



April 27, 2015

Oil Conservation Division
District 2 – Artesia
811 S. First St.
Artesia, NM 88210

Re: Myox 21 SWD #1
30-015-22434
Sec. 21, T25S-R28E
Eddy County, NM

Mr. Mike Bratcher,

COG Operating LLC would like to submit for your consideration the enclosed work plan for the above captioned well. The plan is in response to the C-141 Initial report dated August 14, 2014.

Background

The release was caused when a needle valve atop the pumping T was sheared off releasing water to the ground. Repairs were made to the wellhead and vacuum trucks were dispatched to recover any standing fluid. The impacted area ran from the wellhead north approximately 350' into the pasture at the furthest point. The impacted area is an average of 140' wide.

Groundwater

Based on the Chevron Trend Maps and NMOSE, the release area would be classified at a site ranking of 10 due to the depth of groundwater at approximately 96'. No well information could be found for Section 21.

Soil Assessment and Analytical Results

Initial soil samples were taken on 8/25/2014; additional soil samples were taken on 3/10/2015 and 4/1/2015. Background samples indicated concentrations of chloride as high as 4560 mg/kg. Results indicated favorable concentrations at a depth of 4' (see attached site diagram).

Work Plan

COG proposes the excavation of the spill area to the depth of 3'. The area will be backfilled with like material.

If there are no objections or further stipulations, COG Operating LLC would like to begin the remediation process based on approval of this work plan. Please feel free to contact my with any questions or concerns at (505) 350-1336

Sincerely,



Amanda Trujillo

Senior Environmental Scientist

Enclosed

- (1) C-141 Initial (Copy)
- (2) Site Diagram and Summary Table
- (3) Laboratory Analysis

District I
1625 N. French Dr., Hobbs, NM 88240
District II
811 S. First St., 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

Form C-141
Revised August 8, 2011

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

Release Notification and Corrective Action

OPERATOR

☒ Initial Report ☐ Final Report

Name of Company: COG Operating LLC	Contact: Robert McNeill
Address: 600 West Illinois Avenue, Midland TX 79701	Telephone No. 432-230-0077
Facility Name: Myox 21 SWD #1	Facility Type: Battery

Surface Owner: State	Mineral Owner:	API No. 30-015-22434
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LOCATION OF RELEASE

Unit Letter E	Section 21	Township 25S	Range 28E	Feet from the 1980	North/South Line North	Feet from the 660	East/West Line West	County Eddy
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Latitude: 32.11699 Longitude: 104.09894

NATURE OF RELEASE

Type of Release: Produced Water	Volume of Release: 80 bbls	Volume Recovered: 30 bbls
Source of Release: Wellhead	Date and Hour of Occurrence: 8/14/2014 7:00 am	Date and Hour of Discovery: 8/14/2014 7:00 am
Was Immediate Notice Given? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Not Required	If YES, To Whom? Mike Bratcher – OCD	
By Whom? Amanda Trujillo	Date and Hour: 8/15/2014 4:33 am	
Was a Watercourse Reached? <input type="checkbox"/> Yes <input type="checkbox"/> No	If YES, Volume Impacting the Watercourse.	

If a Watercourse was Impacted, Describe Fully.*

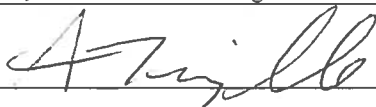
Describe Cause of Problem and Remedial Action Taken.*

The needle valve atop the pumping-T sheared off releasing water onto the ground. Repairs were made to wellhead and a vacuum truck was dispatched to pick up any standing fluid.

Describe Area Affected and Cleanup Action Taken.*

The impacted area is 300' x 200' to the north of the wellhead. Concho will have the spill site sampled to delineate any possible contamination from the release and we will present a remediation work plan to the NMOCD for approval prior to any significant remediation work.

I hereby certify that the information given above is true and complete to the best of my knowledge and understand that pursuant to NMOCD rules and regulations all operators are required to report and/or file certain release notifications and perform corrective actions for releases which may endanger public health or the environment. The acceptance of a C-141 report by the NMOCD marked as "Final Report" does not relieve the operator of liability should their operations have failed to adequately investigate and remediate contamination that pose a threat to ground water, surface water, human health 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.

