

Golder Associates Inc.
44 Union Boulevard, Suite 300
Lakewood, CO USA 80228
Telephone: (303) 980-0540
Fax: (303) 985-2080
www.golder.com



November 13, 2008

Our Ref.: 083-81544B

Colorado Oil and Gas Conservation Commission
707 Wapati Ct., Suite 204
Rifle, CO 81650

Attention: Mr. Chris Canfield, P.G., Environmental Protection Specialist, NW Region

**RE: REPORT ON SOIL GAS SAMPLING AND ANALYSIS AT MARATHON OIL
COMPANY PAD 23X, GARFIELD COUNTY, COLORADO**

Dear Mr. Canfield:

On behalf of Marathon Oil Company, we are pleased to submit this *Report on Soil Gas Sampling and Analysis at Marathon Oil Company Pad 23X, Garfield County, Colorado*. Investigations described in the enclosed report were performed based on communications with the Colorado Oil and Gas Conservation Commission and the September 26, 2008 *Sampling and Analysis Plan for Soil Gas Survey at Marathon Oil Company Pad 23X, Garfield County, Colorado*.

We appreciate your consideration of the investigative results provided in this report. If you have any questions or require additional information, please feel free to contact Adell Heneghan at 970-210-9340 or the undersigned at 303-980-0540.

Sincerely,

GOLDER ASSOCIATES INC.

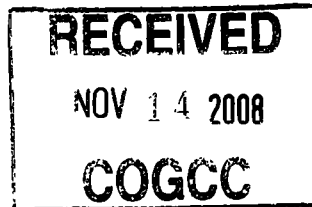
Randy March, P.E., P.G.
Principal Geological Engineer

Rick Kinshella, P.E.
Associate and Senior Consultant

cc: Debbie Baldwin, COGCC
Adell Heneghan, Marathon Oil Company
Randall Ferguson, Petroleum Development Corporation
Mike Unger, LT Environmental Inc.

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TRANSMITTAL LETTER

DATE: November 13, 2008

PROJECT NO.: 083-81544B

TO: COGCC
1120 Lincoln Street, Suite 801
Denver, CO 80203

303-894-2100

Attention: Debbie Baldwin, Environmental Manager

SENT VIA: FedEx (standard)

QUANTITY	ITEM	DESCRIPTION
1	Copy	Report on Soil and Gas Sampling and Analysis at Marathon Oil Company PAD 23X Garfield County, Colorado
REMARKS:		

Per Randy March, P.E., P.G. / Rick Kinshella, P.E.

I:\08\81544B\0100\08381544B TL PAD 23X 13NOV08 DOCX





OXY USA WTP LP

Conn Camp Abatement/Corrective Action Plan for Two COGCC Notice of Alleged Violations 200191194 & 200191192

Prepared for

Colorado Oil and Gas Conservation Commission
707 Wapiti Court, Suite 204
Rifle, Colorado 81650

Prepared by

OXY USA WTP LP
2754 Compass Drive, Suite 170
Grand Junction, Colorado 81506

Submitted July 11, 2008

Table of Contents

	Page
I. Signed NOAV's	1
a. NOAV 697-09-52B: COGCC #2001911194	
b. NOAV 697-09-60D: COGCC #2001911192	
II. Incident Overview	2
III. OXY Agency Coordination	3
IV. OXY Abatement/Corrective Action Plan (NOAV Response)	4
V. Form 27 – Remediation Work Plan	8
Appendix A: Agency Communications	
Appendix B: Timeline of events	
Appendix C: Figures and Maps	
Appendix D: Drilling Fluids Recap	
Appendix E: OXY's Expenses Incurred to Date	
Appendix F: Analytical Data Collected to Date and Sample Locations	
Appendix G: Proposed Sampling Points, Sampling Frequency, and Analytical Methods	

I. Signed NOAV's

Notices of Alleged Violation (NOAV's) have been signed by Daniel I. Padilla, OXY's Regulatory Coordinator and Designated Agent, see attached.

- a. NOAV 697-09-52B: COGCC #2001911194
- b. NOAV 697-09-60D: COGCC #2001911192



06/20/2008

200191192

*** NOTICE OF ALLEGED VIOLATION ***

OGCC Operator Number: 66571
Name of Operator: OXY USA WTP LP
Address: 2754 COMPASS DRIVE, SUITE 170
City: GRAND JUNCTION State: CO Zip: 81506
Company Representative: DANIEL PADILLA

Date Notice Issued:

06/20/2008

Well Name: CASCADE CREEK Well Number: 697-9-60D Facility Number: 291105
Location (QtrQtr, Sec, Twp, Rng, Meridian): SWSE 9 6S 97W 6 County: GARFIELD
API Number: 05 045 14298 00 Lease Number:

COGCC Representative: BALDWIN DEBBIE Phone Number: 303 894-2100

THE FOLLOWING ALLEGED VIOLATION WAS FOUND BY THE COGCC REPRESENTATIVE FOR THE SITE LISTED

Date of Alleged Violation: 06/16/2008

Approximate Time of Violation:

Description of Alleged Violation:

Unauthorized discharge of E&P waste has occurred from oil and gas operations associated with the Cascade Creek #697-9-60D well (05-045-14298) and the Cascade Creek #697-09-52B well (05-045-14445) and has impacted ground and surface water.

On 6/16/08 Oxy notified COGCC that water impacted by E&P waste was emanating from several springs located in the southern part of Section 9, 6S, 97W, Garfield County and flowing into and down tributaries to Cascade Canyon. On 6/17/08 Chris Canfield (COGCC EPS II) met Oxy representatives and inspected the site. He noted both visible sheen and free phase produced on surface water, stained sediments along the banks of the streams, strong hydrocarbon odor, and potentially impacted vegetation. On 6/19/08 COGCC staff returned to the site and collected water samples from springs, surface water, and cabins.

Act, Order, Regulation, Permit Conditions Cited:

209, 324A.a, 324A.b, 902.a, 906.a, 906.b.(3), 907.a.(1), 907.a.(2)

Abatement or Corrective Action Required to be Performed by Operator:

Provide written descriptions of: 1. any pits constructed or used on the wellpad, including size, volume, whether or not the pit was lined; 2. all fluids (water, drilling, completion, and frac fluids, flowback, etc.) placed in the pit, including volumes, dates, etc. Include haul tickets for all fluids brought from offsite to the pit(s); 3. whether condensate was observed in the pit during flowback or completion; 4. tanks or other containers that were used at this site to manage fluids and any spills/releases that occurred; 5. emergency response activities, including the locations of structures built to contain and manage impacted water, volumes of water removed, method of treatment and disposal and tracer dye study. Submit: 1. Form 27 for COGCC review, and 2. all analytical data collected to date. In addition consult with & mitigate impacts to surface owners' springs, including 1. fencing impacted surface water to restrict access by livestock & wildlife and 2. providing them with a supply of water for drinking & other household use and for watering livestock

Abatement or Corrective Action to be Completed by (date): 07/07/2008

* Proper and timely abatement does not necessarily preclude the assessment of penalties and an Order Finding Violation.

TO BE COMPLETED BY OPERATOR - When alleged violation is corrected, sign this notice and return to above address:

Company Representative Name: Daniel I. Padilla Title: Regulatory Coordinator
Signature: [Signature] Date: 7/10/08
Company Comments:

Attached please find OXY's NOAV response.

*** THIS NOTICE CONSTITUTES A SEPARATE NOTICE OF ALLEGED VIOLATION FOR EACH VIOLATION LISTED ***

WARNING

Abatement and reporting time frames for Notices of Alleged Violation begin upon receipt of the Notice or five days after the date it is mailed, whichever is earlier. Each violation must be abated within the prescribed time upon receipt of this Notice, reported to the Colorado Oil and Gas Conservation Commission at the address shown above, and postmarked no later than the next business day after the prescribed time for abatement. Should abatement or corrective action fail to occur, the Director may make application to the Commission for an Order Finding Violation. Proper and timely abatement does not necessarily preclude the assessment of penalties and an Order Finding Violation.

PENALTY PROPOSED BY THE DIRECTOR PER RULE 523

The Director may propose a penalty as listed in the table below, not to exceed a maximum of \$1,000.00 per day per violation. Such proposed penalty amount will be limited to \$10,000.00 per violation if the violation does not result in significant waste of oil and gas resources, damage to correlative rights, or a significant adverse impact on public health, safety, or welfare. Such proposed penalty amount may be increased if aggravating factors indicate the violation: was intentional or reckless; had, or threatened to have, a significant negative impact on public health, safety, or welfare; resulted in significant waste of oil and gas resources; had a significant negative impact on correlative rights of other parties; resulted in, or threatened to result in, significant loss or damage to public or private property, involved recalcitrance or recidivism upon the part of the violator, involved intentional false reporting or record keeping; resulted in economic benefit to the violator. Such proposed penalty amount may be decreased if mitigating factors indicate the violator, self-reported; promptly, effectively and prudently responded to the violation; cooperated with the Commission or other agencies with respect to the violation, could not reasonably control, or be responsible for, the cause of the violation; made a good faith effort to comply with applicable requirements prior to the Commission learning of the violation; had any economic benefit reduced or eliminated due to the cost of correcting the violation; or the Commission or other agencies with respect to the violation; could not reasonably control, or be responsible for, the cause of the violation, made a good faith effort to comply with applicable requirements prior to the Commission learning of the violation; had any economic benefit reduced or eliminated due to the cost of correcting the violation; has demonstrated a history of compliance with Commission rules, regulations, and orders. The Commission has final authority over the penalty amount assessed.

BASE FINE \$250.00 PER DAY PER VIOLATION RULES 210, 307, 311, 312, 313, 314A, 315, 403, 405, 803, 804
BASE FINE \$500.00 PER DAY PER VIOLATION RULES 208, 209, 207, 208, 302, 306, 309, 310, 316A, 321, 322, 326, 329, 330, 331, 332, 401
BASE FINE \$750.00 PER DAY PER VIOLATION RULES 605, 606A, 608B, 607
BASE FINE \$1,000.00 PER DAY PER VIOLATION RULES 208, 301, 303, 305, 306, 316B, 317, 317A, 318, 319, 320, 323, 324, 325, 326, 327, 333, 404, 602, 603, 604, 703, 704, 705, 708, 707, 708, 709, 711, 802, 801, 802, 903, 904, 905, 906, 907, 908, 909, 910, 911, 912, 1002, 1003, 1004, 1101, 1102, 1103

In accordance with Rule 523.A.(4), fines for violations for which no base fine is listed shall be determined by the Commission at its discretion.

Signature of COGCC Representative:

[Signature: Debbie Baldwin]

Date: 06/20/2008

Time: 1:45PM

Resolution Approved by:

Date:



06/20/2008

200191194

*** NOTICE OF ALLEGED VIOLATION ***

OGCC Operator Number 66571
Name of Operator OXY USA WTP LP
Address: 2754 COMPASS DRIVE, SUITE 170
City: GRAND JUNCTION State: CO Zip: 81506
Company Representative: DANIEL PADILLA

Date Notice Issued:

06/20/2008

Well Name: CASCADE CREEK Well Number 697-09-52B Facility Number: 291565
Location (QtrQtr, Sec, Twp, Rng, Meridian): SWSE 9 6S 97W 6 County: GARFIELD
API Number: 05 045 14445 00 Lease Number:

COGCC Representative: ANDREWS DAVID Phone Number: 303 894-2100

THE FOLLOWING ALLEGED VIOLATION WAS FOUND BY THE COGCC REPRESENTATIVE FOR THE SITE LISTED

Date of Alleged Violation: 06/16/2008

Approximate Time of Violation:

Description of Alleged Violation:

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Act, Order, Regulation, Permit Conditions Cited:

209, 324A.a, 324A.b, 902.a, 906.a, 906.b.(3), 907.a.(1), 907.a.(2)

Abatement or Corrective Action Required to be Performed by Operator:*

Provide written descriptions of: 1. any pits constructed or used on the wellpad, including size, volume, whether or not the pit was lined; 2. all fluids (water, drilling, completion, and frac fluids, flowback, etc.) placed in the pit, including volumes, dates, etc. Include haul tickets for all fluids brought from offsite to the pit(s); 3. whether condensate was observed in the pit during flowback or completion; 4. tanks or other containers that were used at this site to manage fluids and any spills/releases that occurred; 5. emergency response activities, including the locations of structures built to contain and manage impacted water, volumes of water removed, method of treatment and disposal and tracer dye study. Submit: 1. Form 27 for COGCC review, and 2. all analytical data collected to date. In addition consult with & mitigate impacts to surface owners' springs, including 1. fencing impacted surface water to restrict access by livestock & wildlife and 2. providing them with a supply of water for drinking & other household use and for watering livestock

Abatement or Corrective Action to be Completed by (date):

07/07/2007

* Proper and timely abatement does not necessarily preclude the assessment of penalties and an Order Finding Violation.

TO BE COMPLETED BY OPERATOR - When alleged violation is corrected, sign this notice and return to above address:

Company Representative Name: Daniel Padilla Title: Regulatory Coordinator
Signature: [Signature] Date: 7/10/08
Company Comments:

Attached please find OXY's NOAV response

*** THIS NOTICE CONSTITUTES A SEPARATE NOTICE OF ALLEGED VIOLATION FOR EACH VIOLATION LISTED ***

WARNING

Abatement and reporting time frames for Notices of Alleged Violation begin upon receipt of the Notice or five days after the date it is mailed, whichever is earlier. Each violation must be abated within the prescribed time upon receipt of this Notice, reported to the Colorado Oil and Gas Conservation Commission at the address shown above, and postmarked no later than the next business day after the prescribed time for abatement. Should abatement or corrective action fail to occur, the Director may make application to the Commission for an Order Finding Violation. Proper and timely abatement does not necessarily preclude the assessment of penalties and an Order Finding Violation.

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BASE FINE \$500.00 PER DAY PER VIOLATION: RULES 205, 206, 207, 208, 302, 306, 308, 310, 316A, 321, 322, 323, 326, 330, 331, 332, 401
BASE FINE \$750.00 PER DAY PER VIOLATION: RULES 803, 806A, 806B, 807
BASE FINE \$1,000.00 PER DAY PER VIOLATION: RULES 209, 301, 303, 305, 306, 316B, 317, 317A, 318, 319, 320, 323, 324, 325, 326, 327, 383, 404, 602, 603, 604, 703, 704, 705, 706, 707, 708, 709, 711, 802, 901, 902, 903, 904, 905, 906, 907, 908, 909, 910, 911, 912, 1002, 1003, 1004, 1101, 1102, 1103

In accordance with Rule 523.a.(4), fines for violations for which no base fine is listed shall be determined by the Commission at its discretion.

Signature of COGCC Representative:

[Signature]

Date: 06/20/2008

Time: 1:45PM

Resolution Approved by:

Date:

II. Incident Overview

On Monday, June 16, 2008 at approximately 4:00 P.M., OXY USA WTP LP (OXY) was notified of a potential contamination of surface water originating from a natural spring(s) and entering an unnamed intermittent drainage of upper Cascade Canyon, located in Section 16, Township 6 South, Range 97 West, Garfield County, Colorado. A berm was constructed at approximately 6:00 P.M. in the unnamed drainage, consisting of dirt supported by barriers with socks (booms) and hay bales to absorb any possible contaminant(s). Two bell holes were constructed at the bermed locations to collect the water from the unnamed drainage. Water collected from both locations was pumped to a lined pit located at the Cascade Creek 697-09-61 Pad.

OXY postulates that condensate and produced water discharged into the unlined reserve pit located on OXY's 697-09-61 pad may have travelled subsurface from the pit to the spring(s). OXY's 697-09-61 pad was constructed in August 2007 as a multi-well pad; four wells were permitted in 2007, but only two were drilled in 2007. Additional wells have been permitted in 2008. The Conditions of Approval (COA's) for the approved 2007 wells did not stipulate that the reserve pit would have to be lined (see Appendix A). It is now OXY's policy to line all new drilling reserve pits. Furthermore, the COA's for wells (on 697-09-61 pad) approved in 2008 stipulate that reserve pits shall be lined and permitted in accordance with the Notice to Operators, *Drilling wells within ¾ mile of the rim of the Roan Plateau in Garfield County*, (June 12, 2008).

In response to the release, the Colorado Oil and Gas Conservation Commission (COGCC) issued two NOAV's on June 20, 2008. The NOAV's were assigned to the existing wells located on OXY's 697-09-61 pad; NOAV No. 200191194 was issued to the 697-09-52B well (API No. 05-045-14445-00) and NOAV No. 200191192 was issued to the 697-09-60D well (API No. 05-045-14298-00).

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III. OXY Agency Coordination

After the release was verified by OXY's Health Environmental and Safety personnel, OXY's Regulatory group made verbal notifications on the evening of June 16th to the following government agencies: the National Response Center (issued OXY with Report No. 874341), the Colorado Department of Public Health and Environment (CDPHE), and the COGCC.

On June 17th, the COGCC returned OXY's telephone call and requested additional information. The COGCC requested that OXY contact the U.S. Army Corps of Engineers (USACE) regarding OXY's berming of the unnamed drainage. OXY contacted the USACE later that same day. The USACE requested that OXY provide it with additional details regarding the incident and a location map of the incident, and scheduled an on-site inspection for June 24, 2007. From June 17th through June 19th OXY and the COGCC corresponded by phone and by email regarding the incident. The COGCC conducted its first on-site inspection on June 17th and conducted its second on-site inspection on June 19th. The Colorado Division of Wildlife (DOW) also attended the on-site. The DOW Officer was satisfied with OXY's spill response/cleanup efforts and did not feel that there was any threat to wildlife at that time. The COGCC requested that OXY provide it with a Form 19 – Spill/Release Report as soon as possible. OXY provided the COGCC with the Form 19 on the evening of June 20th. As noted above, the COGCC issued two NOAV's on June 20th.

OXY provided the USACE with written notification on June 23, 2008 and provided the agency with an on-site inspection on June 24th. The USACE surveyed the area and stated that it would provide OXY with its permitting and compliance procedures. The USACE provided OXY with guidance via email on July 2, 2008 (see Appendix A). OXY is working with a third party contractor to complete the USACE permitting.

The COGCC attended OXY's stakeholder meeting on June 25, 2008. Attendees included members of the Latham, Prather, Savage, Albertson, and Mackey families and representatives of OXY's Operations, HES, and Regulatory groups and a representative from Walsh Environmental, LLC. OXY presented the stakeholders with information regarding the release, the initial water sampling data and OXY's corrective actions to date. The COGCC conducted a third site visit on June 25th after the stakeholder meeting.

OXY provided the CDPHE with written notification on June 23, 2008 (see Appendix A). The CDPHE called on July 2, 2008 and provided OXY with the following: Case No. 2008-0387.

The Bureau of Land Management (BLM) called OXY stating that it had received a landowner complaint regarding the incident. OXY met with the BLM on June 20th to discuss the incident and the BLM determined that the incident did not occur on BLM property and that BLM had no jurisdictional authority.

OXY's NOAV response was due July 7th, 2008, but on July 1st, OXY requested a four day extension, moving the response date from July 7th to July 11th. OXY also requested a NOAV review meeting for July 9th. The COGCC granted the extension request on July 1st and also agreed to attend the review meeting. Appendix B contains a narrative timeline identifying OXY's agency communications.



IV. OXY Abatement/Corrective Action Plan (NOAV Response)

The below text has been prepared by OXY to respond to the NOAV action items. The numbered items below are from the COGCC's NOAV abatement/corrective action questions.

- 1) Provide information on any pits constructed or used on the pad, including size, volume, whether or not the pit was lined?

Pit Size - (see Appendix C, 09-61D Pad Layouts)

- Reserve Pit (Initial) ~180'x50'x12'D, ~14M bbls w/ 2' freeboard, ~17M bbls w/o freeboard; was not lined
- Pit Extension (current) ~30'x20'x10', ~800 bbls w/ 2' freeboard, ~1M bbls w/o freeboard; lined with 36 mil liner and underlain with a geo-synthetic layer

- 2) All fluids (water, drilling, completions, and frac fluids, flowback, etc.) placed in the pit, including volumes, dates, etc. Include haul tickets for all fluids brought from off site to the pit.

Drilling fluids placed in the reserve pit during drilling are summarized in Appendix D.

