District I - (505) 393-6161
P O Box 1980
Hobbs, NM 88241-1980
District II - (505) 748-1283
811 South First
Artesia, NM 88210
District III - (505) 334-6178
1000 Rio Brazos Road
Aztec, NM 87410
District IV - (505) 827-7131

State of New Mexico
Energy Mineral and Natural Resources Department
Oil Conservation Division
1220 South St. Francis Drive
Santa Fe, New Mexico 87505
(505) 476-3440

Form C-141
Originated 2/13/97

Submit 2 copies to Appropriate District Office in accordance with Rule 116 on back side of form

JUN 2002 RECEIVED OIL CONS. DIV. DIST. 3

30 045 30130

Release Notification and Corrective Action
OPERATOR

☐ Initial Report ★ Final Report

Name	Contact
Marathon Oil Company	Trenis Sondresen or Ken Holt
Address	**Telephone No.**
P.O. Box 1439, Farmington, NM 87499	(505) 326-2783
Facility Name	**Facility Type**
Owen 1A	Well

Surface Owner	Mineral Owner	Lease No.
Lewis Montoya	Marathon	078243

LOCATION OF RELEASE

Unit Letter	Section	Township	Range	Feet from the	North/South Line	Feet from the	East/West Line	County
K	7	31N	12W	1975	South	1980	West	San Juan

NATURE OF RELEASE

Type of Release	Volume of Release	Volume Recovered
~~Split~~ 125 bbls condensate and water	105 bbls cond & 20 BW	10 BC

Source of Release	Date of Occurrence	Hour of Occurrence	Date of Discovery	Hour of Discovery
Tank Split Tank Bottom	03/05/02	4:00 PM	03/05/02	4:00 PM

Was Immediate Notice Given?	If YES, To Whom?
★ Yes ☐ No ☐ Not Required	Steve Hayden

By Whom?	Date of Notification	Hour of Notification
Ken Holt	03/06/02	8:40 AM

Was a Watercourse Reached?	If YES, Volume Impacting the Watercourse.
☐ Yes ★ No	

If a watercourse was Impacted, Describe Fully (Attach Additional Sheets If Necessary)

Describe Cause of Problem and Remedial Action Taken (Attach Additional Sheets if Necessary)

Bottom of tank split due to the water freezing and thawing in bottom of tank. Affected soil was excavated and spread out on location for remediation by aeration.

Describe Area Affected and Cleanup Action Taken (Attach Additional Sheets if Necessary)

Affected area was inside diked area and was approximately 60' x 36' x 12' deep.

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 regulation 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 thread 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: Trenis Sondresen	Approved by District Supervisor: Denny Foust for Frank Chavez
Title: Area Engineer	Approval Date: 06/14/02 Expiration Date:
Date: 6/6/02 Phone: (505) 326-2783	Conditions of Approval: Attached ☐

nDGF0206634542

Remediation activities began on March 6, 2002, by excavating the affected soil (See Appendix D - Photo 1). The excavation was monitored by field screening the soil from the limits of the excavation using a photo-ionization detector (PID) organic vapor meter (OVM). Laboratory confirmation grab samples were collected from the limits of the excavation on March 12, for Benzene, Toluene, Ethylbenzene, and Xylenes (BTEX) and TPH analyses by EPA methods 8021B and 8015, respectively. The grab samples were collected from the bottom four corners of the excavation at 12 feet below ground surface (bgs), from the north and south sidewalls at 11 feet bgs, and from the bottom center of the excavation at 12 feet bgs (See Appendix E - Site Excavation Diagram). The samples exhibited Benzene, total BTEX, and TPH concentrations below the NMOCD site cleanup levels of 10 mg/kg, 50 mg/kg and 5,000 mg/kg, respectively, except for the sample from the bottom center at 12 feet, which exhibited a total BTEX concentration of 237.15 mg/kg. A summary of laboratory soil analyses is presented in Table I of Appendix F along with laboratory analytical reports.