Signature: 	OIL CONSERVATION DIVISION		
Printed Name: Amanda Trujillo	Approved by Environmental Specialist:		
Title: Senior Environmental Coordinator	Approval Date:	Expiration Date:	
E-mail Address: atrujillo@concho.com	Conditions of Approval:		Attached <input type="checkbox"/>
Date: August 28, 2014 Phone: 575-748-6940			

* Attach Additional Sheets If Necessary



Site Ranking: 10
Depth to GW per SEO: 96'

S1	GRO	DRO	TPH	BTEX	CI-
1'	<10.0	<10.0	<10.0	<0.300	3000
2'					2880
3'					3160
4'					2240
6'					528
8'					304
10'					128
S2	GRO	DRO	TPH	BTEX	CI-
1'	<10.0	<10.0	<10.0	<0.300	2160
2'					6240
3'					7440
4'					496
6'					400
8'					32
10'					128
S3	GRO	DRO	TPH	BTEX	CI-
1'	<10.0	<10.0	<10.0	<0.300	2120
2'					5840
3'					2200
4'					144
6'					64
8'					288
10'					2120
S4	GRO	DRO	TPH	BTEX	CI-
1'	<10.0	<10.0	<10.0	<0.300	488
2'					3080
3'					1760
4'					320
6'					208
8'					176
10'					80
Background					
S5	GRO	DRO	TPH	BTEX	CI-
1'	<10.0	<10.0	<10.0	<0.300	<16.0
2'					432
3'					1700
4'					4560
6'					176
8'					336
10'					592



PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

March 16, 2015

LUPE CARRASCO

COG OPERATING

P. O. BOX 1630

ARTESIA, NM 88210

RE: MYOX 21 SWD #1

Enclosed are the results of analyses for samples received by the laboratory on 03/12/15 9:29.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-13-5. Accreditation applies to drinking water, non-potable water and solid and chemical materials. All accredited analytes are denoted by an asterisk (*). For a complete list of accredited analytes and matrices visit the TCEQ website at www.tceq.texas.gov/field/qa/lab_accred_certif.html.

Cardinal Laboratories is accredited through the State of Colorado Department of Public Health and Environment for:

Method EPA 552.2	Haloacetic Acids (HAA-5)
Method EPA 524.2	Total Trihalomethanes (TTHM)
Method EPA 524.4	Regulated VOCs (V1, V2, V3)

Accreditation applies to public drinking water matrices.

This report meets NELAP requirements and is made up of a cover page, analytical results, and a copy of the original chain-of-custody. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Celey D. Keene

Lab Director/Quality Manager

Analytical Results For:

 COG OPERATING
 LUPE CARRASCO
 P. O. BOX 1630
 ARTESIA NM, 88210
 Fax To: NONE

 Received: 03/12/2015
 Reported: 03/16/2015
 Project Name: MYOX 21 SWD #1
 Project Number: NONE GIVEN
 Project Location: NOT GIVEN

 Sampling Date: 03/10/2015
 Sampling Type: Soil
 Sampling Condition: ** (See Notes)
 Sample Received By: Jodi Henson

Sample ID: S1 - 1' (H500668-01)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	3000	16.0	03/12/2015	ND	400	100	400	7.69	

Sample ID: S1 - 2' (H500668-02)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	2880	16.0	03/12/2015	ND	400	100	400	7.69	

Sample ID: S1 - 3' (H500668-03)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	3160	16.0	03/12/2015	ND	400	100	400	7.69	

Sample ID: S1 - 4' (H500668-04)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	2240	16.0	03/12/2015	ND	400	100	400	7.69	

Cardinal Laboratories

*=Accredited Analyte

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Celey D. Keene, Lab Director/Quality Manager

Analytical Results For:

COG OPERATING
LUPE CARRASCO
P. O. BOX 1630
ARTESIA NM, 88210
Fax To: NONE

Received: 03/12/2015
Reported: 03/16/2015
Project Name: MYOX 21 SWD #1
Project Number: NONE GIVEN
Project Location: NOT GIVEN