It is estimated that 195 bbls of condensate and 9650 bbls of produced water were released into the reserve pit extension. It is not known when the release or releases occurred, but based on pad access during inclement weather it is estimated that the release or releases could have occurred anywhere from Jan08 to May08. Both wells have been shut in and facilities removed, (wells were temporarily abandoned with subsurface plugs 11Jun08).

This estimate is based on the cumulative natural gas production from the pad and associated gas - liquid ratio (GLR) for the field from early Jan08 until early May08. The GLR averages ~ 20 bbls of total liquid per every 1 MMCF of natural gas per day. The condensate cut is also based on field averages and is estimated to be ~ 2% of the total fluid stream. Estimates for the amount of condensate and produced water being released have been reduced for takeaway volumes provided by third-party transportation documentation.

No fluids were known to have been brought from off-site to the pit.

- 3) Whether condensate was observed in the pit during flowback or completion?

Completion, flowback and well clean-up operations for this pad were performed with all production being measured through a test/production unit and all fluids to frac tanks. Frac tanks were utilized to recover well treatment fluids and to accurately record such fluids for well information and performance data. Additionally, "green completion practices" were employed on this pad. This means that minimal gas was flared and that gas was piped to sales as early as possible during the flowback period. Such practices further ensure that all related

liquids are processed and contained in tanks. Thus, no condensate was observed in the pit during the entire completion operations or flowback period.

- 4) Tanks or other containers that were used at this site to manage fluids and any spill/releases that occurred?

2ea 400bbl tanks w/ earthen berm secondary containment. One for condensate, one for water (prior to release identification). Tanks had cross over piping installed for overflow capability between tanks. Extended reserve pit served as tertiary liquid collection when tanks filled and weather precluded water/condensate hauling trucks access to site. Flow lines to tanks shut and liquid dump lines from production units into pit opened. No additional work/containment on pad location as pit was empty and wells shut in at time of release discovery. See Appendix C, 09-61D Pad Layout.

- 5) Emergency response activities, including the location of structures built to contain and manage impacted water, volumes of water removed, method of treatment, and disposal and tracer dye study?

See Appendix C, Conn Camp Imagery and Appendix B, which outlines OXY's emergency response activities.

- a. 16Jun08 – Based on initial report of possible release with review from both OXY and local ranchers, commenced with installation of 2ea dams to contain all flow from the unnamed drainage on 16Jun08. The first dam located downstream of suspected North seep in the corral area. The second dam located at end of the unnamed drainage prior to converging with NE drainage that moves into Cascade Canyon. Piping and pumps installed to initially move contained water to new (lined) reserve pit on 09-61D Pad. Approximately 1600 bpd water collection rate from both dams.
- b. 17Jun08 – Installed series of booms (hydrocarbon absorbing socks) and straw bales down extent of drainage in order to collect possible liquid hydrocarbons.
- c. 18Jun08 – Constructed two ground water interceptor trenches on North side of drainage below suspected release route to capture effluent prior to entering surface drainage. North trench located on-line with North seep locations, and required re-routing the access road further into the bank. South (S1) trench is located on-line with start of South seep locations. Additional suction line/manifold from poly pipe installed to support drawing down trenches with a single downstream pump. Installed 4 FRAC tanks to pump water from all dams and trenches into them. Additional poly pipe was installed to pump from FRAC tanks into the water storage ponds on Mesa. Installed fencing around all trenches and dams to prevent animal access. Approximately 1800 bpd water collection rate from combination of dams and trenches.
- d. 19Jun08 – Fencing installed to replace existing fence running along the South side of 2-track trail that runs parallel to the unnamed drainage. Fencing installed to repair sections torn down for dam and trench

construction, to facilitate migration of cows to Mesa grazing areas, and to prevent access to drainage sections exposed to release. Eighty barrels of freshwater with ~2/3lb of Uranine 2313 (Robert Koch Industries) yellow dye was placed into the former pit/reserved pit extension as a tracer dye test. Followed this with ~200bbls of additional freshwater to assist in stimulating movement through drainage. Note – no signs of tracer identified at seeps, dams or trenches to date (10Jul08).

- e. 28Jun08 – identified a possible additional seep South of S1 Trench and installed subsequent S2 Trench parallel to the drainage and up gradient of seep location to collect subsurface water flow prior to entering the unnamed drainage.
- f. Recurring Actions – Daily vacuum truck of any visible film/sheen at slow water, flow locations, dams and trench locations. Daily inspection and replacement of booms as required. 24 hour surveillance of dams and trenches for tracer, and pumping ~3x daily from dams and trenches into FRAC tanks.
- g. Assessment/Future Actions – Have performed twice weekly surface water and ground water sampling from identified seep areas, dams and trenches. Based on levels below MCL and/or Non-Detect may consider removing earth and Dams 1 and 2 to allow downstream flow to partially resume. Absorbent booms would remain in place and ground water would continue to be accumulated in the 3 interceptor trenches. Will install storm water management plans BMPs as needed to incorporate the affected area into existing management plan. Future mitigation efforts will be based on any required additional site characterization.

Note that all water collected for processing through the facility water management system and is eventually reused in support of completions operations. Water management system includes additional hydrocarbon separation, filtration, and treatment.

In addition, the NOAV requests that OXY consult with and mitigate impacts to surface owner's springs, including:

- 1) Fencing impacted surface water to restrict access by livestock and wildlife.
- 2) Providing them with a supply of water for drinking and other household use and for watering livestock.

OXY is the surface owner of area in question, and has been working with affected stakeholders (lessee/owner ranchers) operating through and in the area. All confirmed impacted areas have been fenced off to prevent livestock access. Existing fences affected during earthwork mitigation efforts have been replaced and additional site gates were installed to facilitate livestock migration and continued grazing in the surrounding area. A field assessment with the ranchers identified sufficient water flow both upstream and downstream of the affected area for livestock and wildlife. Reassessment will be conducted with appropriate parties ~3-4 wks to review water flow. If flows become restrictive and as a contingency, OXY may exercise an option to place 300 bbl tanks and cattle troughs around the affected

area, with trucked resupply of fresh water to support continued use of the area. The spring supplying the water to the cabin in the area was sampled and last results were Non-Detect: This water supply is assessed as not affected at this time. However, additional bottled water is being supplied to the cabin as a primary source of potable water.

The COGCC also requested that OXY provide them with the stormwater Best Management Practices (BMP's) to be used in support of the disturbance areas created as part of the release cleanup. OXY's stormwater contractor, Cordilleran, has prepared documentation to capture the disturbance areas into OXY's Cascade Creek Common Plan of Development (Stormwater Permit No. COR-038414).

The total acres of disturbance/ground/surface disturbance and construction site boundary per OXY's estimation is 4¾ acres. This disturbance area is covered under OXY's Common Plan of Development. The 4¾ acres includes the access road at 20 feet wide and approximately 1¼ miles long and areas of disturbances associated with construction activities where groundwater interceptor trenches, bell holes, etc. were excavated.

OXY plans to install Stormwater BMP's to prevent the loss of disturbed soils during a precipitation event. Plans include:

- Stabilization of any unconsolidated material, soil pile or unstabilized slopes as needed with erosion control blanketing, silt fence and/or other BMP's to protect along the toe of the fill slope. OXY will also seed the soil disturbance, or hydro-mulch for long term stabilization.
- Installation of perimeter control as needed around the toe of the disturbances with silt fence, excelsior logs, straw wattles, or hay bales.
- Installation of inlet and outlet protection at the culvert crossings as needed with erosion control blanketing overlaid by rock armoring, or hydro-mulch as needed.

OXY's stormwater contractor, Cordilleran, will incorporate this area as part of its inspections.

Lastly, as requested by the COGCC, OXY has provided spill response expenses incurred to date, see Appendix E.

V. Form 27 – Remediation Work Plan

Form 27 has been signed by Daniel I. Padilla, OXY's Regulatory Coordinator and Designated Agent, see attached.



Proj # 4620

FORM

27

Rev 6/99

State of Colorado

Oil and Gas Conservation Commission

1120 Lincoln Street, Suite 801, Denver, Colorado 80203 (303)894-2100 Fax:(303)894-2109



FOR OGCC USE ONLY

SITE INVESTIGATION AND REMEDIATION WORKPLAN

This form shall be submitted to the Director for approval prior to the initiation of site investigation and remediation activities. Form 27 is intended to be used whenever possible. Additional documentation will be required when large volumes of soil and groundwater have been impacted or involve large facilities with multiple source areas. See Rule 910. Attach as many pages as needed to fully describe the proposed work.

CAUSE OF CONDITION BEING INVESTIGATED AND REMEDIATED

☒ Spill or Release ☐ Plug & Abandon ☐ Central Facility Closure ☐ Site/Facility Closure ☐ Other (describe):

OGCC Employee.

☐ Spill ☐ Complaint
☐ Inspection ☐ NOAV

Tracking No:

OGCC Operator Number: 66571

Name of Operator: Oxy USA WTP LP

Address: 2754 Compass Dr., Ste. 170

City: Grand Junction State: CO Zip: 81506

Contact Name and Telephone:

Daniel I. Padilla

No: 970-263.3637

Fax: 970.243.2525

API Number: 05-045-14445-00

County: Garfield

Facility Name: Cascade Creek

Facility Number: 697-09-61

Well Name: Cascade Creek

Well Number: 697-09-52B

Location: (QtrQtr, Sec, Twp, Rng, Meridian): SWSE, S9S, T6S, R97W, 6th PM Latitude: 39.53513 Longitude: -108.22485

TECHNICAL CONDITIONS

Type of Waste Causing Impact (crude oil, condensate, produced water, etc): produced water and condensate

Site Conditions: Is location within a sensitive area (according to Rule 901e)? ☒ Y ☐ N If yes, attach evaluation.

Adjacent land use (cultivated, irrigated, dry land farming, industrial, residential, etc.): non-cropland: rangeland (shrub and brush land)

Soil type, if not previously identified on Form 2A or Federal Surface Use Plan: Previously identified on Form 2A

Potential receptors (water wells within 1/4 mi, surface waters, etc.): ~592 (unregistered water well) and ~595 unnamed drainage of Cascade Canyon

Description of Impact (if previously provided, refer to that form or document):

Impacted Media (check):

☒ Soils
☒ Vegetation
☒ Groundwater
☒ Surface Water

Extent of Impact:

TBD
Small areas of dead grasses near creek
TBD
Sheen on creek; dissolved BTEX

How Determined:

sediment sampling will be conducted
Visually
Visually, sample results

REMEDIALTION WORKPLAN

Describe initial action taken (if previously provided, refer to that form or document):

Installed containment dams along stream to contain and control release. Dam 1 located ~200' downstream of N seep in corral near cabin. Dam 2 located ~2100' downstream from Dam 1, just upstream from the NE drainage that converges into Cascade Canyon. Dam 2 sited at end of stream (drainage) in order to follow up with assessment of sources/seeps. Three groundwater interceptor trenches were constructed parallel to the stream next to seep areas to collect groundwater prior to entering stream. All contained water is pumped to FRAC tanks (4ea) and further pumped into lined Mesa storage ponds. Installed both series of booms and strawbales to contain and capture any hydrocarbon liquids. Currently conducting daily suction of any floating hydrocarbon liquids at boom/straw bale locations as required. See response to item 5 of NOAV 2009191192 for additional details.

Describe how source is to be removed:

Existing two wells shut in on May 6, 2008). No further production fluids are being released to the former pit. Reserve pit was reclaimed with a new liner installed. Once production resumes (2009), all produced fluids will be temporarily stored onsite in tanks, prior to transfer to the Cascade Central Water Facility for separation. A lined production pit will be maintained on location for emergency situations (will be permitted in accordance with Notice to Operators, Drilling wells within 3/4 mile of the rim of the Roan Plateau in Garfield County, (June 12, 2008)).

Describe how remediation of existing impacts is to be accomplished, including removal and disposal at an injection well or licensed facility, land treatment on site, removal of impacted groundwater, insitu bioremediation, burning of oily vegetation, etc.:

Approximately 3,000 bbl/day of recovered groundwater and surface water are being pumped from the impacted area. Impacted vegetation will be removed from the creek bed. The release will be allowed to bioremediate insitu and surface water sampling will continue until drainage flow ceases, and will re-commence in the Spring (2009) once surface water flow resumes. If sediment samples indicate chemical-of-concern soil concentrations above COGCC clean-up requirements, the remediation plan will be modified to include management of impacted areas.

Submit Page 2 with Page 1



Tracking Number:	_____
Name of Operator:	_____
OGCC Operator No:	_____
Received Date:	_____
Well Name & No:	_____
Facility Name & No:	_____

OGCC Employee: _____

If groundwater has been impacted, describe proposed monitoring plan (# of wells or sample points, sampling schedule, analytical methods, etc.):

Groundwater at the release area is unconfined and discharges seasonally, as evidenced by the ephemeral nature of the impacted unnamed tributary recharged by the local groundwater flow. Groundwater monitoring will be conducted by collecting samples from the groundwater interceptor trenches and by collecting surface water samples from the seeps discharging into the unnamed tributary. Sampling points, frequency and analytical methods are detailed in Appendix G.

Describe reclamation plan. Discuss existing and new grade recontouring; method and testing of compaction alleviation; and reseeding program, including location of new seed, seed mix and noxious weed prevention. Attach diagram or drawing. Use additional sheet for description if required.

Interim reclamation will include implementation of stormwater BMPs as outlined in our NOAV response dated July 11, 2008. Final reclamation will involve removing the earthen dams and returning the tributary channel to pre-remediation contours. Disturbed excavation areas will be reseeded to provide slope stabilization. Reseeding will be completed in accordance with OXY's Stormwater Management Plan and Noxious Weed Management Plan.

Attach samples and analytical results taken to verify remediation of impacts. Show locations of samples on an onsite schematic or drawing.
Analytical results and drawings showing sampling locations are included in Appendix F.

Is further site investigation required? ☒ Y ☐ N If yes, describe:

OXY will continue surface water monitoring in the drainage, groundwater monitoring in the interceptor trenches, and will obtain sediment samples from the seep areas.

Final disposition of E&P waste (landtreated and disposed onsite, name of licensed disposal facility, recycling, reuse, etc.):

Currently constructing a temporary storage and treatment facility to process impacted material for reuse/reclamation. The ground and surface water collected from the earthen dam areas and interceptor trenches will be processed in the facility water management system.

IMPLEMENTATION SCHEDULE

Date Site Investigation Began: 06/16/08	Date Site Investigation Completed: ongoing	Date Remediation Plan Submitted: 07/11/08
Remediation Start Date: 06/16/08	Anticipated Completion Date: 06/30/09	Actual Completion Date: _____

I hereby certify that the statements made in this form are, to the best of my knowledge, true, correct, and complete.

Print Name: Daniel I. Padilla Signed:

Title: Designated Agent Date: 7/10/08

OGCC Approved: _____ Title: _____ Date: _____

Sensitive Area Determination

The COGCC requires a sensitive area determination in the event of a spill of greater than 20 barrels net loss of waste (901e(4)). The sensitive area determination decision tree (Figure 901-1 of the COGCC regulations) was used to determine if the release area qualifies as a "sensitive area" as defined in the COGCC 900 series rules. The release has chemistry that exceeds some criteria in box 1. The pit is underlain by a recharge zone for an unconfined aquifer as evidenced by the contaminant release (box 2), and has a hydraulic conductivity that exceeds 10^{-6} cm/second (box 3). It is not known to be in an area classified for domestic use by the CDPHE Water Quality Control Commission or a local wellhead protection area (box 4). There are no domestic water wells within 1/8 mile or public water supply wells within 1/4 mile of the release registered with the Colorado Division of Water Resources; however there is an unregistered domestic water well in the form of a spring that is captured and piped into a domestic cabin within 1/8 mile of the release point (box 5). Although the depth to average high groundwater from the base of the pit is greater than 20 feet, the release has impacted groundwater as evidenced by the release of petroleum into the intermittent drainage (box 6). Based upon the facts as they are now known, the results of box 5 and box 6 of the COGCC decision tree indicate that at this time, the site appears to qualify as a "sensitive area".

Appendix A:
Agency Correspondence

State of Colorado
Oil and Gas Conservation
1120 Lincoln Street, Suite 801, Denver, Colorado 80203

APPLICATION FOR PERMIT TO:

1 ☒ Drill, ☐ Deepen, ☐ Re-enter, ☐ Recomplete and Operate2 TYPE OF WELL
OIL ☐ GAS ☒ COALBED ☐ OTHER ☐
SINGLE ZONE ☒ MULTIPLE ZONES ☐ COMMINGLE ZONES ☐Refrilling ☐
Sidetrack ☐

RECEIVED

MAY 15 07
Logging Bond Surety ID#
20060137

COGCC

Attachment Checklist

	OP	COGCC
3 Name of Operator 66571		
4 COGCC Operator Number OXY USA WTP LP		
5 Address P O Box 27757		
City Houston State TX Zip 77227-7757		
6 Contact Name Doug Dennison		
Phone 970 263 3611 Fax 970-243-2525		
7 Well Name Cascade Creek		
Well Number 697 09 60D		
8 Unit Name (if appl)		
Unit Number		
9 Proposed Total Measured Depth 9068'		
WELL LOCATION INFORMATION		
10 Qtr/SWSE Sec 9 Twp 6S Rng 97W Meridian 6th PM		
Latitude 39 531005 Longitude -106 223681		
Footage At Surface 286 FSL 2316 FEL		
11 Field Name Grand Valley		
Field Number 31290		
12 Ground Elevation 8284 13 County Garfield		
14 GPS Data		
Date of Measurement 03/30/2007 PDOP Reading 2.4 Instrument Operator's Name D McBride		

15 If well is ☒ Directional ☐ Horizontal (highly deviated), submit deviated drilling plan Bottomhole Sec Twp Rng SESW, 9, 6S, 97W, 6th PM

Footage At Top of Prod Zone 354 FSL 2453 FEL/FWL At Bottom Hole 354 FSL 2453 FEL/FWL

16 Is location in a high density area (Rule 603b)? ☐ Yes ☒ No

17 Distance to the nearest building, public road, above ground utility or railroad greater than 150'

18 Distance to Nearest Property Line 2316' 19 Distance to nearest well permitted/comp in the same form 1434'

LEASE, SPACING AND POOLING INFORMATION

Objective Formation(s)	Formation Code	Spacing Order Number (s)	Unit Acreage Assigned to Well	Unit Configuration (N/2, SE/4, etc)
Williams Fork	WMFK	510-15		

21 Mineral Ownership ☒ Fee ☐ State ☐ Federal ☐ Indian

22 Surface Ownership ☒ Fee ☐ State ☐ Federal ☐ Indian

23 Is the Surface Owner also the Mineral Owner? ☒ Yes ☐ No

23a If 23 is Yes Is the Surface Owner(s) signature on the lease? ☐ Yes ☐ No

23b If 23 is No ☐ Surface Owners Agreement Attached or ☐ \$25,000 Blanket Surface Bond ☐ \$2,000 Surface Bond ☐ \$5,000 Surface Bond

24 Using standard Qtr/Sec, Twp, Rng format enter entire mineral lease description upon which this proposed wellsite is located (attach separate sheet/map if you prefer)

25 Distance to Nearest Mineral Lease Line 4063' 26 Total Acres in Lease 9480

DRILLING PLANS AND PROCEDURES

27 Is H2S anticipated? ☐ Yes ☒ No

28 Will salt sections be encountered during drilling? ☐ Yes ☒ No

29 Will salt (>15,000 ppm TDS Cl) or oil based muds be used during drilling? ☐ Yes ☒ No

30 If questions 27 or 28 are yes, is this location in a sensitive area (Rule 903)? ☐ Yes ☒ No

31 Mud disposal ☐ Offsite ☒ Onsite

Method ☐ Land Farming ☐ Land Spreading ☐ Disposal Facility ☒ Other Reserve Pit

NOTE The use of an earthen pit for Recompletion fluids requires a pit permit (Rule 905b) If air/gas drilling, notify local fire officials

String	Size of Hole	Size of Casing	Weight Per Foot	Setting Depth	Sacks Cement	Cement Bottom	Cement Top
SURFACE	20"	13 3/8"	88#	3000	2680	3000	0
INTERMEDIATE	12 1/4"	9 5/8"	36#	5738	630	5738	2850
PRODUCTION	8 1/2"	4 1/2"	11 6#	9068	1030	9068	5538 (min 200' above top of gas)

32 BOP Equipment Type ☒ Annular Preventor ☒ Double Ram ☒ Rotating Head ☐ None

33 Comments OXY owns surface and minerals Rule 305 and 306 are waived OXY will provide appropriate housing for essential personnel in order to conduct safe and efficient drilling and completion operations at this well site

34 Initial Rule 306 Consultation took place on (date) N/A was waived, or is not required Provide supporting documentation if consultation has been waived or if good faith effort did not result in consultation

PERMIT SUBMITTED TO COGCC PRIOR TO COMPLIANCE WITH RULE 306 CONSULTATION SHALL BE RETURNED UNAPPROVED

I hereby certify that a complete permit package has been sent to the applicable Local Government Designee(s), and all statements made in this form are, to the best of my knowledge, true, correct, and complete

Signed _____ Print Name Doug Dennison

Title Regulatory Coordinator Date 5/9/07 Email doug.dennison@oxy.com

Based on the information provided herein, this Application for Permit-to-Drill complies with COGCC Rules and applicable orders and is hereby approved

COGCC Approved

Director of COGCC

Date 6-20-07

Expiration Date 6-19-08

API NUMBER
05-045-14298-00

Permit Number

CONDITIONS OF APPROVAL, IF ANY

20072593

SEE ATTACHED PAGES
CONDITIONS OF APPROVAL AND
NOTICE TO OPERATORs

CASCADE CREEK 697-09-60D

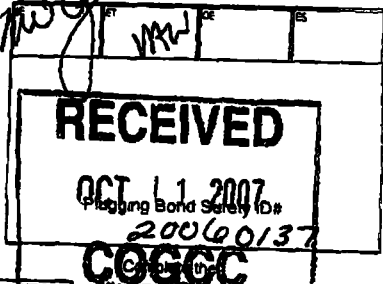
CONDITIONS OF APPROVAL

THE OPERATOR SHALL COMPLY WITH RULE 321 , AND IT SHALL BE THE OPERATOR'S RESPONSIBILITY TO ENSURE THAT THE WELLBORE COMPLIES WITH SETBACK REQUIREMENTS IN COMMISSION ORDERS OR RULES PRIOR TO PRODUCING THE WELL.

