification fee. Every billable facility submitting a discharge plan modification will be assessed a fee equal to the filing fee of fifty (50) dollars plus the flat rate of thirty-nine hundred and ten dollars (\$3910) for refineries. The New Mexico Oil Conservation Division (OCD) considers this modification to be minor in nature, therefore the flat fee has been waived. As of this date (May 16, 1995) the OCD has not received your fifty (50) dollar filing fee which will be due upon receipt of this letter.

Please make all checks payable to: NMED-Water Quality Management and addressed to the OCD Santa Fe Office.

On behalf of the staff of the OCD, I wish to thank you and your staff for your cooperation during this discharge plan review.

Sincerely,

William J. LeMay Director

WJL/mwa

xc: Ray Smith, OCD Artesia Office Tim Gumm, OCD Artesia Office

ATTACHMENT TO THE DISCHARGE PLAN GW-28 MODIFICATION APPROVAL NAVAJO REFINING COMPANY ARTESIA REFINERY DISCHARGE PLAN MODIFICATION REQUIREMENTS (May 16, 1995)

- 1. <u>Clay Lined Pit:</u> EPA requires that the compacted materials meet a permeability (transmissivity) of 10⁻⁷ cm/sec. The clay liner will meet the EPA standards and will be tested after construction with the results submitted to the OCD Santa Fe Office.
- 2. <u>Clay Liner Thickness</u>: The clay liner will be a minimum of two feet in thickness with two feet of soil on top of the liner.
- 3. <u>Fire Training Fluids</u>: Navajo will remove all fluids collected in the pit within 24 hours of each training session. The process wastewater system will be used for disposal of the fluids.

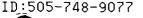
After the fluids are removed, the top one foot of soil will be disced to enhance and stimulate bioremediation.

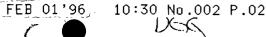
4. <u>Sampling</u>: The fluids and soils will be tested every five years at discharge plan renewal.

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5. <u>Notification:</u> The OCD will be notified at least 72 hours in advance of all activities such that the OCD may have the opportunity to witness the activities and/or split samples.

NAVAJO REFINIG





393-5821

56/4 1-17-26

REFINING COMPANY

501 EAST MAIN STREET • P. O. BOX 159 ARTESIA, NEW MEXICO 88211-0159

October 13, 1994

(505) 746-6155 EXEC (505) 748-9077 ENGR (505) 746-4438 P/L

FAX

(505) 746-6410 ACCTG

Mr. Roger Anderson, Chief Environmental Bureau Oil Conservation Division P.O. Box 2088 Santa Fe, N.M. 87501

Re: GW-28 Modification - Discharge to City of Artesia POTW

Dear Mr. Anderson:

Navajo is, herein, applying for a modification to our discharge permit No. GW-28. Navajo is requesting a modification to recognize the discharge of a small volume of effluent out of Navajo's Evaporation Pond #6 to the City of Artesia's Sawage Treatment Plant (POTW). This discharge to the POTW will eliminate any question that the refinery's waste water treatment and handling system is excluded from RCRA by virtue of the specific exclusion of waste water treatment facilities under either section 402 (i.e., NPDES program) or 307(b) (i.e., discharges to POTW) of the Clean Water Act.

Although Navajo has always considered its waste water treatment system to be exempt from RCRA, it is now electing to eliminate any questions relating to the exempt status of the waste water treatment system by discharging under section 307(b) of the Clean Water Act. This section does not require that all of a facilities effluent be discharged to a POTW, therefore Navajo reached an agreement with the City of Artesia to discharge a relatively small amount of effluent to the POTW that had been pretreated in our waste water treatment system. The best quality effluent Navajo has is that which has resided longest in the Evaporation Ponds. Navajo has installed a small portable pump station in Pond #6 and laid a 2 inch line to the POTW. This installation is of a temporary nature as Navajo has reached a tentative agreement with the Department of Justice to discontinue the use of the Evaporation Ponds within approximately 2 years. You will, of course, be informed of the actual dates and changes as they are finalized.