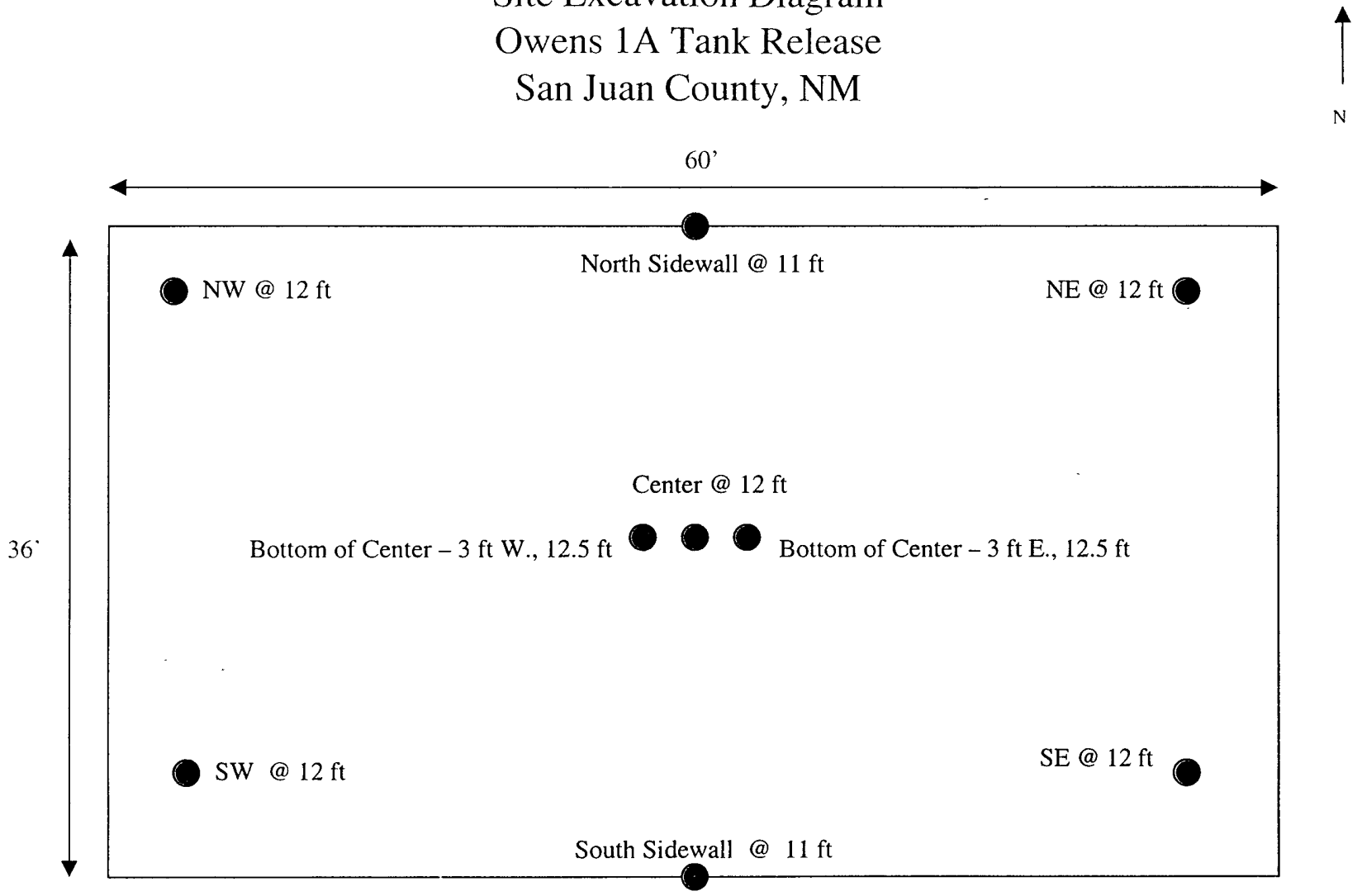
On March 15, Marathon resampled the bottom center of the excavation approximately three feet east and west of the original sample at a depth of 12.5 feet bgs. This was the depth of auger refusal, due to a hard indurated siltstone layer (Photo 2). The laboratory analyses of the two samples from the bottom center of the excavation at 12.5 feet indicated Benzene, total BTEX, and TPH concentrations below the site cleanup levels of 10 mg/kg, 50 mg/kg and 5,000 mg/kg, respectively (See Appendix F - Table I). However, on March 26, based on the total BTEX concentration of the original bottom sample and at your request, Marathon applied 55 gallons of peroxide to the bottom center of the excavation to facilitate oxidation of the volatile organic hydrocarbons remaining in the soil (Photo 3). In addition, at your request, Marathon collected one composite sample of the four sidewalls at a depth of approximately six feet bgs on March 22. Laboratory analysis of the NSEW Sidewall Comp @ 6 ft sample indicated non-detectable concentrations of Benzene and TPH and a total BTEX concentration of 0.146 mg/kg, which is below the site cleanup level of 50 mg/kg (See Appendix F - Table I).

Approximately 800 cubic yards (CY) of affected soil was excavated from the tank release area (Photo 4). The excavated soil was spread out over the location approximately 1-1.5 feet thick to allow for aeration of the volatile organic hydrocarbons and to facilitate representative composite sampling (See Appendix G - Stockpiled Soil Diagram). The stockpiled soil was also bermed to prevent stormwater runoff and to collect stormwater for enhanced bioremediation.

The excavated stockpiled soil was gridded-off into eight 100 CY quadrants and five-point composite samples were collected from each quadrant for BTEX and TPH laboratory analyses on March 15. The laboratory analyses of the stockpile composite samples indicated that three of the eight quads (4 SC, 7 SC, & 8 SC) exhibited Benzene, total BTEX, and TPH concentrations below the site cleanup levels, and that the remaining five quads exhibited Benzene and TPH concentrations below their respective cleanup levels, but exhibited total BTEX concentrations above the site cleanup level of 50 mg/kg (See Appendix F -Table I). Therefore, on March 27, with your approval, Marathon placed the 300 CY of soil from Quads 4 SC, 7 SC, and 8 SC back into the excavated area (Photo 5). The remaining stockpiled soil was then spread out thinner (approximately eight inches thick) across the location to further promote aeration of the volatile organic hydrocarbons.

On April 9, after screening samples with the PID, Marathon collected one five-point composite sample (5 pt Composite) from the remaining 500 CY of stockpiled soil for BTEX laboratory confirmation analysis. The laboratory analysis indicated that the sample exhibited a total BTEX concentration of 5.19 mg/kg, which is below the site cleanup level of 50 mg/kg (See Appendix F - Table I).

Site Excavation Diagram
Owens 1A Tank Release
San Juan County, NM



LEGEND

NW @ 12 ft = Grab soil sample location and depth

Stockpiled Soil Diagram
Owens 1A Tank Release
San Juan County, NM