24 HOUR SPUD NOTICE REQUIRED SEE NEW NOTICE GARFIELD COUNTY RULISON FIELD NOTICE TO OPERATORS APPLIES TO THIS WELL ALL NOTIFICATION VIA E-MAIL JAIME ADKINS@STATE CO US

THE PROPOSED SURFACE CASING IS MORE THAN 50' BELOW THE DEPTH OF THE DEEPEST WATER WELL WITHIN 1 MILE OF THE SURFACE LOCATION WHEN CORRECTED FOR ELEVATION DIFFERENCES THE DEEPEST WATER WELL WITHIN 1 MILE IS 000 FEET DEEP

TOP OF CEMENT ON PRODUCTION CASING MUST BE VERIFIED BY CBL



APPLICATION FOR PERMIT TO

1 ☒ Drill, ☐ Deepen, ☐ Re enter, ☐ Recomplete and Operate

2 TYPE OF WELL
OIL ☐ GAS ☒ COALBED ☐ OTHER ☐
SINGLE ZONE ☒ MULTIPLE ZONES ☐ COMMINGLE ZONES ☐

Refilling ☐
Sidetrack ☐

3 Name of Operator OXY USA WTP LP 4 COGCC Operator Number 66571
5 Address P O Box 27757
City Houston State TX Zip 77227-7757
6 Contact Name Daniel I Padilla Phone 970-263-3637 Fax 970-243-2525
7 Well Name Cascade Creek Well Number 697-09-448
8 Unit Name (if appl) Unit Number
9 Proposed Total Measured Depth 8912'

	OP	COGCC
APD Orig & 1 Copy	✓	
Form 2A	✓	✓
Well location plat	✓	✓
Topo map	✓	✓
Mineral lease map		✓
Surface agrmt/Surety		
30 Day notice letter		
Deviated Drilling Plan	✓	✓
Exception Location Request		
Exception Loc Waivers		
H2S Contingency Plan		
Federal Drilling Permit		

10 CtrQtr SWSE Sec 9 Twp 8S Rng 97W Meridian 8th PM
Latitude 39 531091 Longitude -108 223497
Footage At Surface 317' FSL 2285' FEL
11 Field Name Grand Valley Field Number 31290
12 Ground Elevation 8286' 13 County Garfield

14 GPS Data
Date of Measurement 08/20/2007 PDOP Reading 2.5 Instrument Operator's Name Mike Flesher

15 If well is ☒ Directional ☐ Horizontal (highly deviated), submit deviated drilling plan Bottomhole Sec Twp Rng NESW, S9, T6S, R97W, 6th PM
Footage At Top of Prod Zone 1306' FSL 2181' FFWL At Bottom Hole 1404' FSL 2100' FFWL
16 Is location in a high density area (Rule 603b)? ☐ Yes ☒ No
17 Distance to the nearest building, public road, above ground utility or railroad 18,714'
18 Distance to Nearest Property Line 2265' 19 Distance to nearest well permitted/comp in the same form 330'

LEASE, SPACING AND POOLING INFORMATION

Objective Formation(s)	Formation Code	Spacing Order Number (s)	Unit Acreage Assigned to Well	Unit Configuration (N/2, SE/4, etc)
Williams Fork	WMFK	510 15		

21 Mineral Ownership ☒ Fee ☐ State ☐ Federal ☐ Indian
22 Surface Ownership ☒ Fee ☐ State ☐ Federal ☐ Indian Lease #
23 Is the Surface Owner also the Mineral Owner? ☒ Yes ☐ No Surface Surety ID#
23a If 23 is Yes Is the Surface Owner(s) signature on the lease? ☐ Yes ☐ No See item # 33 below
23b If 23 is No ☐ Surface Owners Agreement Attached or ☐ \$25,000 Blanket Surface Bond ☐ \$2,000 Surface Bond ☐ \$5,000 Surface Bond
24 Using standard CtrQtr, Sec, Twp, Rng format enter entire mineral lease description upon which this proposed wellsite is located (attach separate sheet/map if you prefer)
See attached description
25 Distance to Nearest Mineral Lease Line 5139' 26 Total Acres in Lease 9480'

DRILLING PLANS AND PROCEDURES

27 Is H2S anticipated? ☐ Yes ☒ No - If Yes, attach contingency plan
28 Will salt sections be encountered during drilling? ☐ Yes ☒ No
29 Will salt (>15,000 ppm TDS Cl) or oil based muds be used during drilling? ☐ Yes ☒ No
30 If questions 27 or 28 are yes, is this location in a sensitive area (Rule 903)? ☐ Yes ☒ No If 28, 29 or 30 are "Yes" a prt permit may be required
31 Mud disposal ☐ Offsite ☒ Onsite
Method ☐ Land Farming ☐ Land Spreading ☐ Disposal Facility ☒ Other Reserve Pit

NOTE The use of an earthen pit for Recompletion fluids requires a pit permit (Rule 905b) If air/gas drilling, notify local fire officials

String	Size of Hole	Size of Casing	Weight Per Foot	Setting Depth	Sacks Cement	Cement Bottom	Cement Top
CONDUCTOR	20"	18"	65#	80'			
SURFACE	14 3/4"	9 5/8"	36#	2700'	1427	80'	Surface
PRODUCTION	6 1/4"	4 1/2"	11 6#	8912'	565	2700'	Surface
						8912'	4950'

32 BOP Equipment Type ☒ Annular Preventor ☒ Double Ram ☒ Rotating Head ☐ None
33 Comments OXY owns surface and minerals Rule 305 and 306 are waived OXY will provide appropriate housing for essential personnel in order to conduct safe and efficient drilling and completion operations at this well site
34 Initial Rule 306 Consultation took place on (date) N/A, was waived, or is not required Provide supporting documentation if consultation has been waived or if good faith effort did not result in consultation
PERMIT SUBMITTED TO COGCC PRIOR TO COMPLIANCE WITH RULE 306 CONSULTATION SHALL BE RETURNED UNAPPROVED
I hereby certify that a complete permit package has been sent to the applicable Local Government Designee(s), and all statements made in this form are, to the best of my knowledge, true, correct, and complete

Signed [Signature] Print Name Daniel I Padilla
Title Designated Agent Date 10/10/07 Email daniel.padilla@oxy.com

Based on the information provided herein, this Application for Permit to Drill complies with COGCC Rules and applicable orders and is hereby approved
COGCC Approved [Signature] Director of COGCC

API NUMBER
05-045-15136-00

Permit Number 20075802
CONDITIONS OF APPROVAL, IF ANY
Expiration Date 12-3-08

SEE ATTACHED PAGES:
CONDITIONS OF APPROVAL AND
NOTICE TO OPERATORS

CONDITIONS OF APPROVAL

CASCADE CREEK 697-09-44B

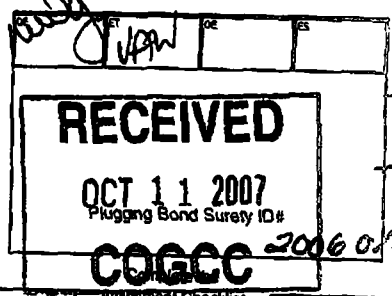
**24 HOUR SPUD NOTICE REQUIRED E-MAIL;
JAIME ADKINS@STATE CO US**

**NEW GARFIELD COUNTY RULISON FIELD NOTICE TO OPERATORS NOTE:
ALL NOTICES SHALL BE GIVEN VIA E-MAIL**

CEMENT TOP VERIFICATION BY CBL REQUIRED

**THE PROPOSED SURFACE CASING IS MORE THAN 50' BELOW THE
DEPTH OF THE DEEPEST WATER WELL WITHIN 1MILE OF THE SURFACE
LOCATION WHEN CORRECTED FOR ELEVATION DIFFERENCES THE
DEEPEST WATER WELL WITHIN 1 MILE IS 000 FEET DEEP**

**THE OPERATOR SHALL COMPLY WITH RULE 321 , AND IT SHALL BE THE
OPERATOR'S RESPONSIBILITY TO ENSURE THAT THE WELLBORE
COMPLIES WITH SETBACK REQUIREMENTS IN COMMISSION ORDERS OR
RULES PRIOR TO PRODUCING THE WELL**



1 ☒ Drill, ☐ Deepen, ☐ Re-enter, ☐ Recomplete and Operate

2 TYPE OF WELL
OIL ☐ GAS ☒ COALBED ☐ OTHER ☐
SINGLE ZONE ☒ MULTIPLE ZONES ☐ COMMINGLED ZONES ☐

Refilling ☐
Sidetrack ☐

3 Name of Operator OXY USA WTP LP 4 COGCC Operator Number 66571
5 Address P O Box 27757
City Houston State TX Zip 77227-7757
6 Contact Name Daniel I Padilla Phone 970 263-3637 Fax 970 243 2525
7 Well Name Cascade Creek Well Number 687 09-52A
8 Unit Name (if appl) _____ Unit Number _____
9 Proposed Total Measured Depth 8884'

Attachment Checklist	OP	COGCC
APD Orig & 1 Copy	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Form 2A	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
Well location plat	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
Topo map	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
Mineral lease map	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Surface agrmt/Surety	<input type="checkbox"/>	<input type="checkbox"/>
30 Day notice letter	<input type="checkbox"/>	<input type="checkbox"/>
Deviated Drilling Plan	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
Exception Location Request	<input type="checkbox"/>	<input type="checkbox"/>
Exception Loc Waivers	<input type="checkbox"/>	<input type="checkbox"/>
H2S Contingency Plan	<input type="checkbox"/>	<input type="checkbox"/>
Federal Drilling Permit	<input type="checkbox"/>	<input type="checkbox"/>

10 QtrQtr SWSE Sec 9 Twp 6S Rng 97W Meridian 6th PM
Latitude 39 531081 Longitude -108 223520
Footage At Surface 313' FSL 2271' FEL
11 Field Name Wildcat Grand Valley Field Number 31290 99999
12 Ground Elevation 8286' 13 County Garfield

14 GPS Data
Date of Measurement 08/20/2007 POOP Reading 2.5 Instrument Operator's Name Mike Flesher

15 If well is ☒ Directional ☐ Horizontal (highly deviated), submit deviated drilling plan Bottomhole Sec Twp Rng SESW, S9, T6S, R97W, 6th PM
Footage At Top of Prod Zone 989' FSL 2273' FEL/FWL At Bottom Hole 989' FSL 2273' FEL/FWL

16 Is location in a high density area (Rule 603b)? ☐ Yes ☒ No
17 Distance to the nearest building, public road, above ground utility or railroad 19,708' 4300
18 Distance to Nearest Property Line 2271' 19 Distance to nearest well permitted/comp in the same form 330'

LEASE, SPACING AND POOLING INFORMATION				
Objective Formation(s)	Formation Code	Spacing Order Number (s)	Unit Acreage Assigned to Well	Unit Configuration (N2, SE4, etc.)
Williams Fork	WMFK	510-15		

21 Mineral Ownership ☒ Fee / ☐ State ☐ Federal ☐ Indian
22 Surface Ownership ☒ Fee / ☐ State ☐ Federal ☐ Indian
23 Is the Surface Owner also the Mineral Owner? ☒ Yes ☐ No
23a If 23 is Yes Is the Surface Owner(s) signature on the lease? ☐ Yes ☐ No Surface Surety ID# _____
23b If 23 is No ☐ Surface Owners Agreement Attached or ☐ \$25,000 Blanket Surface Bond ☐ \$2,000 Surface Bond ☐ \$5,000 Surface Bond
24 Using standard QtrQtr, Sec, Twp, Rng format enter entire mineral lease description upon which this proposed wellsite is located (attach separate sheet/map if you prefer)
See attached description
25 Distance to Nearest Mineral Lease Line 4707' 26 Total Acres in Lease 9480

DRILLING PLANS AND PROCEDURES

Is H2S anticipated? ☐ Yes ☒ No If Yes, attach contingency plan

Will salt sections be encountered during drilling? ☐ Yes ☒ No

Will salt (>15,000 ppm TDS Cl) or oil based muds be used during drilling? ☐ Yes ☒ No

If questions 27 or 28 are yes, is this location in a sensitive area (Rule 903)? ☐ Yes ☒ No If 28, 29 or 30 are "Yes" a pit permit may be required

Mud disposal Method ☐ Offsite ☒ Onsite

☐ Land Farming ☐ Land Spreading ☐ Disposal Facility ☒ Other Reserve Pit

E The use of an earthen pit for Recompletion fluids requires a pit permit (Rule 905b) If air/gas drilling, notify local fire officials

String	Size of Hole	Size of Casing	Weight Per Foot	Setting Depth	Sacks Cement	Cement Bottom	Cement Top
CONDUCTOR	20"	16"	65#	80'		80'	Surface
FACE	14 3/4"	9 5/8"	36#	2700'	1427	2700'	Surface
DUCTION	6 1/4"	4 1/2"	11 6#	8884'	579	8884'	5072'

32 BOP Equipment Type ☒ Annular Preventor ☒ Double Ram ☒ Rotating Head ☐ None
33 Comments OXY owns surface and minerals Rule 305 and 306 are waived OXY will provide appropriate housing for essential personnel in order to conduct safe and efficient drilling and completion operations at this well site
34 Initial Rule 306 Consultation took place on (date) N/A was waived, or is not required Provide supporting documentation if consultation has been waived or if good faith effort did not result in consultation
PERMIT SUBMITTED TO COGCC PRIOR TO COMPLIANCE WITH RULE 306 CONSULTATION SHALL BE RETURNED UNAPPROVED
I hereby certify that a complete permit package has been sent to the applicable Local Government Designee(s), and all statements made in this form are to the best of my knowledge, true, correct, and complete
Signed Daniel I. Padilla Print Name Daniel I Padilla
Title Designated Agent Date 10/10/07 Email daniel.padilla@oxy.com

Based on the information provided herein, this Application for Permit to Drill complies with COGCC Rules and applicable orders and is hereby approved
COGCC Approved Daniel G. Nash Director of COGCC Date 12-4-07
Permit Number 20075803 Expiration Date 12-3-08
CONDITIONS OF APPROVAL, IF ANY

API NUMBER
05-045-15135-00

SEE ATTACHED PAGES:
CONDITIONS OF APPROVAL AND
NOTICE TO OPERATORS

CONDITIONS OF APPROVAL

CASCADE CREEK 697-09-52A

**24 HOUR SPUD NOTICE REQUIRED E-MAIL;
JAIME ADKINS@STATE CO US**

**NEW GARFIELD COUNTY RULISON FIELD NOTICE TO OPERATORS NOTE:
ALL NOTICES SHALL BE GIVEN VIA E-MAIL**

CEMENT TOP VERIFICATION BY CBL REQUIRED

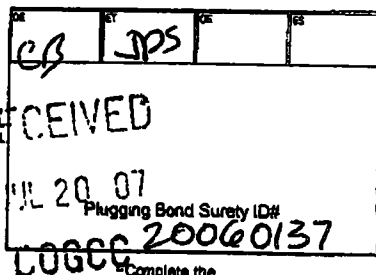
**THE PROPOSED SURFACE CASING IS MORE THAN 50' BELOW THE
DEPTH OF THE DEEPEST WATER WELL WITHIN 1MILE OF THE SURFACE
LOCATION WHEN CORRECTED FOR ELEVATION DIFFERENCES THE
DEEPEST WATER WELL WITHIN 1 MILE IS 000 FEET DEEP**

**THE OPERATOR SHALL COMPLY WITH RULE 321 , AND IT SHALL BE THE
OPERATOR'S RESPONSIBILITY TO ENSURE THAT THE WELLBORE
COMPLIES WITH SETBACK REQUIREMENTS IN COMMISSION ORDERS OR
RULES PRIOR TO PRODUCING THE WELL**

State of Colorado
Oil and Gas Conservation Commission

1120 Lincoln Street, Suite 801, Denver, Colorado 80203 Phone (303)894-2100 Fax (303)894-2109

APPLICATION FOR PERMIT TO:

1 ☒ Drill, ☐ Deepen, ☐ Re-enter, ☐ Recomplete and Operate2 TYPE OF WELL
OIL ☐ GAS ☒ COALBED ☐ OTHER ☐
SINGLE ZONE ☒ MULTIPLE ZONES ☐ COMMINGLE ZONES ☐Refilling ☐
Sidetrack ☐

3 Name of Operator 66571 4 COGCC Operator Number OXY USA WTP LP

5 Address P O Box 27757

City Houston State TX Zip 77227-7757

6 Contact Name Daniel I Padilla Phone 970-263-3637 Fax 970-243-2525

7 Well Name Cascade Creek Well Number 697-09-528

8 Unit Name (if appl) Unit Number

9 Proposed Total Measured Depth 8836'

10 Qtr/Sec Twp Rng 9 6S 97W Meridian 6th PM

Latitude 39 53107 Longitude -106 223543

Footage At Surface 309' FSL 2277' FEL

11 Field Name Wildcat Field Number 99999

12 Ground Elevation 6287' 13 County Garfield

14 GPS Data

Date of Measurement 06/20/2007 PDOP Reading 2.5 Instrument Operator's Name Mike Fleisher

15 If well is ☒ Directional ☐ Horizontal (highly deviated), submit deviated drilling plan

Footage At Top of Prod Zone 671' FSL 2362' FWL At Bottom Hole 671' FSL 2362' FWL

16 Is location in a high density area (Rule 903b)? ☐ Yes ☒ No

17 Distance to the nearest building, public road, above ground utility or railroad greater than 150'

18 Distance to Nearest Property Line 2277' 19 Distance to nearest well permitted/comp in the same form 330'

20 LEASE, SPACING AND POOLING INFORMATION

Objective Formation(s) Formation Code Spacing Order Number (s) Unit Acreage Assigned to Well Unit Configuration (N/2, SE/4, etc)

Williams Fork WMFK 510-15

21 Mineral Ownership ☒ Fee ☐ State ☐ Federal ☐ Indian22 Surface Ownership ☒ Fee ☐ State ☐ Federal ☐ Indian23 Is the Surface Owner also the Mineral Owner? ☒ Yes ☐ No23a If 23 is Yes Is the Surface Owner(s) signature on the lease? ☐ Yes ☐ No23b If 23 is No ☐ Surface Owners Agreement Attached or \$25,000 Blanket Surface Bond ☐ \$2,000 Surface Bond ☐ \$5,000 Surface Bond

24 Using standard Qtr/Sec, Twp, Rng format enter entire mineral lease description upon which this proposed wellsite is located (attach separate sheet/map if you prefer)