Sampling Date: 03/10/2015
Sampling Type: Soil
Sampling Condition: ** (See Notes)
Sample Received By: Jodi Henson

Sample ID: S2 - 1' (H500668-05)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	2160	16.0	03/12/2015	ND	400	100	400	7.69	

Sample ID: S2 - 2' (H500668-06)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	6240	16.0	03/12/2015	ND	400	100	400	7.69	

Sample ID: S2 - 3' (H500668-07)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	7440	16.0	03/12/2015	ND	400	100	400	7.69	

Sample ID: S2 - 4' (H500668-08)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	496	16.0	03/12/2015	ND	432	108	400	3.77	

Sample ID: S3 - 1' (H500668-09)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	2120	16.0	03/12/2015	ND	432	108	400	3.77	

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Celey D. Keene, Lab Director/Quality Manager

Analytical Results For:

COG OPERATING
LUPE CARRASCO
P. O. BOX 1630
ARTESIA NM, 88210
Fax To: NONE

Received: 03/12/2015
Reported: 03/16/2015
Project Name: MYOX 21 SWD #1
Project Number: NONE GIVEN
Project Location: NOT GIVEN

Sampling Date: 03/10/2015
Sampling Type: Soil
Sampling Condition: ** (See Notes)
Sample Received By: Jodi Henson

Sample ID: S3 - 2' (H500668-10)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	5840	16.0	03/12/2015	ND	432	108	400	3.77	

Sample ID: S3 - 3' (H500668-11)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	2200	16.0	03/12/2015	ND	432	108	400	3.77	

Sample ID: S3 - 4' (H500668-12)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	144	16.0	03/12/2015	ND	432	108	400	3.77	

Sample ID: S4 - 1' (H500668-13)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	448	16.0	03/12/2015	ND	432	108	400	3.77	

Sample ID: S4 - 2' (H500668-14)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	3080	16.0	03/12/2015	ND	432	108	400	3.77	

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Celey D. Keene, Lab Director/Quality Manager

Analytical Results For:

 COG OPERATING
 LUPE CARRASCO
 P. O. BOX 1630
 ARTESIA NM, 88210
 Fax To: NONE

 Received: 03/12/2015
 Reported: 03/16/2015
 Project Name: MYOX 21 SWD #1
 Project Number: NONE GIVEN
 Project Location: NOT GIVEN

 Sampling Date: 03/10/2015
 Sampling Type: Soil
 Sampling Condition: ** (See Notes)
 Sample Received By: Jodi Henson

Sample ID: S4 - 3' (H500668-15)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	1760	16.0	03/12/2015	ND	432	108	400	3.77	

Sample ID: S4 - 4' (H500668-16)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	320	16.0	03/12/2015	ND	432	108	400	3.77	

Sample ID: S5 - 1' (H500668-17)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	<16.0	16.0	03/12/2015	ND	432	108	400	3.77	

Sample ID: S5 - 2' (H500668-18)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	432	16.0	03/12/2015	ND	432	108	400	3.77	

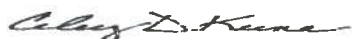
Sample ID: S5 - 3' (H500668-19)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	1700	16.0	03/12/2015	ND	432	108	400	3.77	

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Celey D. Keene, Lab Director/Quality Manager

Analytical Results For:COG OPERATING
LUPE CARRASCO
P. O. BOX 1630
ARTESIA NM, 88210
Fax To: NONEReceived: 03/12/2015
Reported: 03/16/2015
Project Name: MYOX 21 SWD #1
Project Number: NONE GIVEN
Project Location: NOT GIVENSampling Date: 03/10/2015
Sampling Type: Soil
Sampling Condition: ** (See Notes)
Sample Received By: Jodi Henson**Sample ID: S5 - 4' (H500668-20)**

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	4560	16.0	03/12/2015	ND	432	108	400	3.77	

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Celey D. Keene, Lab Director/Quality Manager

Notes and Definitions

ND	Analyte NOT DETECTED at or above the reporting limit
RPD	Relative Percent Difference
**	Samples not received at proper temperature of 6°C or below.
***	Insufficient time to reach temperature.
-	Chloride by SM4500Cl-B does not require samples be received at or below 6°C Samples reported on an as received basis (wet) unless otherwise noted on report