A copy of the agreement between Navajo and the City of Artesia is enclosed as well as a plot plan showing how Navajo has installed the discharge line to the POTW. The City monitors the quality of the effluent delivered to them. The pumping system installed has a maximum pumping capacity of 14 gpm. Navajo operates the system during normal business hours on normal business days such that a typical discharge to the City POTW would actually be 5,000 gallons per day and 100,000 gallons per month. The City POTW is routinely treating 850,000 gallons per day, so you can see that Navajo's 5,000 gallons has little, if any, effect on the City's operation.

An Independent Refinery Serving ... NEW MEXICO • ARIZONA • WEST TEXAS

EASYLINK 62905278

5. A.

TELEPHONE

(505) 748-3311



You will notice on the enclosed plot plan the Navajo has isolated, drained and is in the process of remediating Pond #2. In order to do this the effluent line (12 inch) from the Refinery was moved to discharge into Pond #4. The work on Pond #2 is also a result of negotiations with the Department of Justice.

The final enclosure you should find is an analysis typical of the water being discharged to the City. You will see from the analysis that Navajo is well within compliance of the pretreatment standards for Petroleum Refineries discharging to a POTW (40 CFR 419.25 and 419.27).

The standards are a maximum of :

Oil & Grease100 mg/lAmmonia100 mg/lTotal Chromium1 mg/l

The \$50.00 filing fee is enclosed. Should you need any additional information, please call me at 505-748-3311.

Sincerely,

David G. Griffin Supt. Of Env. Affairs and Quality Control

DGG/te

Enclosures



ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION

ORUG FREE 💳

BRUCE KING GOVERNOR

July 25, 1994

POST OFFICE BOX 2088 STATE LANO OFFICE BUILDING SANTA FE, NEW MEXICO 87504 (505) 827-5800

ANITA LOCKWOOD CABINET SECRETARY

> CERTIFIED MAIL RETURN RECEIPT NO. P-111-334-149

Mr. Darrell Moore Environmental Specialist Navajo Refining Company P.O. Box 159 Artesia, New Mexico 88211-0159

RE: GROUND WATER REMEDIATION DISCHARGE PLAN GW-28 MODIFICATION NAVAJO ARTESIA REFINERY EDDY COUNTY, NEW MEXICO

Dear Mr. Moore:

The New Mexico Oil Conservation Division (OCD) has completed a review of Navajo Refining Company's January 31, 1994, March 10, 1994, April 29, 1994, May 4, 1994 and June 23, 1994 correspondence. These documents contain Navajo's proposal to modify discharge plan GW-28 to include the treatment of contaminated ground water to New Mexico Water Quality Control Commission ground water standards and reinjection into recovery wells RW-4 and RW-6 and/or application to the farmland designated in the above referenced documents. The treated ground water is from the remediation of contaminate refinery ground water generated from the offsite recovery trenches and onsite recovery wells RW-5, RW-7, RW-8, RW-9 and RW-10.

The above referenced requested modification of the previously approved ground water discharge plan, GW-28, for the Artesia Refinery located in SE/4 Section 1, E/2 Section 8, W/2 Section 9, N/2 Section 12, Township 17 South, Range 26 East (NMPM), Eddy County, New Mexico is hereby approved under the conditions contained in the enclosed attachment.

The discharge plan (GW-28) was originally approved on October 21, 1991. The modification does not significantly alter the discharge streams, therefore, public notice was not issued.

The application for modification was submitted pursuant to Water Quality Control Commission (WQCC) Regulation 3-107.C and is approved pursuant to WQCC Regulation 3-109. Mr. Darrell Moore July 25, 1994 Page 2

Please note that Section 3-104 of the WQCC regulations requires that "When a plan has been approved, discharges must be consistent with the terms and conditions of the plan". Pursuant to Section 3-107.C, you are required to notify the Director of any facility expansion, production increase or process modification that would result in a significant modification in the discharge of potential ground water contaminants.

Please be advised that OCD approval does not relieve you of liability should your operation result in actual pollution of surface waters, ground waters or the environment which may be actionable under other laws and/or regulations. In addition, this approval does not relieve you of responsibility for compliance with any other federal, state or local laws and/or regulations.

If you have any questions please, contact William Olson of my staff at (505) 827-5885.