See attached description

25 Distance to Nearest Mineral Lease Line 3730' 26 Total Acres in Lease 9480

27 Is H2S anticipated? ☐ Yes ☒ No28 Will salt sections be encountered during drilling? ☐ Yes ☒ No29 Will salt (>15,000 ppm TDS Cl) or oil based muds be used during drilling? ☐ Yes ☒ No30 If questions 27 or 28 are yes, is this location in a sensitive area (Rule 903)? ☐ Yes ☒ No31 Mud disposal ☐ Offsite ☒ OnsiteMethod ☐ Land Farming ☐ Land Spreading ☐ Disposal Facility ☒ Other Reserve Pit

NOTE The use of an earthen pit for Recompletion fluids requires a pit permit (Rule 905b) If air/gas drilling, notify local fire officials

String Size of Hole Size of Casing Weight Per Foot Setting Depth Sacks Cement Cement Bottom Cement Top

SURFACE 14 3/4" 9 5/8" 36# 2800' 1414 2800' Surface

INTERMEDIATE 8 1/2" 7" 23# 5761' 944 5761' 2850'

PRODUCTION 6 1/4" 4 1/2" 11 6# 8836' 1135 8836' 5581' (min 200' above top of gas)

22 16 150 90 90 0

32 BOP Equipment Type ☒ Annular Preventor ☒ Double Ram ☒ Rotating Head ☐ None

33 Comments OXY owns surface and minerals Rule 305 and 306 are waived OXY will provide appropriate housing for essential personnel in order to conduct safe and efficient drilling and completion operations at this well site

34 Initial Rule 306 Consultation took place on (date) N/A, was waived, or is not required Provide supporting documentation if consultation has been waived or if good faith effort did not result in consultation

PERMIT SUBMITTED TO COGCC PRIOR TO COMPLIANCE WITH RULE 306 CONSULTATION SHALL BE RETURNED UNAPPROVED

I hereby certify that a complete permit package has been sent to the applicable Local Government Designee(s), and all statements made in this form are, to the best of my knowledge, true, correct, and complete

Signed [Signature] Print Name Daniel I Padilla

Title Designated Agent Date 7/11/07 Email daniel.padilla@oxy.com

Based on the information provided herein, this Application for Permit-to-Drill complies with COGCC Rules and applicable orders and is hereby approved

COGCC Approved [Signature] Director of COGCC Date 7-24-07

Permit Number 20074021 Expiration Date 7-23-08

API NUMBER 05-045-14445-00

CONDITIONS OF APPROVAL, IF ANY

SEE ATTACHED PAGES

CONDITIONS OF APPROVAL AND

NOTICE TO OPERATORS

CONDITIONS OF APPROVAL

CASCADE CREEK 697-09-52B

**24 HOUR SPUD NOTICE REQUIRED SEE NOTICE NEW GARFIELD
COUNTY RULISON FIELD NOTICE TO OPERATORS APPLIES TO THIS
WELL ALL NOTIFICATION VIA E-MAIL JAIME ADKINS@STATE.CO.US**

CEMENT TOP VERIFICATION BY CBL REQUIRED

**THE PROPOSED SURFACE CASING IS MORE THAN 50' BELOW THE
DEPTH OF THE DEEPEST WATER WELL WITHIN 1 MILE OF THE SURFACE
LOCATION WHEN CORRECTED FOR ELEVATION DIFFERENCES THE
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COMPLIES WITH SETBACK REQUIREMENTS IN COMMISSION ORDERS OR
RULES PRIOR TO PRODUCING THE WELL**

Padilla, Daniel

From: Nall, Susan SPK [Susan.Nall@usace.army.mil]
Sent: Wednesday, July 02, 2008 9:40 AM
To: Padilla, Daniel
Cc: mfoye@hrlcomp.com
Subject: Oxy Spill Discovered on 6/16/08, #2008-889
Importance: High
Attachments: nw 38.doc; nw 20.doc

Daniel - I am attaching two permit options to assist Oxy in handling this recent spill/leak situation.

<<nw 38.doc>> <<nw 20.doc>>

Of the two it appears that NWP#38 (Cleanup of Hazardous and Toxic Waste) is more appropriate. It does require notification, but due to the urgency of remedial needs, the below will suffice as notice. Please provide a legal description (lat & long) for the two locations where fill material was placed in the intermittent drainage and landownership information for these two properties and the upstream possible leak source, the #697-09-61 pad. Also, keep us in the loop on water sample data findings and on status of the tracer dye used. Additionally, if the subject intermittent drainage is dewatered (is water hauled away or recirculated?), we need to see the details and timeframes for that as well.

We have assigned number **#2008-889** to this situation. Please refer to this number in all future correspondence regarding this spill/leak.

Susan Bachini Nall

Environmental Engineer & Energy Liaison
U.S. Army Corps of Engineers - Pilot Energy Offices in Vernal, UT
and Glenwood Springs, CO
400 Rood Avenue, Room 142
Grand Junction, CO 81501
(970) 243-1199, #16
(970) 241-2358 fax
Email: susan.nall@usace.army.mil
Website: www.spk.usace.army.mil/regulatory.html

***** CORPS ENVIRONMENTAL PRINCIPLES *****

- Strive to achieve environmental sustainability
- Recognize the interdependence of life and the physical environment
- Seek balance and synergy among human development activities and natural systems
- Continue to accept corporate responsibility and accountability under the law
- Seek ways and means to access and mitigate cumulative impacts to the environment
- Build and share an integrated scientific, economic, and social knowledge base
- Respect the views of individuals and groups interested in Corps activities

-----Original Message-----

From: Daniel_Padilla@oxy.com [mailto:Daniel_Padilla@oxy.com]
Sent: Monday, June 23, 2008 10:03 AM
To: Nall, Susan SPK; Jon_Hamill@oxy.com; Steve_Adam@oxy.com; Greg_Kopel@oxy.com; Brent_Moore@oxy.com
Cc: John_Ocana@oxy.com; Warner_Meece@oxy.com; Tom_Lutz@oxy.com; Bill_Heller@OXY.com; Alonzo_Hernandez@oxy.com; Donna_Havins@oxy.com

7/8/2008

Subject: Follow-up Notification of Spill Discovered on June 16, 2008

Dear Sue,

As requested, OXY USA WTP LP (OXY) is providing your office with details regarding the spill that was discovered on June 16, 2008. During the mid-afternoon of June 16th, OXY, in conjunction with a local rancher, identified a sheen on an intermittent, unnamed drainage to Cascade Canyon in Garfield County, CO. The sheen appeared to be emanating from one or two natural springs located at approximately NWNE, Section 16, T6S, T97W (see attached map). A response team was mustered and two berms were constructed in the unnamed drainage. Approximately 10 cubic yards (5 cubic yards for each berm) were used as fill material and consisted of adjacent/native material. The fill material was supported by barriers with socks (booms) and hay bales to absorb any potential contaminant(s). Two bell holes were constructed at the bermed locations to collect potentially contaminated water. The water collected from both locations is being pumped to a lined pit located at the Cascade Creek 697-09-61 Pad. OXY is still working on approximating the volume of water diverted to the lined pit. Additional efforts to minimize the spread of the release included booming the creek bed, placing flow controls downstream of potential source areas and pumping potentially impacted water into our produced water management system.

OXY took water samples beginning downstream, at Roan Creek, near the County Line; at Conn Creek, near OXY's guard shack; at Conn Creek below the confluence with Cascade Canyon; at Cascade Canyon above the confluence with Conn Creek; at Cascade Canyon above confluence of the intermittent drainage; and samples of intermittent stream at several points. OXY also, took samples of other areas with flowing or standing water to search for potential other areas of contamination. Initial results of water samples collected downstream of the sheen have not identified hydrocarbon pollutants and no other adverse environmental impacts have been identified downstream of the sheen area. After the initial clean-up response, OXY also washed the unnamed drainage by pressure washing and steam cleaning areas that showed signs of contamination, installed a trench adjacent to the unnamed drainage for controlled drainage of the impact area, brought a hydrologist on board to assist in flow dynamics, used an environmentally friendly tracer dye

to identify spill source, and continued sampling.

Verbal notifications were made to government agencies (NRC, CDPHE, and COGCC) on the evening of June 16th. The U.S. Army Corps of Engineers (ACOE) were notified verbally on June 17th. The tenant has been notified and kept in the loop regarding cleanup and remediation.

Written reports/notifications have been provided to the COGCC. OXY is providing the CDPHE with written notification on the same date as this email to the ACOE. The COGCC has requested that OXY to follow up with a Form 27, remediation form. OXY has also received calls from adjacent landowners, including the Bureau of Land Management.

OXY is working closely with the COGCC to evaluate the source of the sheen and develop the most appropriate corrective actions. Our initial assessment is that an unlined reserve pit located at OXY Cascade Creek

697-09-61 Pad may be the source of the release.

As discussed, we will visit the impacted area discussed above on Tuesday. Please let me know if you have any questions, comments or if you require additional information.

<<6-16 Spill Area with text v2.pdf>>

Sincerely,

Daniel

Daniel I. Padilla
Regulatory Coordinator

7/8/2008

Occidental Oil and Gas Corporation
OXY USA WTP LP
2754 Compass Drive, Suite 170
Grand Junction, CO 81506
daniel_padilla@oxy.com
970.263.3637 - office
970.243-2525 - fax

7/8/2008



U S Army Corps of
Engineers
Sacramento District

Nationwide Permit Summary

33 CFR Part 330; Issuance of Nationwide
Permits - March 19, 2007 includes
corrections of May 8, 2007 and addition of
regional conditions December 2007

38. Cleanup of Hazardous and Toxic Waste. Specific activities required to effect the containment, stabilization, or removal of hazardous or toxic waste materials that are performed, ordered, or sponsored by a government agency with established legal or regulatory authority. Court ordered remedial action plans or related settlements are also authorized by this NWP. This NWP does not authorize the establishment of new disposal sites or the expansion of existing sites used for the disposal of hazardous or toxic waste.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity. (See general condition 27.) (Sections 10 and 404)

Note: Activities undertaken entirely on a Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) site by authority of CERCLA as approved or required by EPA, are not required to obtain permits under Section 404 of the Clean Water Act or Section 10 of the Rivers and Harbors Act.

A. Nationwide Permit General Conditions

Note: To qualify for NWP authorization, the prospective permittee must comply with the following general conditions, as appropriate, in addition to any regional or case-specific conditions imposed by the division engineer or district engineer. Prospective permittees should contact the appropriate Corps district office to determine if regional conditions have been imposed on an NWP. Prospective permittees should also contact the appropriate Corps district office to determine the status of Clean Water Act Section 401 water quality certification and/or Coastal Zone Management Act consistency for an NWP.

☐ 1. Navigation.

☐ (a) No activity may cause more than a minimal adverse effect on navigation.

☐ (b) Any safety lights and signals prescribed by the U.S. Coast Guard, through regulations or otherwise, must be installed and maintained at the permittee's expense on authorized facilities in navigable waters of the United States.

☐ (c) The permittee understands and agrees that, if future operations by the United States require the removal, relocation, or other alteration, of the structure or work herein authorized, or if, in the opinion of the Secretary of the Army or his authorized representative, said structure or work shall cause unreasonable obstruction to the free navigation of the navigable waters, the permittee will be required, upon due notice from the Corps of Engineers, to remove, relocate, or alter the structural work or obstructions caused thereby, without

expense to the United States. No claim shall be made against the United States on account of any such removal or alteration.

☐ 2. **Aquatic Life Movements.** No activity may substantially disrupt the necessary life cycle movements of those species of aquatic life indigenous to the waterbody, including those species that normally migrate through the area, unless the activity's primary purpose is to impound water. Culverts placed in streams must be installed to maintain low flow conditions.

☐ 3. **Spawning Areas.** Activities in spawning areas during spawning seasons must be avoided to the maximum extent practicable. Activities that result in the physical destruction (e.g., through excavation, fill, or downstream smothering by substantial turbidity) of an important spawning area are not authorized.

☐ 4. **Migratory Bird Breeding Areas.** Activities in waters of the United States that serve as breeding areas for migratory birds must be avoided to the maximum extent practicable.

☐ 5. **Shellfish Beds.** No activity may occur in areas of concentrated shellfish populations, unless the activity is directly related to a shellfish harvesting activity authorized by NWPs 4 and 48.

☐ 6. **Suitable Material.** No activity may use unsuitable material (e.g., trash, debris, car bodies, asphalt, etc.). Material used for construction or discharged must be free from toxic pollutants in toxic amounts (see Section 307 of the Clean Water Act).

☐ 7. **Water Supply Intakes.** No activity may occur in the proximity of a public water supply intake, except where the activity is for the repair or improvement of public water supply intake structures or adjacent bank stabilization.

☐ 8. **Adverse Effects From Impoundments.** If the activity creates an impoundment of water, adverse effects to the aquatic system due to accelerating the passage of water, and/or restricting its flow must be minimized to the maximum extent practicable.

☐ 9. **Management of Water Flows.** To the maximum extent practicable, the pre-construction course, condition, capacity, and location of open waters must be maintained for each activity, including stream channelization and storm water management activities, except as provided below. The activity must be constructed to withstand expected high flows. The activity must not restrict or impede the passage of normal or high flows, unless the primary purpose of the activity is to impound water or manage high flows. The activity may alter the pre-construction course, condition, capacity, and location of open waters if it benefits the aquatic environment (e.g., stream restoration or relocation activities).

☐ 10. **Fills Within 100-Year Floodplains.** The activity must comply with applicable FEMA-approved state or local floodplain management requirements.

☐ 11. **Equipment.** Heavy equipment working in wetlands or mudflats must be placed on mats, or other measures must be taken to minimize soil disturbance.



U S Army Corps of
Engineers
Sacramento District

Nationwide Permit Summary

33 CFR Part 330; Issuance of Nationwide
Permits - March 19, 2007 includes
corrections of May 8, 2007 and addition of
regional conditions December 2007

20. Oil Spill Cleanup. Activities required for the containment and cleanup of oil and hazardous substances that are subject to the National Oil and Hazardous Substances Pollution Contingency Plan (40 CFR part 300) provided that the work is done in accordance with the Spill Control and Countermeasure Plan required by 40 CFR 112.3 and any existing state contingency plan and provided that the Regional Response Team (if one exists in the area) concurs with the proposed containment and cleanup action. This NWP also authorizes activities required for the cleanup of oil releases in waters of the United States from electrical equipment that are governed by EPA's polychlorinated biphenyl spill response regulations at 40 CFR Part 761. (Sections 10 and 404)

A. Nationwide Permit General Conditions

Note: To qualify for NWP authorization, the prospective permittee must comply with the following general conditions, as appropriate, in addition to any regional or case-specific conditions imposed by the division engineer or district engineer. Prospective permittees should contact the appropriate Corps district office to determine if regional conditions have been imposed on an NWP. Prospective permittees should also contact the appropriate Corps district office to determine the status of Clean Water Act Section 401 water quality certification and/or Coastal Zone Management Act consistency for an NWP.

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- ☐ (b) Any safety lights and signals prescribed by the U.S. Coast Guard, through regulations or otherwise, must be installed and maintained at the permittee's expense on authorized facilities in navigable waters of the United States.
- ☐ (c) The permittee understands and agrees that, if future operations by the United States require the removal, relocation, or other alteration, of the structure or work herein authorized, or if, in the opinion of the Secretary of the Army or his authorized representative, said structure or work shall cause unreasonable obstruction to the free navigation of the navigable waters, the permittee will be required, upon due notice from the Corps of Engineers, to remove, relocate, or alter the structural work or obstructions caused thereby, without expense to the United States. No claim shall be made against the United States on account of any such removal or alteration.

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☐ 10. **Fills Within 100-Year Floodplains.** The activity must comply with applicable FEMA-approved state or local floodplain management requirements.

☐ 11. **Equipment.** Heavy equipment working in wetlands or mudflats must be placed on mats, or other measures must be taken to minimize soil disturbance.

☐ 12. **Soil Erosion and Sediment Controls.** Appropriate soil erosion and sediment controls must be used and maintained in effective operating condition during construction, and all exposed soil and other fills, as well as any work below the ordinary high water mark or high tide line, must be permanently stabilized at the earliest practicable date. Permittees are encouraged to perform work within waters of the United States during periods of low-flow or no-flow.



OXY USA WTP LP

A subsidiary of Occidental Petroleum Corporation

Rocky Mountain Asset Team (RMAT)

2754 Compass Dr., Suite 170,
Grand Junction CO, 81506
Phone: 970-263-3600
Fax: 970-243-2525

June 23, 2008

Mr. Craig Stasinis
Colorado Department of Public Health and Environment
4300 Cherry Creek Drive South
Denver, Colorado 80246

**Re: OXY USA WTP LP
Notification Letter for Spill Discovered on June 16, 2008
Verbally Reported on June 16, 2008**

Dear Mr. Stasinis:

On June 16, 2008 OXY USA WTP LP ("OXY") reported a release that may have occurred from an unlined reserve pit located on OXY's 697-09-61 well pad to the Colorado Department of Public Health and Environment's (CDPHE) spill hotline. The release was identified on June 16, 2008, mid-afternoon when OXY, in conjunction with a local rancher, identified a sheen on an intermittent, unnamed drainage to Cascade Canyon in Garfield County, CO. The sheen appeared to be emanating from one or two natural springs located at approximately NWNE, Section 16, T6S, T97W (see attached map).

A response team was called up and constructed two berms in the unnamed drainage. The berms were supported by barriers with socks (booms) and hay bales to absorb any potential contaminant(s). Two bell holes were constructed at the bermed locations to collect potentially contaminated water. The water collected from both locations is being pumped to a lined pit located at the Cascade Creek 697-09-61 Pad. OXY is still working on approximating the volume of water diverted to the lined pit. Additional efforts to minimize the spread of the release included booming the creek bed, placing flow controls downstream of potential source areas and pumping potentially impacted water into our produced water management system.

OXY took water samples beginning downstream, at Roan Creek, near the County Line; at Conn Creek, near OXY's guard shack; at Conn Creek below the confluence with Cascade Canyon; at Cascade Canyon above the confluence with Conn Creek; at Cascade Canyon above confluence of the intermittent drainage; and samples of intermittent stream at several points. OXY also, took samples of other areas with flowing or standing water to search for potential other areas of contamination. Initial results of water samples collected downstream of the sheen have not identified hydrocarbon pollutants and no other adverse environmental impacts have been identified down stream of the sheen area. After the initial clean-up response, OXY also washed the unnamed drainage by pressure washing and steam cleaning areas that showed signs of contamination, installed a trench adjacent to the unnamed drainage for controlled drainage of the impact area, brought a hydrologist on board to assist in flow dynamics, used an environmentally friendly tracer dye to identify spill source, and continued sampling.

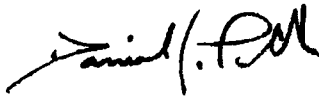
Verbal notifications were made on the evening of June 16th to the following government agencies: National Response Center (they issued OXY with Report No.: 874341), CDPHE, and Colorado Oil and Gas Conservation Commission (COGCC). The U.S. Army Corps of Engineers (ACOE) was notified verbally on June 17th. The tenant has also been notified and kept in the loop. Written reports/notifications have been provided to the COGCC. OXY is providing the ACOE with written notification today. The

COGCC has requested that OXY follow up with a Form 27 remediation form. OXY has also received calls from adjacent landowners including the Bureau of Land Management.

OXY is working closely with the COGCC to evaluate the source of the sheen and develop the most appropriate corrective actions. Our initial assessment is that an unlined reserve pit located at OXY's Cascade Creek 697-09-61 Pad may be the source of the release. OXY will implement corrective action and a final remediation plan in conjunction with the COGCC and additional agencies as necessary.

Please let me know if you have any questions, comments, or require additional information. Thank you for your assistance in this matter.

Sincerely,

A handwritten signature in black ink, appearing to read "Daniel I. Padilla". The signature is stylized with a large, sweeping initial "D" and a trailing flourish.