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Celey D. Keene, Lab Director/Quality Manager



CARDINAL
Laboratories

101 East Marland, Hobbs, NM 88240
(575) 393-2326 FAX (575) 393-2476

CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

[illegible]



101 East Marland, Hobbs, NM 88240
(575) 393-2326 FAX (575) 393-2476

CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

Company Name: CEC		P.O. #:		BILL TO																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																													
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Lab I.D. #50068		Sample I.D.		(G)RAB OR (C)OMP.		# CONTAINERS		GROUNDWATER		WASTEWATER		SOIL		OIL		SLUDGE		OTHER :		ACID/BASE		ICE / COOL		OTHER		DATE		TIME																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																					
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53-93'		102 53-94'		103 53-95'		104 53-96'		105 53-97'		106 53-98'		107 53-99'		108 53-100'		109 53-101'		110 53-102'		111 53-103'		112 53-104'		113 53-105'		114 53-106'		115 53-107'		116 53-108'		117 53-109'		118 53-110'		119 53-111'		120 53-112'		121 53-113'		122 53-114'		123 53-115'		124 53-116'		125 53-117'		126 53-118'		127 53-119'		128 53-120'		129 53-121'		130 53-122'		131 53-123'		132 53-124'		133 53-125'		134 53-126'		135 53-127'		136 53-128'		137 53-129'		138 53-130'		139 53-131'		140 53-132'		141 53-133'		142 53-134'		143 53-135'		144 53-136'		145 53-137'		146 53-138'		147 53-139'		148 53-140'		149 53-141'		150 53-142'		151 53-143'		152 53-144'		153 53-145'		154 53-146'		155 53-147'		156 53-148'		157 53-149'		158 53-150'		159 53-151'		160 53-152'		161 53-153'		162 53-154'		163 53-155'		164 53-156'		165 53-157'		166 53-158'		167 53-159'		168 53-160'		169 53-161'		170 53-162'		171 53-163'		172 53-164'		173 53-165'		174 53-166'		175 53-167'		176 53-168'		177 53-169'		178 53-170'		179 53-171'		180 53-172'		181 53-173'		182 53-174'		183 53-175'		184 53-176'		185 53-177'		186 53-178'		187 53-179'		188 53-180'		189 53-181'		190 53-182'		191 53-183'		192 53-184'		193 53-185'		194 53-186'		195 53-187'		196 53-188'		197 53-189'		198 53-190'		199 53-191'		200 53-192'		201 53-193'		202 53-194'		203 53-195'		204 53-196'		205 53-197'		206 53-198'		207 53-199'		208 53-200'		209 53-201'		210 53-202'		211 53-203'		212 53-204'		213 53-205'		214 53-206'		215 53-207'		216 53-208'		217 53-209'		218 53-210'		219 53-211'		220 53-212'		221 53-213'		222 53-214'		223 53-215'		224 53-216'		225 53-217'		226 53-218'		227 53-219'		228 53-220'		229 53-221'		230 53-222'		231 53-223'		232 53-224'		233 53-225'		234 53-226'		235 53-227'		236 53-228'		237 53-229'		238 53-230'		239 53-231'		240 53-232'		241 53-233'		242 53-234'		243 53-235'		244 53-236'		245 53-237'		246 53-238'		247 53-239'		248 53-240'		249 53-241'		250 53-242'		251 53-243'		252 53-244'		253 53-245'		254 53-246'		255 53-247'		256 53-248'		257 53-249'		258 53-250'		259 53-251'		260 53-252'		261 53-253'		262 53-254'		263 53-255'		264 53-256'		265 53-257'		266 53-258'		267 53-259'		268 53-260'		269 53-261'		270 53-262'		271 53-263'		272 53-264'		273 53-265'		274 53-266'		275 53-267'		276 53-268'		277 53-269'		278 53-270'		279 53-271'		280 53-272'		281 53-273'		282 53-274'		283 53-275'		284 53-276'		285 53-277'		286 53-278'		287 53-279'		288 53-280'		289 53-281'		290 53-282'		