Sincerely,

William J. LeMa Director

WJL/WCO

xc: OCD Artesia District Office Richard D. Mayer, EPA Region VI

0000	PS Form 38	00, June	1991	 	
sseuppe winnen aun jo juligin aut Di Edopanue fo don Jeno evin je	rosmark or Date	sta Ac	Restricted Delivery Fee Return Receipt Showing to Whom & Date Delivered	 P.O., State and ZIP Code Postage	P 111 334 149 Receipt for Certified Mail Maile Provided Street and No.

ATTACHMENT TO THE DISCHARGE PLAN GW-28 APPROVAL NAVAJO REFINING COMPANY ARTESIA REFINERY DISCHARGE PLAN MODIFICATION CONDITIONS (July 14, 1994)

1. Additional Monitor Wells

Because of the potential for water injected into monitor wells RW-4 and RW-6 to alter the natural hydraulic gradient and the lack of ground water monitoring points in certain areas of the refinery boundaries, the OCD requires that Navajo submit a work plan for the installation and sampling of additional monitor wells by September 23, 1994. This work plan will be submitted and implemented prior to commencing injection in monitor wells RW-4 and RW-6. The work plan will address the installation of ground water monitoring wells along the southern, eastern and western sides of the refinery. The work plan will also include a ground water sampling and analysis plan for the monitor wells.

2. <u>Product and Waste Disposal:</u>

All recovered product, waste filters or treatment system waste products will be recycled and/or disposed of at an OCD approved facility.

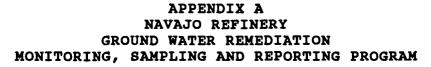
3. Ground Water and Treatment System Monitoring:

Ground water from monitor wells and the treatment system will be sampled and analyzed according to the attached Appendix A "NAVAJO REFINERY GROUND WATER REMEDIATION SYSTEM MONITORING, SAMPLING AND REPORTING PROGRAM". All water quality sampling will be conducted according to EPA approved protocol and laboratory techniques.

3. <u>Quarterly Reports:</u>

Quarterly reports will be submitted by January 1, April 1, July 1, and October 1 of each year. Quarterly reports will contain:

- a. A summary of the laboratory analytic results of water quality sampling of monitor wells and the treatment system from the previous quarter. The data from each monitoring point will be presented in tabular form and will list past and present sampling results.
- b. A water table elevation map using the water table elevation of the ground water in all refinery monitor wells (excluding monitor wells around the refinery's disposal ponds).
- c. A product thickness map based on the thickness of free phase product on ground water in all refinery monitor wells.
- d. The total volume of product recovered in the treatment system during the quarter and to date.
- e. The total volume of fluid pumped from each well during the quarter and to date.
- f. The total volume of water reinjected and/or applied to the farmland during the quarter and to date.



Sampling point	Biweekly	Monthly	Quarterly	Annually
Air Stripper Effluent		601** 602** PAH's		Cations/anions Heavy metals
RA-2723	602**			
RA-4196		602**		
RA-4798		602**		
RA-313* J		602**		
RA-314* [/]		602**		
RA-1331*		602**		
RA-307*		602**		
RA-1227*		602**		
RA-3156			602**	
RA-3353			602**	
KWB-1A			601** 602**	PAH's Cation/anions Heavy metals
KWB-1C			601** 602**	PAH's Cation/anions Heavy metals
KWB-2A			601** 602**	PAH's Cation/anions Heavy metals
KWB-3A			601** 602**	PAH's Cation/anions Heavy metals
KWB-7			601** 602**	PAH's Cation/anions Heavy metals
KWB-9			601** 602**	PAH's Cation/anions Heavy metals

Sampled during irrigation season EPA laboratory method

**





APPENDIX A (continued) NAVAJO REFINERY GROUND WATER REMEDIATION MONITORING, SAMPLING AND REPORTING PROGRAM

Sampling point	Biweekly	Monthly	Quarterly	Annually
KWB-11A			601** 602**	PAH's Cations/anions Heavy metals
KWB-12A			601** 602**	PAH's Cations/anions Heavy metals
MW-18			601** 602**	PAH's Cations/anions Heavy metals
MW-28			601** 602**	PAH's Cations/anions Heavy metals
MW-29			601** 602**	PAH's Cations/anions Heavy metals
MW-45			601** 602**	PAH's Cations/anions Heavy metals