Daniel I. Padilla
Regulatory Coordinator

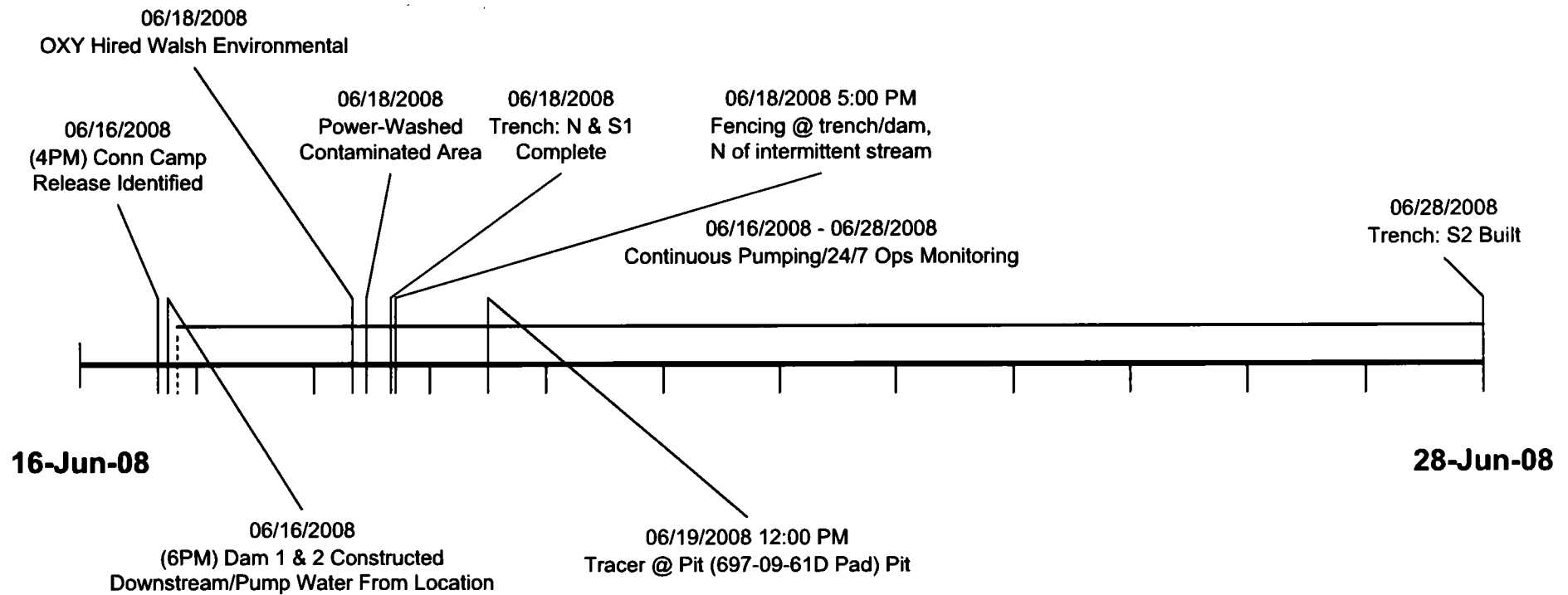
Enclosure

cc: File
Regulatory
Legal
HES

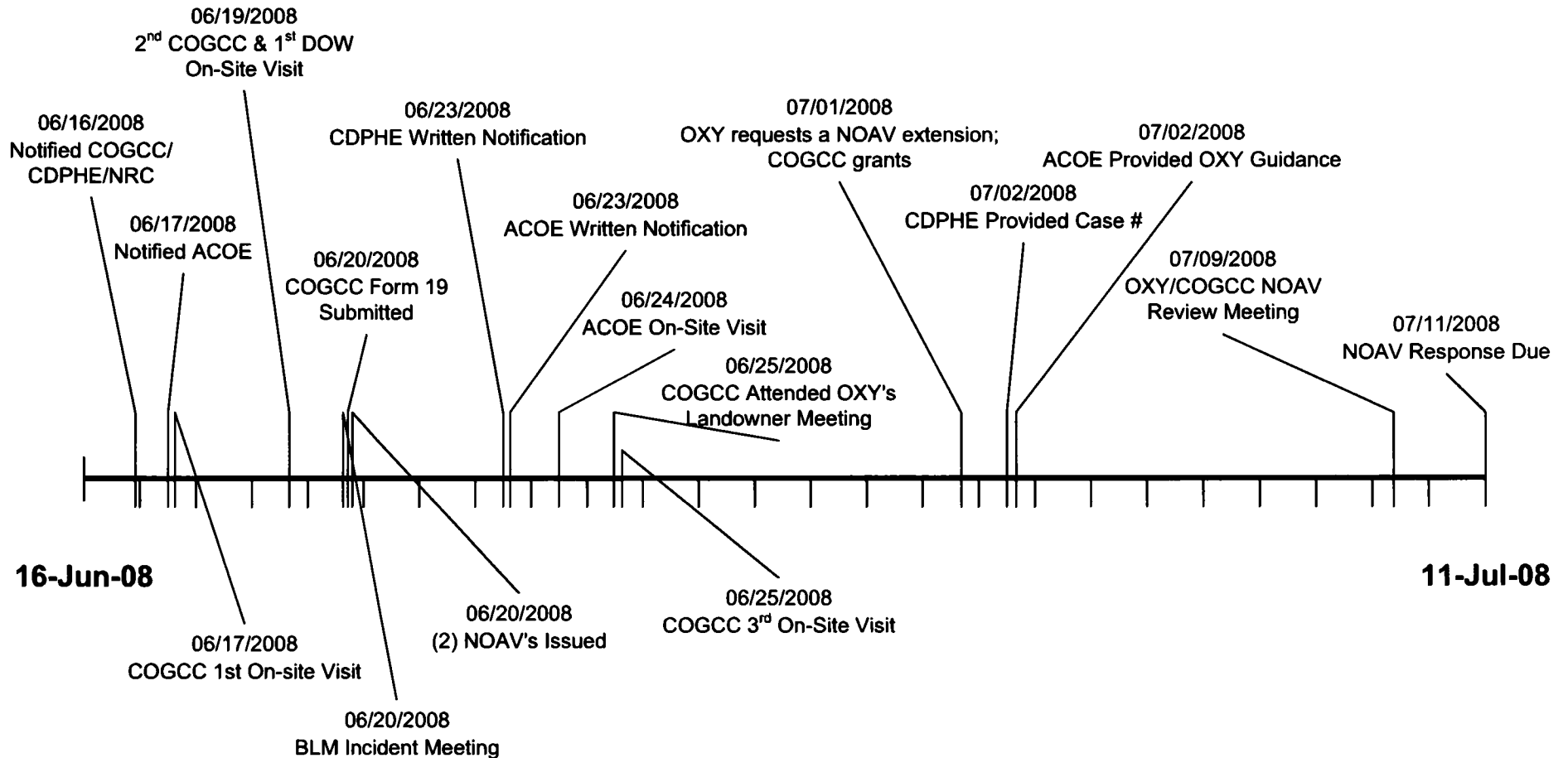
Appendix B:

Timeline of Events

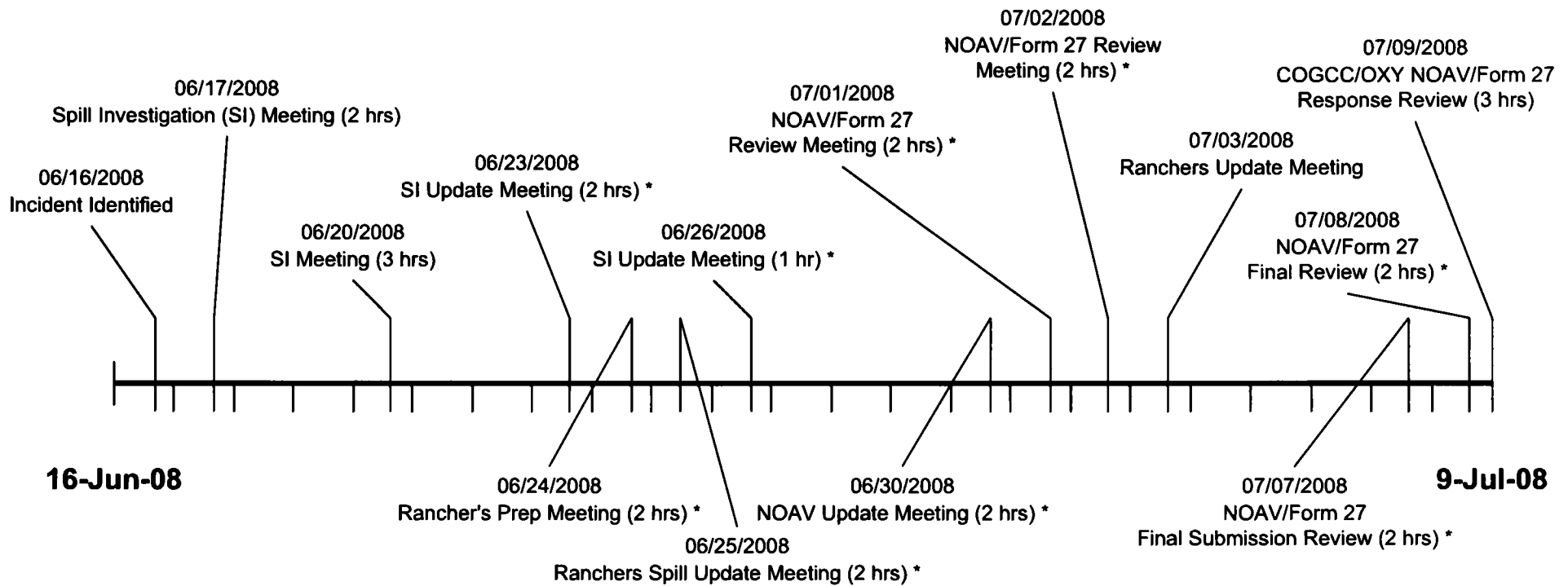
OXY USA WTP LP
Conn Camp (NOAV #'s: 200191194 & 200191518):
Initial Events Timeline
(First 2-Weeks)



OXY USA WTP LP
Conn Camp (NOAV #'s: 200191194 & 200191518):
Agency Liaison Timeline (07/11/08)



OXY USA WTP LP
Conn Camp (NOAV #'s: 200191194 & 200191518):
OXY Spill Meeting(s) Timeline (07/09/08)



NOTES:

TOTAL Meeting Time: 25 hrs

*** = Both Conn Camp & Rock Springs
 (NOAV #: 200191518) Discussion**

OXY Personnel Time Devoted Per Group:

Management: 55 hrs

Engineering: 175 hrs

Regulatory: 42.5 hrs

Operations: 80 hrs

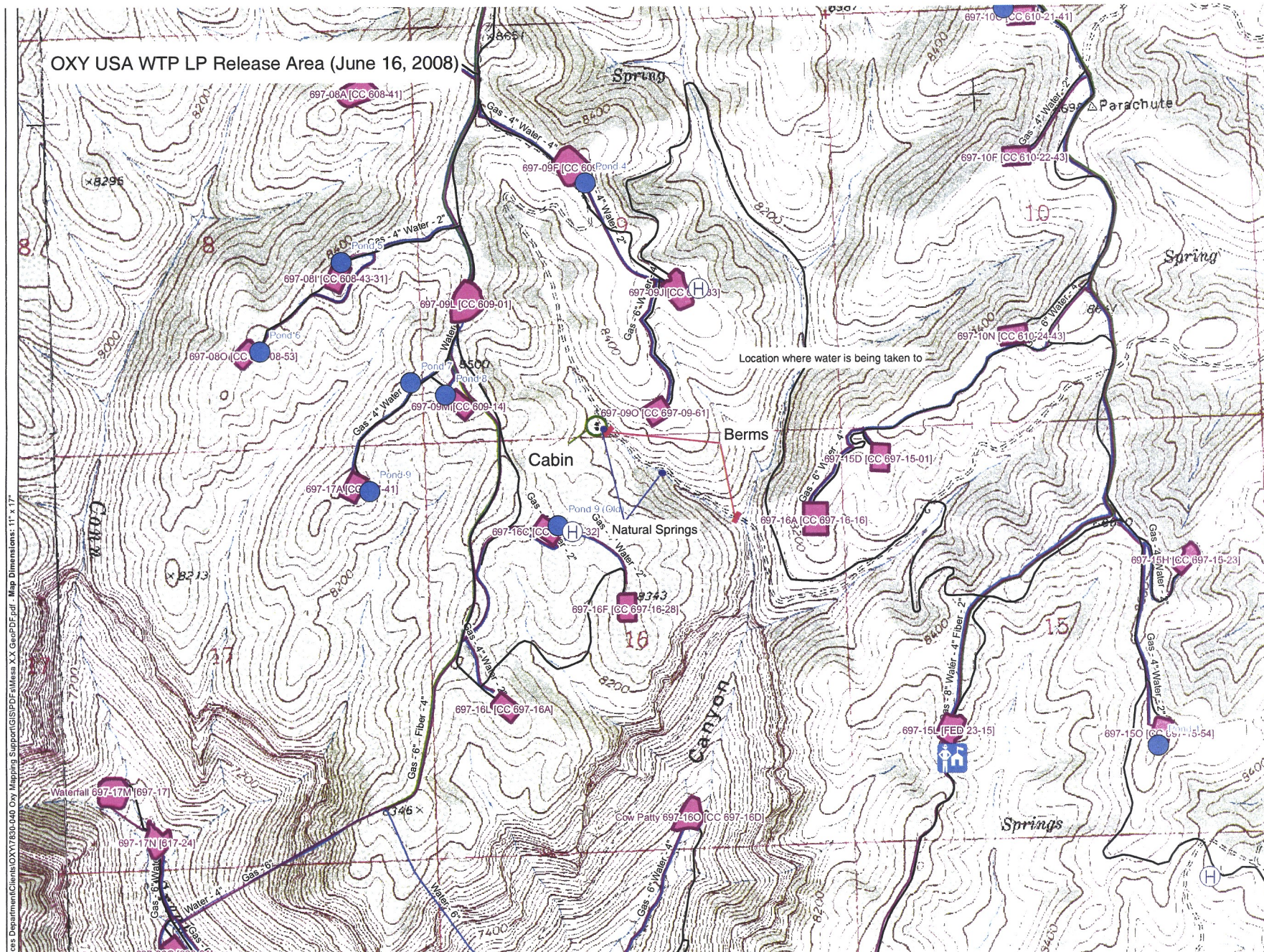
Health, Environment, & Safety (HES): 193.5 hrs

TOTAL OXY Personnel Time: 546 hrs

Appendix C:

Figures and Maps

OXY USA WTP LP Release Area (June 16, 2008)



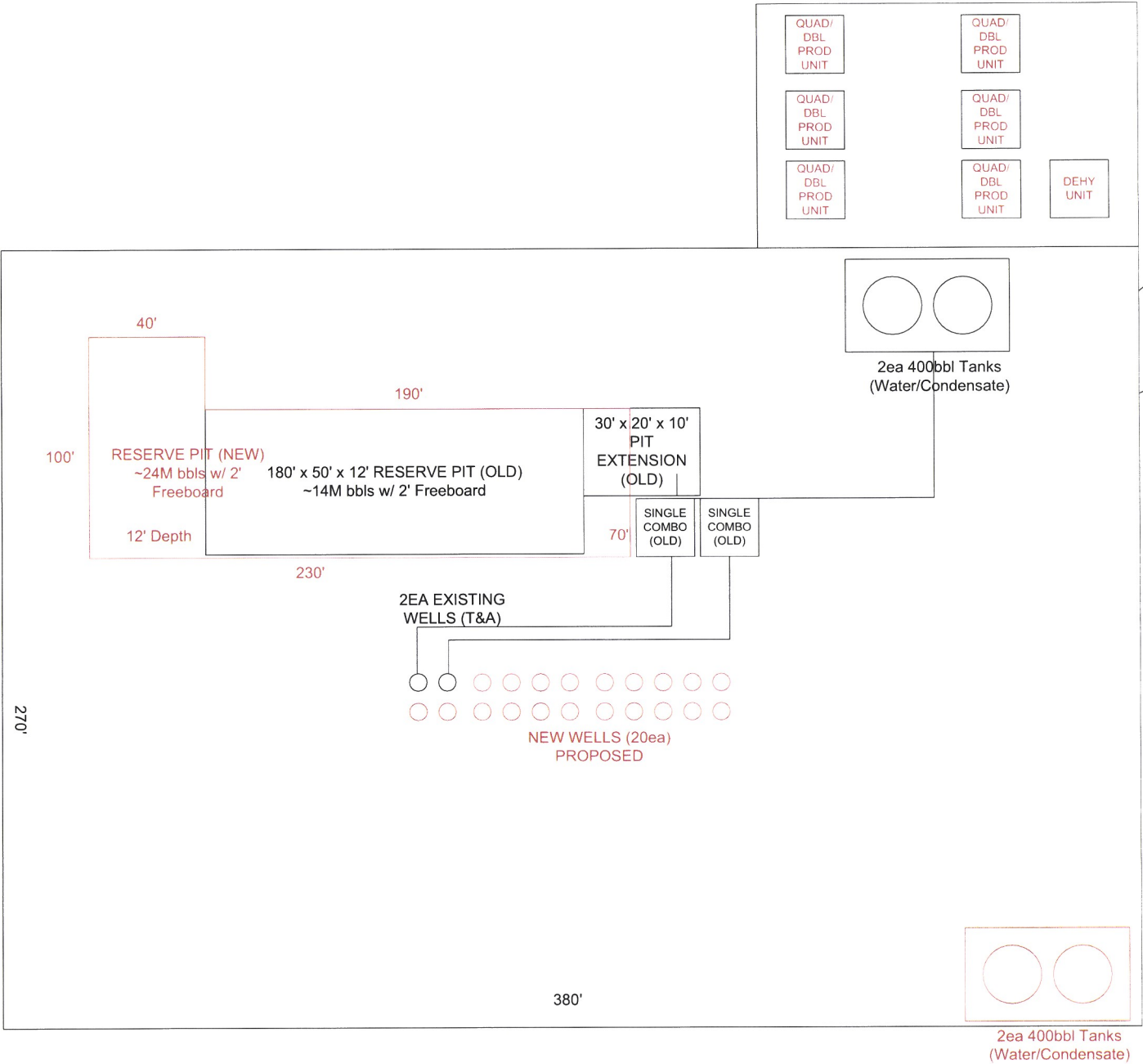
APPENDIX C:
09-61D PAD LAYOUT (OLD/NEW)



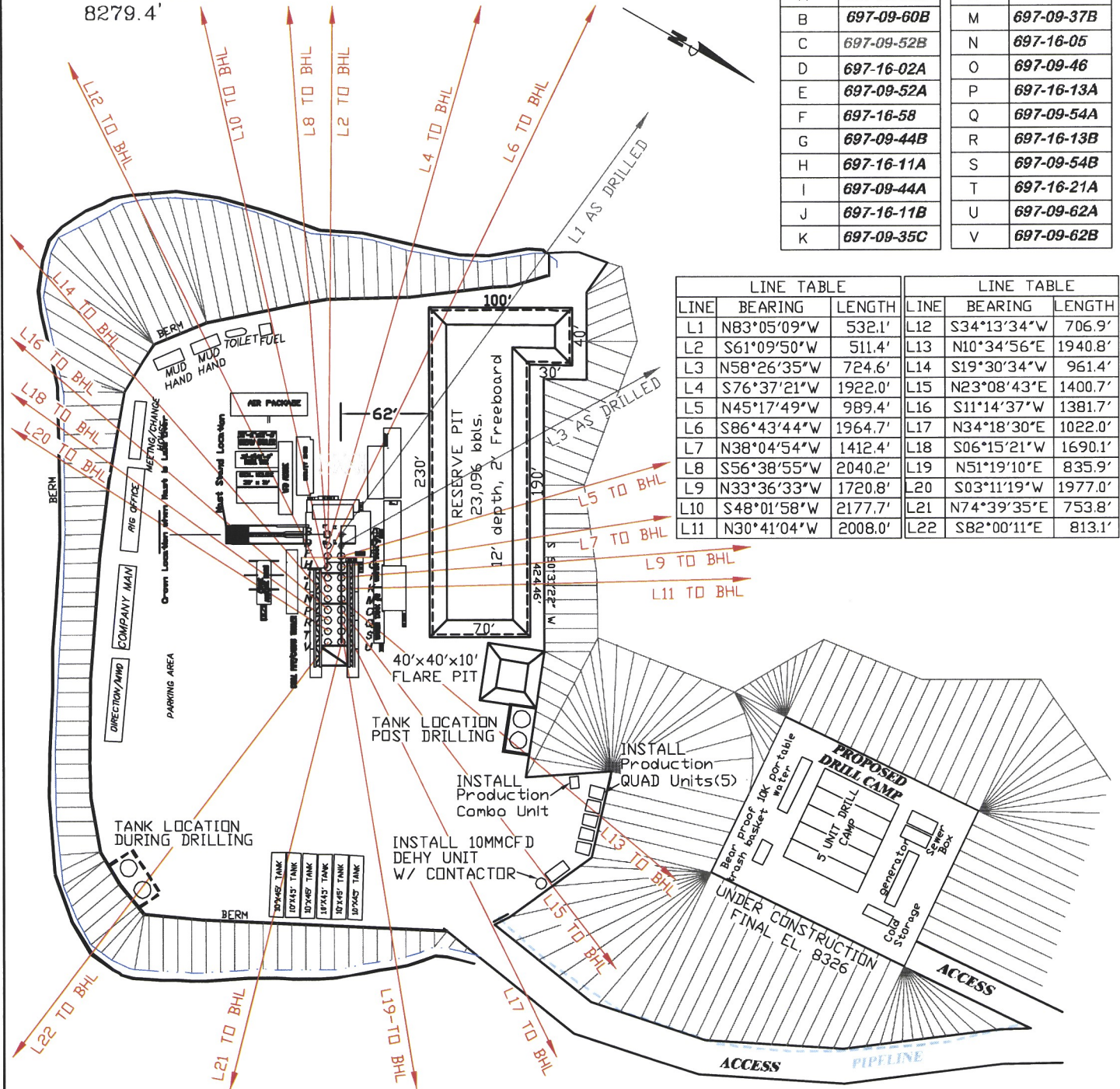
Reserve Pit (Black) – unlined pit that supported drilling of 2ea wells on pad. Extended into flare pit to facilitate reclamation of cuttings. Extension used as emergency overflow of well fluids, resulting from limited access during portions of winter (snowfall).