291 53-283'		292 53-284'		293 53-285'		294 53-286'		295 53-287'		296 53-288'		297 53-289'		298 53-290'		299 53-291'		300 53-292'		301 53-293'		302 53-294'		303 53-295'		304 53-296'		305 53-297'		306 53-298'		307 53-299'		308 53-300'		309 53-301'		310 53-302'		311 53-303'		312 53-304'		313 53-305'		314 53-306'		315 53-307'		316 53-308'		317 53-309'		318 53-310'		319 53-311'		320 53-312'		321 53-313'		322 53-314'		323 53-315'		324 53-316'		325 53-317'		326 53-318'		327 53-319'		328 53-320'		329 53-321'		330 53-322'		331 53-323'		332 53-324'		333 53-325'		334 53-326'		335 53-327'		336 53-328'		337 53-329'		338 53-330'		339 53-331'		340 53-332'		341 53-333'		342 53-334'		343 53-335'		344 53-336'		345 53-337'		346 53-338'		347 53-339'		348 53-340'		349 53-341'		350 53-342'		351 53-343'		352 53-344'		353 53-345'		354 53-346'		355 53-347'		356 53-348'		357 53-349'		358 53-350'		359 53-351'		360 53-352'		361 53-353'		362 53-354'		363 53-355'		364 53-356'		365 53-357'		366 53-358'		367 53-359'		368 53-360'		369 53-361'		370 53-362'		371 53-363'		372 53-364'		373 53-365'		374 53-366'		375 53-367'		376 53-368'		377 53-369'		378 53-370'		379 53-371'		380 53-372'		381 53-373'		382 53-374'		383 53-375'		384 53-376'		385 53-377'		386 53-378'		387 53-379'		388 53-380'		389 53-381'		390 53-382'		391 53-383'		392 53-384'		393 53-385'		394 53-386'		395 53-387'		396 53-388'		397 53-389'		398 53-390'		399 53-391'		400 53-392'		401 53-393'		402 53-394'		403 53-395'		404 53-396'		405 53-397'		406 53-398'		407 53-399'		408 53-400'		409 53-401'		410 53-402'		411 53-403'		412 53-404'		413 53-405'		414 53-406'		415 53-407'		416 53-408'		417 53-409'		418 53-410'		419 53-411'		420 53-412'		421 53-413'		422 53-414'		423 53-415'		424 53-416'		425 53-417'		426 53-418'		427 53-419'		428 53-420'		429 53-421'		430 53-422'		431 53-423'		432 53-424'		433 53-425'		434 53-426'		435 53-427'		436 53-428'		437 53-429'		438 53-430'		439 53-431'		440 53-432'		441 53-433'		442 53-434'		443 53-435'		444 53-436'		445 53-437'		446 53-438'		447 53-439'		448 53-440'		449 53-441'		450 53-442'		451 53-443'		452 53-444'		453 53-445'		454 53-446'		455 53-447'		456 53-448'		457 53-449'		458 53-450'		459 53-451'		460 53-452'		461 53-453'		462 53-454'		463 53-455'		464 53-456'		465 53-457'		466 53-458'		467 53-459'		468 53-460'		469 53-461'		470 53-462'		471 53-463'		472 53-464'		473 53-465'		474 53-466'		475 53-467'		476 53-468'		477 53-469'		478 53-470'		479 53-471'		480 53-472'		481 53-473'		482 53-474'		483 53-475'		484 53-476'		485 53-477'		486 53-478'		487 53-479'		488 53-480'		489 53-481'		490 53-482'		491 53-483'		492 53-484'		493 53-485'		494 53-486'		495 53-487'		496 53-488'		497 53-489'		498 53-490'		499 53-491'		500 53-492'		501 53-493'		502 53-494'		503 53-495'		504 53-496'		505 53-497'		506 53-498'		507 53-499'		508 53-500'		509 53-501'		510 53-502'		511 53-503'		512 53-504'		513 53-505'		514 53-506'		515 53-507'		516 53-508'		517 53-509'		518 53-510'		519 53-511'		520 53-512'		521 53-513'		522 53-514'		523 53-515'		524 53-516'		525 53-517'		526 53-518'		527 53-519'		528 53-520'		529 53-521'		530 53-522'		531 53-523'		532 53-524'		533 53-525'		534 53-526'		535 53-527'		536 53-528'		537 53-529'		538 53-530'		539 53-531'		540 53-532'		541 53-533'		542 53-534'		543 53-535'		544 53-536'		545 53-537'		546 53-538'	



CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

Page 10 of 10



PHONE (575) 393-2326 • 101 E. MARLAND • HOBBS, NM 88240

April 10, 2015

AMANDA TRUJILLO

COG OPERATING

P. O. BOX 1630

ARTESIA, NM 88210

RE: MYOX 21 SWD #1

Enclosed are the results of analyses for samples received by the laboratory on 04/02/15 12:45.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-13-5. Accreditation applies to drinking water, non-potable water and solid and chemical materials. All accredited analytes are denoted by an asterisk (*). For a complete list of accredited analytes and matrices visit the TCEQ website at www.tceq.texas.gov/field/qa/lab_accred_certif.html.

Cardinal Laboratories is accredited through the State of Colorado Department of Public Health and Environment for:

Method EPA 552.2	Haloacetic Acids (HAA-5)
Method EPA 524.2	Total Trihalomethanes (TTHM)
Method EPA 524.4	Regulated VOCs (V1, V2, V3)

Accreditation applies to public drinking water matrices.

This report meets NELAP requirements and is made up of a cover page, analytical results, and a copy of the original chain-of-custody. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Celey D. Keene

Lab Director/Quality Manager

Analytical Results For:

 COG OPERATING
 AMANDA TRUJILLO
 P. O. BOX 1630
 ARTESIA NM, 88210
 Fax To: NONE

 Received: 04/02/2015
 Reported: 04/10/2015
 Project Name: MYOX 21 SWD #1
 Project Number: NONE GIVEN
 Project Location: NOT GIVEN

 Sampling Date: 04/01/2015
 Sampling Type: Soil
 Sampling Condition: ** (See Notes)
 Sample Received By: Jodi Henson

Sample ID: S1 6' (H500891-01)

Chloride, SM4500Cl-B		mg/kg	Analyzed By: AP						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	528	16.0	04/07/2015	ND	400	100	400	0.00	

Sample ID: S1 8' (H500891-02)

Chloride, SM4500Cl-B		mg/kg	Analyzed By: AP						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	304	16.0	04/07/2015	ND	400	100	400	0.00	

Sample ID: S1 10' (H500891-03)

Chloride, SM4500Cl-B		mg/kg	Analyzed By: AP						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	128	16.0	04/07/2015	ND	400	100	400	0.00	

Sample ID: S2 6' (H500891-04)

Chloride, SM4500Cl-B		mg/kg	Analyzed By: AP						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	400	16.0	04/07/2015	ND	400	100	400	0.00	

Cardinal Laboratories

*=Accredited Analyte

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Celey D. Keene, Lab Director/Quality Manager

Analytical Results For:

COG OPERATING
AMANDA TRUJILLO
P. O. BOX 1630
ARTESIA NM, 88210
Fax To: NONE

Received: 04/02/2015
Reported: 04/10/2015
Project Name: MYOX 21 SWD #1
Project Number: NONE GIVEN
Project Location: NOT GIVEN

Sampling Date: 04/01/2015
Sampling Type: Soil
Sampling Condition: ** (See Notes)
Sample Received By: Jodi Henson

Sample ID: S2 8' (H500891-05)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	32.0	16.0	04/07/2015	ND	400	100	400	0.00	

Sample ID: S2 10' (H500891-06)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	128	16.0	04/07/2015	ND	400	100	400	0.00	

Sample ID: S3 6' (H500891-07)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	64.0	16.0	04/07/2015	ND	400	100	400	0.00	

Sample ID: S3 8' (H500891-08)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	288	16.0	04/07/2015	ND	400	100	400	0.00	

Sample ID: S3 10' (H500891-09)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	2120	16.0	04/07/2015	ND	400	100	400	0.00	

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Caley D. Keene, Lab Director/Quality Manager

Analytical Results For:

COG OPERATING
AMANDA TRUJILLO
P. O. BOX 1630
ARTESIA NM, 88210
Fax To: NONE

Received: 04/02/2015
Reported: 04/10/2015
Project Name: MYOX 21 SWD #1
Project Number: NONE GIVEN
Project Location: NOT GIVEN

Sampling Date: 04/01/2015
Sampling Type: Soil
Sampling Condition: ** (See Notes)
Sample Received By: Jodi Henson

Sample ID: S4 6' (H500891-10)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	208	16.0	04/07/2015	ND	400	100	400	0.00	

Sample ID: S4 8' (H500891-11)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	176	16.0	04/07/2015	ND	400	100	400	0.00	

Sample ID: S4 10' (H500891-12)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	80.0	16.0	04/07/2015	ND	400	100	400	0.00	

Sample ID: S5 6' (H500891-13)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	176	16.0	04/07/2015	ND	416	104	400	0.00	

Sample ID: S5 8' (H500891-14)

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AP					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	336	16.0	04/07/2015	ND	416	104	400	0.00	

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Celey D. Keene, Lab Director/Quality Manager

Analytical Results For:COG OPERATING
AMANDA TRUJILLO
P. O. BOX 1630
ARTESIA NM, 88210
Fax To: NONEReceived: 04/02/2015
Reported: 04/10/2015
Project Name: MYOX 21 SWD #1
Project Number: NONE GIVEN
Project Location: NOT GIVENSampling Date: 04/01/2015
Sampling Type: Soil
Sampling Condition: ** (See Notes)
Sample Received By: Jodi Henson**Sample ID: S5 10' (H500891-15)****Chloride, SM4500Cl-B****mg/kg****Analyzed By: AP**

Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	592	16.0	04/07/2015	ND	416	104	400	0.00	

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Celey D. Keene, Lab Director/Quality Manager

Notes and Definitions

ND	Analyte NOT DETECTED at or above the reporting limit
RPD	Relative Percent Difference
**	Samples not received at proper temperature of 6°C or below.
***	Insufficient time to reach temperature.
-	Chloride by SM4500Cl-B does not require samples be received at or below 6°C
	Samples reported on an as received basis (wet) unless otherwise noted on report

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Celey D. Keene, Lab Director/Quality Manager



101 East Marland, Hobbs, NM 88240
(575) 393-2326 FAX (575) 393-2476

CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

Company Name: COG Operating LLC

Project Manager:

Address: 2208 West Main

City: Artesia

Phone #: (575) 748-6930

Project #:

Project Name: Myox 21 SWD #1

Project Location:

Sample Name: Amanda Trujillo

FOR LAB USE ONLY

Lab I.D.

Sample I.D.

H5C0891

S1 6'
S1 8'
S1 10'
S2 6'
S2 8'
S2 10'
S3 6'
S3 8'
S3 10'
S4 6'
S4 8'
S4 10'
S5 6'
S5 8'
S5 10'

15
14
13
12
11
10
9
8
7
6
5
4
3
2
1

(G)RAB OR (C)OMP

CONTAINERS

GROUNDWATER

WASTEWATER

SOIL

OIL

SLUDGE

OTHER :

ACID/BASE:

ICE / COOL

OTHER :

DATE

TIME

BTEX

TPH

Chloride

X

X

X

X

X

X

X

X

X

X

X

X

X

X

X

X

X

X

X

X

X

BILL TO

P.O. #:

Company: COG Operating LLC

Attn: Robert McNeill

Address: 600 W Illinois

City: Midland

State: TX Zip: 79701

Phone #: (432) 221-0388

Fax #:

ANALYSIS REQUEST

Relinquished By:

Relinquished By:

Delivered By: (Circle One)

Sampler - UPS - Bus - Other:

FORM 006-B.2.0

Date: 4/15
Time: 18:45
Received By: [Signature]

Date: 4/15
Time: 18:45

Sample Condition
Cool Impact
☐ Yes ☒ No

CHECKED BY: [Signature]

Phone Result: ☐ Yes ☒ No Add'l Phone #:
Fax Result: ☐ Yes ☒ No Add'l Fax #:

REMARKS:

† Cardinal cannot accept verbal changes. Please fax written changes to 575-393-2476