- Sampled during irrigation season - EPA laboratory method



ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION

EDRUG FREE 🚍

POST OFFICE BOX 208B

STATE LAND OFFICE BUILOING

SANTA FE, NEW MEXICO 87504

(505) 827-5800

BRUCE KING GOVERNOR

May 26, 1994

ANITA LOCKWOOD CABINET SECRETARY

> CERTIFIED MAIL RETURN RECEIPT NO. P-111-334-117

Mr. Darrell Moore Environmental Specialist Navajo Refining Company P.O. Box 159 Artesia, New Mexico 88211-0159

RE: MODIFICATION TO DISCHARGE PLAN GW-28 NAVAJO REFINERY EDDY COUNTY, NEW MEXICO

Dear Mr. Moore:

The New Mexico Oil Conservation Division (OCD) has reviewed your April 29, 1994 and May 4, 1994 correspondence providing additional information related to Navajo refinery's proposal to modify Navajo's previously approved discharge plan for the Navajo Refinery to include the discharge of treated ground water from the remediation of contaminated ground water at the facility.

Your April 29, 1994 and May 4, 1994 letters only address item #2 and item #4 of the information requested by OCD on February 10, 1994. In order for the OCD to complete a review of Navajo's discharge plan modification request, the OCD requests that Navajo submit the following information which was requested by OCD on February 10, 1994:

- 1. Please provide a map showing the location of all onsite and offsite monitor wells and the exact location of all proposed discharge points including the farmland where treated ground water would be used for irrigation purposes.
- 2. The requested modification does not indicate whether the piping between the air stripper system and the pumping well system will be installed above ground or below grade. Please provide this information and a map showing the proposed location of all piping including piping to the discharge points. Please be aware that the OCD requires that all below

Mr. Darrell Moore May 26, 1994 Page 2

> grade piping carrying fluids which exceed New Mexico Water Quality Control Commission (WQCC) ground water standards be pressure tested to three (3) psi above operating pressure prior to operation.

Receipt of the above information will allow the OCD to complete a review to this discharge plan modification.

If you have any questions, please contact me at (505) 827-5885.

Sincerely,

William C. Olson Hydrogeologist Environmental Bureau

xc: OCD Artesia District Office Richard D. Mayer, EPA Region VI

	PS Form 3	300, Jun	ie 1991	• •••			
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BRUCE KING GOVERNOR

ANITA LOCKWOOD CABINET SECRETARY

> CERTIFIED MAIL RETURN RECEIPT NO. P 111 334 319

Mr. Darrell Moore Navajo Refining Company P.O. Box 159 Artesia, NM 88211-0159

RE: Reverse Osmosis Reject Sampling Navajo Artesia Refinery Eddy County, New Mexico

Dear Mr. Moore, in the RO Rejet Water file

The New Mexico Oil Conservation Division (OCD) has received your May 13, 1994 proposal to continue quarterly sampling of the Reverse Osmosis (RO) reject water and discontinue the bi-weekly analyses which were required in the April 27, 1993 discharge plan modification approval. This proposal is based on the data submitted with the proposal summarizing the historical sample analyses.

In the April 27, 1993 discharge plan modification approval, condition 7 states that "Major cations/anions and heavy metal analysis frequency can be reduced to quarterly, on a parameter-byparameter basis, upon application and OCD approval provided all analytical data in the previous year was no greater than seventyfive (75) percent of the effluent limit." The submitted summary indicates that:

- five of the analyzed parameters (chloride, fluoride, aluminum, manganese and lead) exceeded the discharge standard at least once during the first year of analysis;
- 2) chloride exceeded the 75% of standard threshold on eighteen of the nineteen analyses tabulated, fluoride nine of thirteen times, and sulfate two of nineteen times;
- 3) several of the parameter detection limits equaled or were greater than the relevant standard (aluminum, arsenic, beryllium, cadmium, cobalt, selenium, silver, lead and mercury); and

May 23, 1994

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were not measured at the required

view of the submitted data, the request lysis of the RO Reject Water is denied.

s, call me at (505)827-4080 or Roger

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