Facilities (Black) – each well supported by NATCO single combo production units, sending gas into gas gathering line, water and condensate to 400 bbl tanks (water/condensate respectively).

Pit/Facilities (Red) – former pit reclaimed. New pit extended on former footprint to support multi-well pad. Pit lined with 36mil RPP and geotextile underneath. Tanks temporarily moved to SE corner of pad to facilitate drilling operations. Production units sited at NE corner of pad to facilitate drilling operations and provide option for SIMOPS.



ASCONSTRUCTED PAD
GRADED ELEVATION:
8279.4'




SLOT	WELL	SLOT	WELL
A	697-09-60D	L	697-16-04
B	697-09-60B	M	697-09-37B
C	697-09-52B	N	697-16-05
D	697-16-02A	O	697-09-46
E	697-09-52A	P	697-16-13A
F	697-16-58	Q	697-09-54A
G	697-09-44B	R	697-16-13B
H	697-16-11A	S	697-09-54B
I	697-09-44A	T	697-16-21A
J	697-16-11B	U	697-09-62A
K	697-09-35C	V	697-09-62B

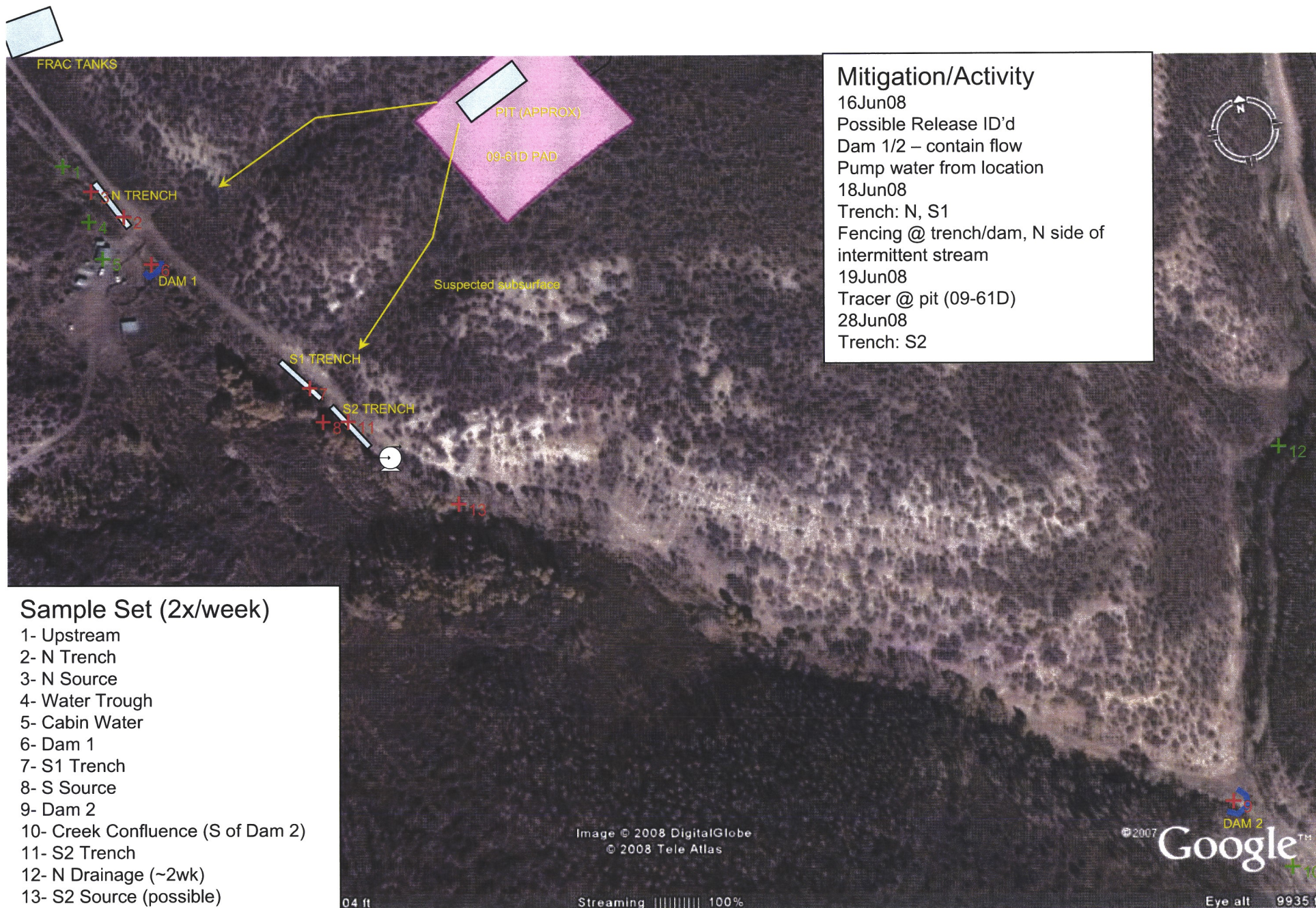
LINE TABLE			LINE TABLE		
LINE	BEARING	LENGTH	LINE	BEARING	LENGTH
L1	N83°05'09"W	532.1'	L12	S34°13'34"W	706.9'
L2	S61°09'50"W	511.4'	L13	N10°34'56"E	1940.8'
L3	N58°26'35"W	724.6'	L14	S19°30'34"W	961.4'
L4	S76°37'21"W	1922.0'	L15	N23°08'43"E	1400.7'
L5	N45°17'49"W	989.4'	L16	S11°14'37"W	1381.7'
L6	S86°43'44"W	1964.7'	L17	N34°18'30"E	1022.0'
L7	N38°04'54"W	1412.4'	L18	S06°15'21"W	1690.1'
L8	S56°38'55"W	2040.2'	L19	N51°19'10"E	835.9'
L9	N33°36'33"W	1720.8'	L20	S03°11'19"W	1977.0'
L10	S48°01'58"W	2177.7'	L21	N74°39'35"E	753.8'
L11	N30°41'04"W	2008.0'	L22	S82°00'11"E	813.1'

BEFORE DIGGING
CALL FOR
UTILITY LINE LOCATION
NOTE: THE EARTH QUANTITIES ON
THIS DRAWING ARE ESTIMATED
AND THE USE OF IS AT THE
RESPONSIBILITY OF THE USER.



 RIFFIN & ASSOCIATES, INC.		OXY USA WTP LP CASCADE CREEK 697-09-61 CORE PAD ASCONSTRUCTED PAD & PROPOSED DRILL CAMP - EXTENSION
1414 ELK ST., SUITE 202 ROCK SPRINGS, WY 82901 (307) 362-5028	JOB No. 15304	SCALE: 1" = 100'
	REVISED: 5/27/08	EXHIBIT 2A

Appendix C: Conn Camp Imagery (vic 09-61D PAD)



Appendix D:
Drilling Fluids Recap

Total Materials List - Cascade Creek 697-9-60D

Product	Quantity
Aluminum Stearate (25 #/sk)	13
Aluminum Stearate (44 #/sk) (/)	4
Aqua Bloc (50 lb/Bag)	571
Busan 1059 (40 #/sk)	6
Calcium Chloride Powder (50 #/sk)	17
Caustic Soda (50 #/sk)	233
Desco CF (25/sx) (/) "	6
Dyna Fiber M (25 #/sx)	56
Ecodrill 317 (55 Gal/Drum)	12
Fiber Seal (40 #/sk)	55
Flex Firm KA (40 #/sx)	637
Flowzan (25 #/sx)	152
Gel H (50 #/sk)	2985
HME (5 gal/Pail)	54
LT Phalt (50 #/sk)	298
Lime (50 #/sk)	17
Mica F (50 #/sk)	67
Microseal (50 lb/sx)	58
NewBar (100 #/sk)	46
NewCarb M (50 #/sx)	58
NewGel (100 #/sk)	755
NewPHPA (5 Gal/Pail)	19
NewPac R (50 #/sk)	46
NewSPA (50 #/sack)	121
NewSwell (50 lb/sk)	8
Newease 203 5gal/pail (5 gal/Pail)	6
NoFoam X (5 gal/Pail)	44
Phenoseal F (50 #/sk)	253
SODIUM BICARB (50 lb/sack)	32
Sawdust (20#/sk)	558
Soda Ash (50 #/sk)	6
Walnut Shell M (50 #/sk)	19

Total Materials List - Cascade Creek 697-09-52B

Product	Quantity
Aluminum Stearate (25 #/sk)	3
Aqua Bloc (50 lb/Bag)	145
Busan 1059 (40 #/sk)	1
Caustic Soda (50 #/sk)	79
Desco CF (25/sx) (/) "	3
Dyna Fiber M (25 #/sx)	67
Ecodrill 317 (55 Gal/Drum)	12
Engineering (24 hr) (1/ea)	15
Fiber Seal (40 #/sk)	32
FlexFirm KA (50 lb/sk)	224
Flowzan (25 #/sx)	23
Gel H (50 #/sk)	1307
HME (5 gal/Pail)	23
LT Phalt (50 #/sk)	187
Lime (50 #/sk)	7
Mica F (50 #/sk)	44
NewBar (50 #/sx)	90
NewCarb C (50 #/sk)	14
NewEase (55 Gal/Drum)	1
NewGel (100 #/sk)	15
NewPHPA (5 Gal/Pail)	3
NewPac R (50 #/sk)	47
NewSPA (50 #/sack)	2
NewSwell (55 #/sk) (/)	4
Phenoseal F (50 #/sk)	59
SODIUM BICARB (50 lb/sack)	14
Sawdust (20#/sk)	318
Soda Ash (50 #/sk)	1
Walnut Shell M (50 #/sk)	67

Appendix E:

OXY's Expenses Incurred to Date

OXY Spill Response Expenses as of July 01, 2008:	Costs reflect Conn Camp:	
Task	Contractor	~Amount
Sampling	Key Lab/ESC	\$6,000
Earthwork	DIA	\$25,000
Third Party (Walsh)	Walsh	\$4,700
Pumping Services	WP&D	\$78,000
Pumping Services	Kiewit	\$12,000
Trucking	Old West	\$3,500
Fencing/Containment	Fort Mackey	\$48,000
Inspection/General Support	Roadrunner	\$6,000
Pipeline	Mountain Top	\$32,000
Frac Tank Rental	Dalbo	\$3,000
Third Party (Stormwater)	Cordilleran	\$2,756
Third Party (USACE Compliance)	HRL	\$1,500
OXY Staff Hours (564)	OXY	\$33,276
MATERIALS:		
Pipe	Poly	\$52,000
Booms/Absorbent Pads	Wilson Supply	\$4,000
HESCO	barriers	\$3,000
Fencing Supplies	posts/wire	\$24,000
	TOTAL:	~\$338,732

Appendix F:

Analytical Data Collected to Date and Sample Locations

Water Sampling Results - Conn Camp by Location - Multiple Sample Sites Only

Results Greater than MCL

SITE:				Mg/L (parts per million)					
Sample ID	Date	Map I.D.	Sample Location	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
MCL				0.005	1.00	0.700	10.0	NA	NA
0616-18	16-Jun-08	1	Latham - Upstream - Mid	BDL	BDL	BDL	BDL	BDL	NA
0617-06	17-Jun-08	1	Latham - Upstream - Mid	BDL	BDL	BDL	BDL	BDL	NA
0624-05	24-Jun-08	1	Latham - Upstream	0.006	BDL	0.0019	0.016	0.50	340
0630-01	30-Jun-08	1	Latham - Upstream	0.0024	BDL	0.0018	0.0098	0.59	350
01-605-01	2-Jul-08	1	Latham - Upstream	BDL	BDL	BDL	BDL	BDL	NA
1	7-Jul-08	1	Latham - Upstream	BDL	BDL	BDL	BDL	BDL	NA

SITE:				Mg/L (parts per million)					
Sample ID	Date	Map I.D.	Sample Location	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
0624-06	24-Jun-08	2	Latham - N Trench	1.60	2.50	BDL	11.0	BDL	470
0630-02	30-Jun-08	2	Latham - N Trench	1.20	8.30	0.520	10.0	46.0	470
2	7-Jul-08	2	Latham - N Trench	1.00	5.80	0.320	6.8	50.0	

SITE:				Mg/L (parts per million)					
Sample ID	Date	Map I.D.	Sample Location	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
0619-02	19-Jun-08	3	Source 2 - Upstream	1.10	9.60	0.160	9.50	Pending	NA
0624-07	24-Jun-08	3	Latham - N Source	0.130	0.360	0.0011	1.60	6.5	360
0630-03	30-Jun-08	3	Latham - N Source	0.960	12.0	0.850	19.0	150	540
3	7-Jul-08	3	Latham - N Source (from drainage)	0.027	0.12	0.005	1.7	6	

SITE:				Mg/L (parts per million)					
Sample ID	Date	Map I.D.	Sample Location	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
MCL				0.005	1.00	0.700	10.0	NA	NA
0617-09	17-Jun-08	4	Latham - Trough	0.00071	0.0014	BDL	0.003	BDL	NA
0630-04	30-Jun-08	4	Latham - Trough	BDL	BDL	BDL	BDL	BDL	360
0702-08	2-Jul-08	4	Latham - Trough	BDL	BDL	BDL	BDL	BDL	NA
4	2-Jul-08	4	Latham - Trough	BDL	BDL	BDL	BDL	BDL	NA

SITE:				Mg/L (parts per million)					
Sample ID	Date	Map I.D.	Sample Location	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
0617-12	17-Jun-08	6	Latham - Pump - Out (Upstream Pit)	0.087	0.830	0.024	1.30	6.20	NA
0624-10	24-Jun-08	6	Latham - Dam 1	0.110	0.490	0.032	1.00	4.00	370
0630-06	30-Jun-08	6	Latham - Dam 1	0.0019	BDL	BDL	0.067	1.10	390
0702-10	2-Jul-08	6	Latham - Dam 1	BDL	BDL	BDL	BDL	BDL	NA
6	7-Jul-08	6	Latham - Dam 1	0.002	BDL	BDL	0.07	0.7	NA

SITE:				Mg/L (parts per million)					
Sample ID	Date	Map I.D.	Sample Location	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
0619-03	19-Jun-08	7	Sump/South Trench	1.40	3.00	0.044	2.90	Pending	NA
0624-11	24-Jun-08	7	Latham - S Trench	1.30	3.30	0.084	1.50	11	800
0630-07	30-Jun-08	7	Latham - S Trench	1.60	5.80	0.160	5.30	27	790
7	7-Jul-08	7	Latham - S Trench	1.30	4.00	BDL	3.00	BDL	NA

SITE:				Mg/L (parts per million)					
Sample ID	Date	Map I.D.	Sample Location	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
0619-04	19-Jun-08	8	Creek by Sump/South Trench	0.73	1.50	BDL	3.70	Pending	NA
0624-12	24-Jun-08	8	Latham - S Source	0.94	3.00	0.071	3.80	15	540
0630-08	30-Jun-08	8	Latham - S Source	1.30	6.00	0.14	6.00	30	640
8	7-Jul-08	8	Latham - S1 Source	0.89	3.50	BDL	0.38	25	NA

SITE:				Mg/L (parts per million)					
Sample ID	Date	Map I.D.	Sample Location	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
MCL		9		0.005	1.00	0.700	10.0	NA	NA
0616-16	16-Jun-08	9	A1 - Above Dike	BDL	BDL	BDL	BDL	BDL	NA
0617-13	17-Jun-08	9	Upstream of Lower Dike	BDL	0.0017	BDL	0.0071	BDL	NA
0624-13	24-Jun-08	9	Latham - Dam 2	0.0011	0.056	BDL	0.016	0.13	1300
0630-09	30-Jun-08	9	Latham - Dam 2	BDL	BDL	BDL	BDL	BDL	890
9	7-Jul-08	9	Latham - Dam 2	0.0006	BDL	BDL	0.0028	BDL	1000

SITE:				Mg/L (parts per million)					
Sample ID	Date	Map I.D.	Sample Location	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
0616-17	16-Jun-08	10	A2 - Below Dike	BDL	BDL	BDL	BDL	BDL	NA
0617-14	17-Jun-08	10	Downstream of Lower Dike	BDL	0.0016	BDL	BDL	BDL	NA
0624-14	24-Jun-08	10	Latham - Creek Confluence	BDL	BDL	BDL	0.0024	BDL	350
0630-10	30-Jun-08	10	Latham - Creek Confluence	BDL	BDL	BDL	BDL	BDL	370
10	7-Jul-08	10	Latham - Creek Confluence	BDL	BDL	BDL	BDL	BDL	340

SITE:				Mg/L (parts per million)					
Sample ID	Date	Map I.D.	Sample Location	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
11	7-Jul-08	11	Latham S2 Trench	0.11	0.18	BDL	0.21	1.2	NA

SITE:				Mg/L (parts per million)					
Sample ID	Date	Map I.D.	Sample Location	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
0619-06	19-Jun-08	12	Latham - Upstream - South Y	Pending	-	-	-	Pending	NA
0624-15	24-Jun-08	12	Latham - Upstream - South Y	BDL	BDL	BDL	BDL	BDL	340

SITE:			Mg/L (parts per million)						
		37							
Sample ID	Date	Map I.D.	Sample Location	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
MCL				0.005	1.00	0.700	10.0	NA	NA
0616-19	16-Jun-08	37	Latham - Downstream	0.300	0.790	BDL	2.00	BDL	NA
0617-11	17-Jun-08	37	Latham - Downstream	0.300	0.670	BDL	1.90	10.0	NA
0618-06	18-Jun-08	37	Latham - Downstream - Source 1	0.690	0.290	0.0042	0.540	Pending	NA
0702-11	2-Jul-08	37	Latham - S2 Source (in creek?)	BDL	BDL	BDL	0.015	0.200	NA
37	7-Jul-08	37	Latham - S2 Source	0.21	0.49	0.089	1.100	5.100	NA

All Sampling Results by Date - Conn Camp

06/16/2008				Mg/L (parts per million)					
Sample ID	Map I.D.	Sample Location	Matrix	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
MCL			Water	0.005	1.00	0.700	10.0	NA	NA
0616-18	1	Latham - Upstream - Mid	Water	BDL	BDL	BDL	BDL	BDL	NA
0616-16	9	A1 - Above Dike	Water	BDL	BDL	BDL	BDL	BDL	NA
0616-17	10	A2 - Below Dike	Water	BDL	BDL	BDL	BDL	BDL	NA
0616-01	14	Creek - South - 3 Miles	Water	BDL	BDL	BDL	BDL	NA	NA
0616-02	15	Creek - Guard Shack (Lower)	Water	BDL	BDL	BDL	BDL	NA	NA
0616-03	16	Creek - 620-1	Water	BDL	BDL	BDL	BDL	NA	NA
0616-04	17	Creek - Mountain Road - Waterfall	Water	0.00033	0.00091	BDL	BDL	NA	NA
0616-05	18	Creek - Down from 43-32	Soil	* 0.440	0.180	0.031	0.700	NA	NA
0616-06	19	Creek - Old Pipeline Rupture	Soil	* 0.0003	0.0008	0.00032	0.0019	NA	NA
	19	Creek - Old Pipeline Rupture (Lab Dup)	Soil	0.00038	BDL	BDL	0.0007	NA	NA
0616-07	20	Creek - Trinidad Crossing	Water	BDL	BDL	BDL	BDL	BDL	NA
0616-08	21	Lower Williams Corral	Water	BDL	BDL	BDL	BDL	NA	NA
0616-09	22	Lower Williams Pond Sludge	Soil	* 0.00022	0.00071	0.00035	BDL	NA	NA
0616-10	23	Lower Williams - Below Pond	Water	BDL	BDL	BDL	BDL	NA	NA
0616-11	24	Lower Williams - Pond	Water	BDL	BDL	BDL	BDL	NA	NA
0616-12	25	Joining Stream - Culvert	Water	BDL	BDL	BDL	BDL	NA	NA
0616-13	26	Joining Stream - Upstream	Water	BDL	BDL	BDL	BDL	NA	NA
0616-14	27	Lower Williams - Upstream - Culvert	Water	BDL	BDL	BDL	BDL	NA	NA
0616-15	28	Lower Williams - Upstream - Upstream	Water	BDL	BDL	BDL	BDL	NA	NA
0616-19	37	Latham - Downstream	Water	0.300	0.790	BDL	2.00	BDL	NA

* As per COGCC Series 900 Regulations, the soil MCL of Benzene is 1000 mg/Kg (ppm)

MCL = Maximum Contaminant Level (per COGCC and CDPHE)

06/17/2008				Mg/L (parts per million)					
Sample ID	Map I.D.	Sample Location	Matrix	Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
MCL			Water	0.005	1.00	0.700	10.0	NA	NA
0617-06	1	Latham - Upstream - Mid	Water	BDL	BDL	BDL	BDL	BDL	NA
0617-09	4	Latham - Troth	Water	0.00071	0.0014	BDL	0.003	BDL	NA
0617-10	5	Latham - Pump - Inside	Water	BDL	BDL	BDL	BDL	BDL	NA
	5	Latham - Pump - Inside (Lab Dup)	Water	BDL	0.00059	BDL	0.00056	BDL	NA
0617-12	6	Latham - Pump - Out (Upstream Pit)	Water	0.087	0.830	0.024	1.30	6.20	NA
0617-13	9	Upstream of Lower Dike	Water	BDL	0.0017	BDL	0.0071	BDL	NA
0617-14	10	Downstream of Lower Dike	Water	BDL	0.0016	BDL	BDL	BDL	NA
0617-01	15	Creek - Guard Shack (Lower)	Water	BDL	0.00063	BDL	BDL	NA	NA
0617-02	16	Creek - 620-1	Water	BDL	BDL	BDL	BDL	NA	NA
0617-03	17	Creek - Mountain Road - Waterfall	Water	BDL	BDL	BDL	BDL	NA	NA
0617-04	20	Creek - Trinidad Crossing	Water	BDL	BDL	BDL	BDL	BDL	NA
0617-05	31	Latham - Upstream - Spring	Water	BDL	BDL	BDL	BDL	BDL	NA
0617-07	32	Latham - Spring - Pond	Water	0.037	0.160	0.0024	0.690	3.00	NA
0617-08	33	Latham - Spring - Fresh	Water	BDL	BDL	BDL	0.00075	BDL	NA
0617-15	34	Lower Corral	Water	BDL	0.00084	BDL	BDL	NA	NA
0617-11	37	Latham - Downstream	Water	0.300	0.670	BDL	1.90	10.0	NA

06/18/2008				Mg/L (parts per million)					
Sample ID	Map I.D.	Sample Location		Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
MCL			Water	0.005	1.00	0.700	10.0	NA	
0618-01	14	Creek - South - 3 Miles	Water	0.00043	0.00065	BDL	0.00052	Pending	NA
0618-02	15	Creek - Guard Shack (Lower)	Water	0.00093	0.0012	0.00051	0.0018	Pending	NA
0618-03	16	Creek - 620-1	Water	BDL	BDL	BDL	BDL	Pending	NA
0618-04	17	Creek - Mountain Road - Waterfall	Water	BDL	0.0011	BDL	BDL	Pending	NA
0618-05	20	Creek - Trinidad Crossing	Water	BDL	BDL	BDL	BDL	Pending	NA
0618-06	37	Latham - Downstream - Source 1	Water	0.530	0.290	0.0042	0.540	Pending	1436

MCL = Maximum Contaminant Level (per COGCC and CDPHE)

06/19/2008				Mg/L (parts per million)					
Sample ID	Map ID	Sample Location		Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
MCL			Water	0.005	1.00	0.700	10.0	NA	NA
0619-02	3	Source 2 - Upstream	Water	1.10	9.60	0.160	9.50	Pending	562
0619-03	7	Sump/South Trench	Water	1.40	3.00	0.044	2.90	Pending	1062
0619-04	8	Creek by Sump/South Trench	Water	0.73	1.50	BDL	3.70	Pending	NA
0619-06	12	Latham - Upstream - South Y	Water	Pending	-	-	-	Pending	NA
0619-05	39	Tributary - Southwest	Water	0.790	2.10	BDL	5.30	Pending	NA
0619-01	40	605-01 West/North	Water	0.001	0.092	BDL	BDL	0.500	638

06/24/2008				Mg/L (parts per million)					
Sample ID	Map I.D.	Sample Location		Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
MCL			Water	0.005	1.00	0.700	10.0	NA	NA
0624-05	1	Latham - Upstream	Water	0.006	BDL	0.0019	0.016	0.50	340
0624-06	2	Latham - N Trench	Water	1.60	2.50	BDL	11.0	BDL	470
0624-07	3	Latham - N Source	Water	0.130	0.360	0.0011	1.60	6.5	360
0624-10	6	Latham - Dam 1	Water	0.110	0.490	0.032	1.00	4.00	370
0624-11	7	Latham - S Trench	Water	1.30	3.30	0.084	1.50	11.0	800
0624-12	8	Latham - S Source	Water	0.94	3.00	0.071	3.80	15	540
0624-13	9	Latham - Dam 2	Water	0.0011	0.056	BDL	0.016	0.13	1300
0624-14	10	Latham - Creek Confluence	Water	BDL	BDL	BDL	0.0024	BDL	350
0624-15	12	Latham - Upstream - South Y	Water	BDL	BDL	BDL	BDL	BDL	340

06/30/2008				Mg/L (parts per million)					
Sample ID	Map I.D.	Sample Location		Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
MCL			Water	0.005	1.00	0.7	10.0	NA	NA
0630-01	1	Latham - Upstream	Water	0.0024	BDL	0.0018	0.0098	0.59	350
0630-02	2	Latham - N Trench	Water	1.20	8.30	0.520	10.0	46.0	470
0630-03	3	Latham - N Source	Water	0.960	12.0	0.850	19.0	150	540
0630-04	4	Latham - Troth	Water	BDL	BDL	BDL	BDL	BDL	360
0630-06	6	Latham - Dam 1	Water	0.0019	BDL	BDL	0.067	1.10	390
0630-07	7	Latham - S Trench	Water	1.60	5.80	0.160	5.30	27.0	790
0630-08	8	Latham - S Source	Water	1.30	6.00	0.140	6.00	30.0	640
0630-09	9	Latham - Dam 2	Water	BDL	BDL	BDL	BDL	BDL	890

MCL = Maximum Contaminant Level (per COGCC and CDPHE)

0630-10	10	Latham - Creek Confluence	Water	BDL	BDL	BDL	BDL	BDL	370
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MCL = Maximum Contaminant Level (per COGCC and CDPHE)

07/02/2008				Mg/L (parts per million)					
Sample ID	Map I.D.	Sample Location		Benzene	Toluene	Ethyl-benzene	Xylenes	TPH	TDS
MCL			Water	0.005	1.00	0.7	10.0	NA	NA
0702-09	1	Latham - Upstream	Water	BDL	BDL	BDL	BDL	BDL	NA
0702-08	4	Latham - Troth	Water	BDL	BDL	BDL	BDL	BDL	NA
0702-10	6	Latham - Dam 1	Water	BDL	BDL	BDL	BDL	BDL	NA
0702-11	37	Latham - S2 Source	Water	BDL	BDL	BDL	0.015	0.200	NA

07/07/2008				Mg/L (parts per million)					
Sample ID	Map I.D.	Sample Location		Benzene	Toluene	Ethyl-benzene	Xylenes	GRO (Gas TVH)	TDS
MCL			Water	0.005	1.00	0.700	10.0	NA	NA
1	1	Latham - Upstream	Water	0.0029	BDL	0.0021	0.015	0.94	NA
2	2	Latham - N Trench	Water	1.00	5.80	0.320	6.8	<50	NA
3	3	Latham - N Source (in drainage)	Water	0.027	0.1	0.005	1.7	6	NA
4	4	Latham - Trough	Water	BDL	BDL	BDL	0.0015	BDL	NA
6	6	Latham - Dam 1	Water	0.0022	BDL	BDL	0.070	0.74	NA
7	7	Latham - S Trench	Water	1.30	4.00	BDL	3.00	<50	NA
8	8	Latham - S Source	Water	0.89	3.50	BDL	2.70	<25	NA
9	9	Latham - Dam 2	Water	0.0006	BDL	BDL	0.0028	BDL	1000
10	10	Latham - Creek Confluence	Water	BDL	BDL	BDL	BDL	BDL	370
11	11	Latham - S2 Trench	Water	0.11	0.18	BDL	0.21	1.2	NA
37	37	Latham - S2 Source	Water	0.21	0.49	0.089	1.10	5.1	NA

MCL = Maximum Contaminant Level (per COGCC and CDPHE)

Key Laboratories, Inc.

479 River Road Unit A

Grand Junction, CO 81505

(970)243-5311 FAX (970)243-6010

Client : Occidental Oil & Gas

Client Project Number : 697-09-61

KEY LAB #: 618081541
Date Received : 6/18/2008

Sampling Date : 6/19/2008

Method :
Technician : TE

Sample Matrix : Water
Sampler : Brett
Custody Seal : NONE
Preservatives : ICED

Date Analyzed : 6/20/2008 0:00

pH SAMPLE RESULTS

Client Sample Name	Lab Sample #	Instrument Result	Moisture	Factor	Final Results	Units
0618-06 Latham Downstream Spring 2	08-1541	7.59		1	7.59	s.u.

CONDUCTIVITY SAMPLE RESULTS

Client Sample Name	Lab Sample #	Instrument Result	Moisture	Factor	Final Results	Units
0618-06 Latham Downstream Spring 2	08-1541	212.5		1	212.5	mg/L

TOTAL DISSOLVED SOLIDS SAMPLE RESULTS

Client Sample Name	Lab Sample #	Instrument Result	Moisture	Factor	Final Results	Units
0618-06 Latham Downstream Spring 2	08-1541	0.0718		20000	1436	mg/L

QC Reviewer



Key Laboratories
2479 River Road, Unit A
Grand Junction, Colorado 81502
Phone (970) 243-5311 Fax (970) 243-6010

Client: Occidental Oil and Gas Corp
Client Project Name: Project #697-09-16

Client Sample Number: #5 **0618-06**

Key Lab #: 08-1541
Work Order #: 0618081541
Date Received: 06/18/08
Method: EPA ICP-MS Methods 6020 / 200.8
Technician: **6/23/08 JP**

Sampling Date: 6/18/2008
Sampling Time: 11:30
Sample Matrix: Water
Sampler: Brett

Date Analyzed: Thursday, June 19, 2008 00:12:31 day, June 19, 2008 00:31:28 Wednesday, June 18, 2008 21:21:37

Key Lab Sample ID#		WI-0808-08-1641-20		WI-0808-08-1641-20		WI-0808-08-0000-01_LMB							
Sample Comments:				LMB									
Sample Aliquot (mg):		40000		40000		40000							
Prep Spike Recovery:		0.982		1.870		0.989							
Prep/Digestion DF=>>		1.3		1.3		1.28							
Pass Audit =>> x Total DF=>>		0.35		312.50		0.26							
Analysis Method	Ion Mass	Time (min)	Symbol	Audit	Analyte	Total Metals	Total Metals	Units	Total DF	MDL ppm	PQL ppm	Max QL ppm	
ICP-MS	6	00	Be		Beryllium			mg/Liter	0.26	0.00025	0.001	0.3	
ICP-MS	11	00	B		Boron			mg/Liter	0.26	0.031	0.13	0.3	
ICP-MS	23	00	Na	x	Sodium		290	mg/Liter	<	0.26	0.063	0.25	03
ICP-MS	24	00	Mg	x	Magnesium		90	mg/Liter	<	0.26	0.031	0.13	03
ICP-MS	27	00	Al		Aluminum			mg/Liter	0.26	0.0063	0.025	0.3	
ICP-MS	28	00	Si		Silicon			mg/Liter	0.26	0.063	0.25	13	
ICP-MS	31	00	P		Phosphorous			mg/Liter	0.26	0.063	0.25	13	
ICP-MS	39	00	K		Potassium			mg/Liter	0.26	0.5	2	13	
ICP-MS	44	00	Ca	x	Calcium		190	mg/Liter	<	0.26	0.16	0.63	03
ICP-MS	48	00	Ti		Titanium			mg/Liter	0.26	0.010	0.075	1.3	
ICP-MS	51	00	V		Vanadium			mg/Liter	0.26	0.0013	0.006	1.3	
ICP-MS	52	00	Cr	x	Chromium	<		mg/Liter	<	0.26	0.0038	0.016	1.3
ICP-MS	55	00	Mn		Manganese			mg/Liter	0.26	0.00004	0.0038	2.6	
ICP-MS	56	00	Fe		Iron			mg/Liter	0.26	0.13	0.5	13	
ICP-MS	59	00	Co		Cobalt			mg/Liter	0.26	0.00025	0.001	1.3	
ICP-MS	59	00	Ni		Nickel			mg/Liter	0.26	0.0013	0.006	0.3	
ICP-MS	63	00	Cu		Copper			mg/Liter	0.26	0.0013	0.006	0.3	
ICP-MS	65	00	Zn		Zinc			mg/Liter	0.26	0.063	0.25	13	
ICP-MS	75	00	As	x	Arsenic	0.038		mg/Liter	<	0.26	0.0010	0.0075	13
ICP-MS	82	00	Se		Selenium			mg/Liter	0.26	0.0038	0.016	2.6	
ICP-MS	88	00	Sr		Strontium			mg/Liter	0.26	0.0013	0.006	13	
ICP-MS	96	00	Mo		Molybdenum			mg/Liter	0.26	0.0013	0.006	1.3	
ICP-MS	107	00	Ag		Silver			mg/Liter	0.26	0.0025	0.01	1.3	
ICP-MS	111	00	Cd		Cadmium			mg/Liter	0.26	0.00025	0.001	1.3	
ICP-MS	123	00	Sb		Antimony			mg/Liter	0.26	0.00025	0.001	1.3	
ICP-MS	137	00	Ba	x	Barium	0.49		mg/Liter	<	0.26	0.0013	0.006	2.6
ICP-MS	200	00	Hg		Mercury			mg/Liter	0.26	0.00003	0.0025	0.13	
ICP-MS	201	00	Tl		Thallium			mg/Liter	0.26	0.0010	0.0075	1.3	
ICP-MS	204	00	Pb		Lead			mg/Liter	0.26	0.0038	0.016	1.3	
ICP-MS	232	00	Th		Thorium			mg/Liter	0.26	0.00031	0.0013	1.3	
ICP-MS	238	00	U		Uranium			mg/Liter	0.26	0.00025	0.001	1.3	

Notes: LMB = laboratory method blank, M and MD = sample matrix replicates

Notes: LCS = split laboratory method blank, MS and MSD = split sample matrix replicates

Notes: As is split as sample prep surrogate, DF = Dilution Factor, MDL = Method Detection Limit,

Notes: PQL = Primary Quantitation Limit, MQL = Maximum Quantitation Limit,

Notes: < = less than MDL, E = Estimated Value over MDL, J = Greater than MDL but less than PQL (4 x MDL)

Notes: n.s. = Not Applicable, Blank Space = Not Requested or Not Reported

Notes: **Total RCRA limits are 20 times the TCLP extract limits because of sample size (100g) and extract volume (2000mL).

**EPA SW846 Method 1311, Revision 0, July 1992, Section 7: If a total analysis of the waste demonstrates that individual analytes are not present in the waste, or that they are present but at such low concentrations that they are not detectable, the appropriate regulatory levels could not possibly be exceeded, the TCLP need not be run."

Analyst / Reviewer

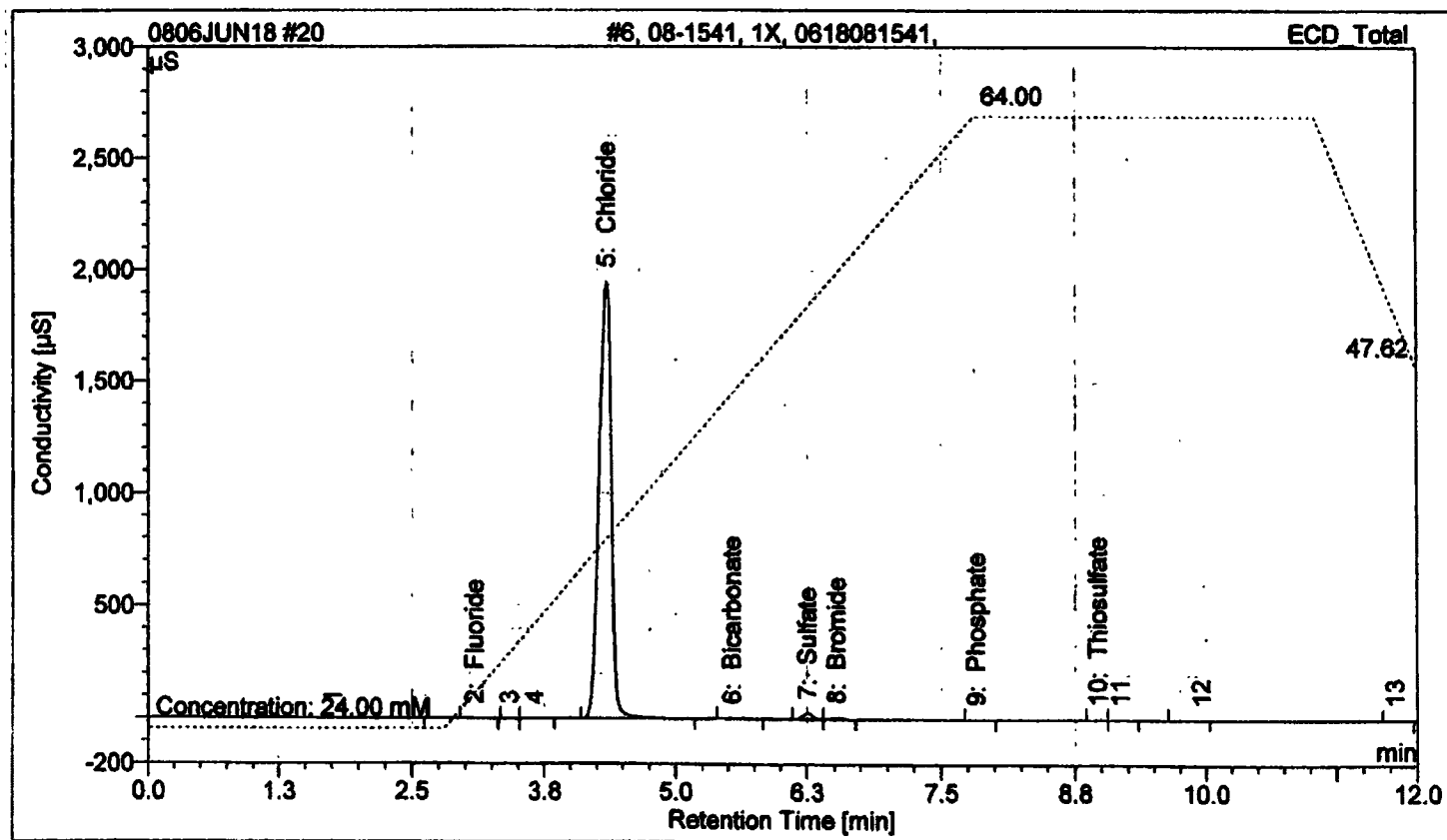
6/23/08 JP

0618-06

Key Laboratories Anion Report

Sample Name: #6, 08-1541, 1X, 0618081541, Sample No.: 20
 Sample ID: water, 1Xdil, OXY LQL = Lower Quantitation Limit
 Sample Comments: Lathan Downstream Spring 2 MQL = Maximum Quantitation Limit
 Sequence Directory: ICS2000\Sequences\0806jun E = Estimated, Value Exceeds MQL
 Sequence Name: 0806JUN18 Raw = Dilution Factor not applied
 Program Method: grad8AS18 Date: 6/20/08 Injection vol. [uL]: 25.0
 Quantitation Method: grad8AS18 Dilution Factor [DF]: 1.0000
 Date Time Collected: 6/18/2008 7:03 PM Reviewer: *VP* Sample Wt.: 1.0000
 System Operator: KEY LABORATORIES Sample Amt.: 1.0000

No.	Component	Retention	Area	Height	Raw LQL	Raw Amt	Pass QC	Amount	DF x LQL	DF x MQL
ECD_Total	ECD_Total	ECD_Total	ECD_Total	ECD_Total	ECD_Total	ECD_Total		ECD_Total	ECD_Total	ECD_Total
	Name	Time	uS*min	uS	ppm	ppm	X = Pass	ppm	ppm	ppm
2	Fluoride	3.09	0.062	0.602	0.0018	0.1303	X	0.1303	0.0018	20.
5	Chloride	4.35	262.209	1945.714	0.0524	705.1315	>>>	705.1315	0.0524	80.
7	Sulfate	6.25	2.846	26.513	0.1780	11.7959	X	11.7959	0.1780	80.

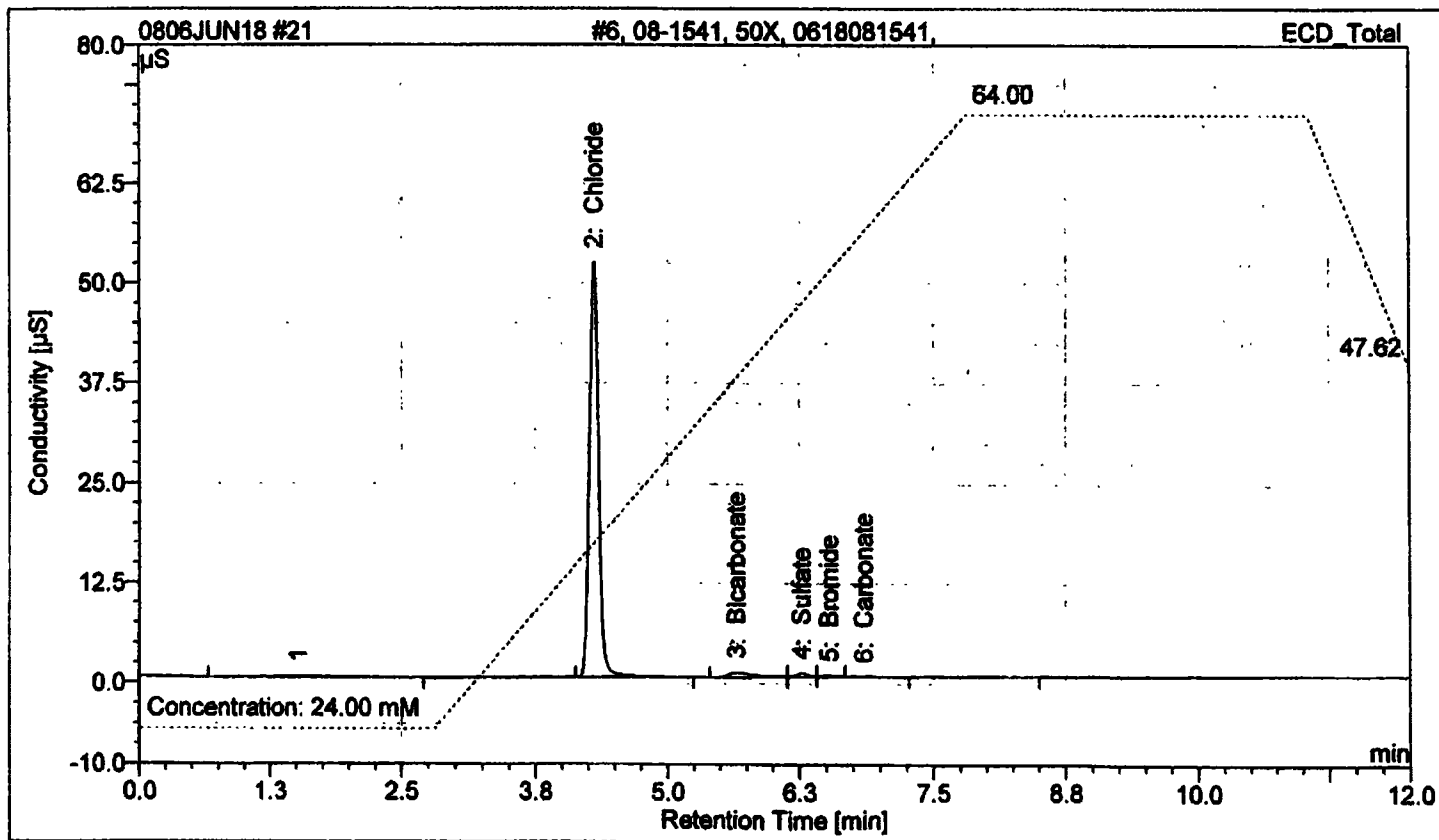


0618-06

Key Laboratories Anion Report

Sample Name:	#6, 08-1541, 50X, 0618081541,	Sample No.:	21
Sample ID:	water, 50Xdil, OXY	LQL = Lower Quantitation Limit	
Sample Comments:	Lathan Downstream Spring 2	MQL = Maximum Quantitation Limit	
Sequence Directory:	ICS2000\Sequences\0806jun	E = Estimated, Value Exceeds MQL	
Sequence Name:	0806JUN18	Raw = Dilution Factor not applied	
Program Method:	grad8AS18	Date:	6/20/08
Quantitation Method:	grad8AS18	Injection vol. [uL]:	25.0
Date Time Collected:	6/18/2008 7:18 PM	Dilution Factor [DF]:	50.0000
System Operator:	KEY LABORATORIES	Sample Wt.:	1.0000
		Sample Amt.:	1.0000

No.	Component	Retention	Area	Height	Raw LQL	Raw Amt	Pass QC	Amount	DF x LQL	DF x MQL
ECD_Total	ECD_Total	ECD_Total	ECD_Total	ECD_Total	ECD_Total	ECD_Total		ECD_Total	ECD_Total	ECD_Total
Name	Time	uS*min	uS	ppm	ppm	X = Pass	ppm	ppm	ppm	ppm
n.a.	Fluoride	n.a.	n.a.	n.a.	0.0018	n.a.		n.a.	0.0905	1000.
2	Chloride	4.31	5.294	51.901	0.0524	16.9645	X	848.2229	2.6200	4000.
4	Sulfate	6.27	0.071	0.535	0.1780	0.3184		15.9204	8.9000	4000.



Data Path : C:\MSDCHEM\1\DATA\0806jun18\
 Data File : 0400004.D
 Acq On : 18 Jun 2008 4:45 pm
 Operator : KEV
 Sample : 86, 08-1541, M, 0618081541,
 Misc : water, 1Xdil, OXY, Lathan-Downstream
 ALS Vial : 4 Sample Multiplier: 1

06/18/08

Quant Time: Jun 20 22:40:08 2008
 Quant Method : C:\MSDCHEM\1\5973N\4VRX8260.M
 Quant Title : 5973_8260 - Method 524.2 List - Purgable Volatile Wed Jun 11 16:56
 12 2008
 QLast Update : Wed Jun 11 16:56:12 2008
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) fluorobenzene	4.26	96	7516646	69.90	ug	0.00
40) chlorobenzene-d5	9.33	54	4099313+	69.90	ug	0.00
64) 1,4-dichlorobenzene-d4	13.71	154	3057323+	69.90	ug	0.00

System Monitoring Compounds	R.T.	QIon	Response	Conc	Units	Dev(Min)
22) dibromofluoromethane	2.91	113	4334433+	65.53	ug	0.00
Spiked Amount 69.900	Range 65 - 135		Recovery =	93.75%		
25) 1,2 dichloroethane-d4	3.35	104	1941698+	71.13	ug	0.00
Spiked Amount 69.900	Range 65 - 135		Recovery =	101.76%		
36) toluene-d8	6.90	100	4334661	65.39	ug	0.00
Spiked Amount 69.900	Range 65 - 135		Recovery =	93.55%		
55) 4-bromofluorobenzene	11.75	174	4491922+	69.43	ug	0.00
Spiked Amount 69.900	Range 65 - 135		Recovery =	99.33%		

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
2) dichlorodifluoromethane	0.96	85	1788	0.04	ug	# 53
3) chloromethane	1.03	50	7273	0.20	ug	# 67
4) vinyl chloride	0.00	62	0	N.D.		
5) acetone	1.49	58	19778+	0.98	ug	# 13
6) diethyl ether	0.00	74	0+	N.D.		
7) bromomethane	1.20	94	2430	0.10	ug	# 39
8) chloroethane	0.00	64	0	N.D.		
9) trichlorofluoromethane	0.00	101	0	N.D.		
10) 1,1-dichloroethene	0.00	96	0	N.D.		
11) methylene chloride	1.72	84	2546	0.08	ug	# 80
12) 1,1,2-trichlorotrifluoroet	0.00	151	0+	N.D.		
13) allyl chloride	0.00	78	0+	N.D.		
14) trans 1,2-dichloroethene	0.00	96	0	N.D.		
15) [MTBE] tert-butylmethyl et	0.00	73	0	N.D.		
16) 1,1-dichloroethane	0.00	63	0	N.D.		
17) [MEK] 2-butanone	0.00	72	0+	N.D.		
18) cis 1,2-dichloroethene	0.00	96	0	N.D.		
19) 2,2-dichloropropane	0.00	77	0+	N.D.		
20) bromochloromethane	0.00	128	0+	N.D.		
21) chloroform (trichlorometha	0.00	83	0	N.D.		
23) tetrahydrofuran	0.00	71	0+	N.D.		
24) 1,1,1-trichloroethane	0.00	97	0+	N.D.		
26) 1,2 dichloroethane	3.35	62	2691	0.06	ug	# 1
27) 1,1-dichloropropene	0.00	75	0	N.D.		
28) benzene	3.97	78	80718701	686.32	ug	99
29) carbon tetrachloride	0.00	117	0+	N.D.		
30) trichloroethene	0.00	130	0+	N.D.		
31) 1,2-dichloropropane	0.00	63	0	N.D.		
32) dibromomethane	0.00	174	0	N.D.		
33) bromodichloromethane	0.00	83	0	N.D.		
34) cis 1,3-dichloropropene	0.00	75	0	N.D.		
35) [MIBK] 4-methyl-2-pentanone	0.00	58	0+	N.D.		
37) toluene	7.01	92	22156021	293.82	ug	99
38) trans 1,3-dichloropropene	0.00	75	0	N.D.		
39) 1,1,2-trichloroethane	0.00	83	0	N.D.		
41) 1,3-dichloropropane	7.02	76	182649	4.47	ug	# 1
42) dibromochloromethane	0.00	129	0	N.D.		
43) tetrachloroethene	0.00	166	0+	N.D.		

Data Path : C:\MSDCHEM\1\DATA\5200\Jun118\
 Data File : 0400004.D
 Acq On : 18 Jun 2006 4:45 pm
 Operator : KEY
 Sample : #6, 08-1541, M. 0618061541,
 Misc : water, 1Xdil, OXY, Larhan-Downstream
 ALS Vial : 4 Sample Multiplier: 1

Quant Time: Jun 20 22:40:08 2008
 Quant Method : C:\MSDCHEM\1\5973N\4VRX8260.M
 Quant Title : 5973_8260 - Method 524.2 List - Purgable Volatile Wed Jun 11 16:56
 12 2008
 QLast Update : Wed Jun 11 16:56:12 2008
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
44) 1,2-dibromoethane	0.00	107	0	N.D.		
45) chlorobenzene	0.00	112	0	N.D.		
46) 1,1,1,2-tetrachloroethane	0.00	131	0+	N.D.		
47) ethylbenzene	9.90	91	807362+	4.53	ug	99
48) m/p xylene	10.32	91	50400572	469.65	ug	99
49) styrene	10.94	104	1947	0.02	ug	# 34
50) o-xylene	11.03	91	11389845	103.88	ug	98
51) bromoform	0.00	173	0	N.D.		
52) 1,1,2,2-tetrachloroethane	0.00	83	0+	N.D.		
53) isopropylbenzene	11.80	105	59616	0.45	ug	# 54
54) 1,2,3-trichloropropane	0.00	75	0	N.D.		
56) bromobenzene	0.00	156	0	N.D.		
57) 2-chlorotoluene	0.00	126	0	N.D.		
58) n-propylbenzene	12.65	120	1169	0.03	ug	# 1
59) 4-chlorotoluene	0.00	126	0	N.D.		
60) 1,3,5-trimethylbenzene	13.16	105	2431648	22.62	ug	99
61) tert-butylbenzene	13.43	119	5258	0.06	ug	# 32
62) 1,2,4-trimethylbenzene	13.60	105	1699981	15.88	ug	99
63) 1,2-dibromo-3-chloropropan	0.00	157	0	N.D.		
65) 1,3-dichlorobenzene	0.00	146	0	N.D.		
66) p-isopropyltoluene	13.93	119	37761	0.34	ug	# 60
67) sec-butylbenzene	13.68	105	19363	0.14	ug	# 1
68) 1,4-dichlorobenzene	0.00	146	0	N.D.		
69) 1,2-dichlorobenzene	0.00	146	0	N.D.		
70) n-butylbenzene	14.32	91	11768	0.11	ug	# 25
71) 1,2,4-trichlorobenzene	0.00	180	0+	N.D.		
72) hexachlorobutadiene	0.00	225	0+	N.D.		
73) naphthylene	15.56	128	78122	0.96	ug	# 95
74) 1,2,3-trichlorobenzene	0.00	180	0+	N.D.		

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Key Laboratory Inc.

1478 River Road Unit A

Grand Junction, CO 81505

(970)245-5311 FAX (970)245-6016

Client : Occidental Oil & Gas

Client Project Number : 61908

KEY LAB #: 620081644

Sampling Date : 6/19/2008

Date Received : 6/20/2008

Sample Matrix : Water

Method :

Sampler : Brett

Technician : TE

Custody Seal : NONE

Preservatives : ICED

Date Analyzed : 6/20/2008 0:00

pH SAMPLE RESULTS

Client Sample Name	Lab Sample #	Instrument Result	Moisture	Factor	Final Results	Units
0619-01	08-1644	8.32		1	8.32	s.u.
0619-02	08-1645	7.26		1	7.26	s.u.
0619-03	08-1646	7.52		1	7.52	s.u.

pH SAMPLE RESULTS

Client Sample Name	Lab Sample #	Instrument Result	Moisture	Factor	Final Results	Units
0619-01	08-1644	380		1	380	mg/L
0619-02	08-1645	282.5		1	282.5	mg/L
0619-03	08-1646	330		1	330	mg/L

TOTAL DISSOLVED SOLIDS SAMPLE RESULTS

Client Sample Name	Lab Sample #	Instrument Result	Moisture	Factor	Final Results	Units
0619-01	08-1644	0.0319		20000	638	mg/L
0619-02	08-1645	0.0281		20000	562	mg/L
0619-03	08-1646	0.0531		20000	1062	mg/L

QC Reviewer



Data Path : C:\MSDCHEM\1\DATA\060610072\A
 Data File : 1300013.D
 Acq On : 23 Jun 2008 2:56 am
 Operator : KEY
 Sample : 0619-02, 08-1645, 0620081644,
 Misc : Water, 100xdil, Oxy, Source 2-Upstream
 ALS Vial : 13 Sample Multiplier: 1

Quant Time: Jun 23 08:26:42 2008
 Quant Method : C:\MSDCHEM\1\5973N\4VRXBTEX.M
 Quant Title : VRXUTUST 8260/BTEX
 QLast Update : Thu Jun 19 12:42:28 2008
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) fluorbenzene	4.26	96	7565741	69.90	ug	0.00
9) Chlorbenzene-d5	9.34	54	4140500+	69.90	ug	0.00
16) 1,4-Dichlorobenzene-d4	13.71	154	2803970+	69.90	ug	0.00

System Monitoring Compounds

4) Dibromofluoromethane	2.92	113	4455448+	66.88	ug	0.00
Spiked Amount 69.900	Range 86	- 118	Recovery	=	95.68%	
5) 1,2-Dichloroethane-d4	3.35	67	1324813	73.45	ug	0.00
Spiked Amount 69.900	Range 80	- 120	Recovery	=	105.08%	
7) Toluene-d8	6.91	98	7004686	68.21	ug	0.00
Spiked Amount 69.900	Range 88	- 110	Recovery	=	97.58%	
13) 4-Bromofluorobenzene	11.75	174	4354657+	62.25	ug	0.00
Spiked Amount 69.900	Range 86	- 115	Recovery	=	89.06%	

Target Compounds

						Qvalue
2) Gasoline [TVH]	1.90	TIC	19472576m	156.30	ug	
3) MTBE	0.00	73	0	N.D.		
6) Benzene	3.97	78	1346656	11.37	ug	98
8) Toluene	7.02	92	7311608	96.27	ug	99
10) Ethylbenzene	9.90	91	239270	1.61	ug	# 94
11) M/P Xylene	10.32	91	9485003	82.13	ug	100
12) O-Xylene	11.04	91	1562247	13.21	ug	99
14) 1,3,5-Trimethylbenzene	13.17	105	527514	4.54	ug	99
15) 1,2,4-Trimethylbenzene	13.60	105	596096	5.13	ug	98
17) Napthylene	15.56	128	30171	0.41	ug	# 69

(#) = qualifier out of range (m) = manual integration (+) = signals summed

MOE LABORATORY REPORT

1470 River Road Unit A

Greenville, SC 29605

(703)333-5511 FAX (703)333-6010

Client: Occidental Oil and Gas Corp

Client Project Name: Project #061902

Lab QC Batch Sample: 08-1646, 0619-03

Key Lab #: 08-1645

Work Order #: 0620081644

Date Received: 06/20/08

Method: EPA SW846 5030/5035/8260

Technician: KEY

Data File Name: 1300013.D

Date Analyzed: 23 Jun 2008 2:56 am

Data File Path: C:\MSDCHEM\DATA\0806JUN22\

Lab Sample Information: Water, 100xdl, Oxy, Source 2-Upstream

Lab Sample Number: 0619-02, 08-1645, 0620081644

Client Sample Number: 0619-02

Sampling Date: 6/19/2008

Sampling Time: 17:00

Sample Matrix: Water

Sampler: Breti

		Reported====>		x		DF =		100					
CAS#	Type	Target Compound	AndK	Rep.	Amt.	MDL	Units	DF	Rinal Conc	RDL	Qual	MOE	
75-71-8	M1	dichlorodifluoromethane	x	1772	0.04	2	ug	100.	<	200.		48000	
74-87-3	MP1	chloromethane	x	0	0.00	2	ug	100.	<	200.		48000	
75-01-4	MCI	vinyl chloride	x	0	0.00	2	ug	100.	<	200.		48000	
67-64-1	M1	acetone	x	81364	4.00	4	ug	100.	<	400.		48000	
60-29-7	M1	diethyl ether	x	0	0.00	2	ug	100.	<	200.		48000	
74-83-9	M1	bromomethane	x	1059	0.04	2	ug	100.	<	200.		48000	
75-00-3	M1	chloroethane	x	0	0.00	2	ug	100.	<	200.		48000	
75-69-4	M1	trichlorofluoromethane	x	0	0.00	1	ug	100.	<	100.		48000	
75-35-4	MCI	1,1-dichloroethene	x	0	0.00	1	ug	100.	<	100.		48000	
75-09-2	M1	methylene chloride	x	5258	0.17	1	ug	100.	<	100.		48000	
76-13-1	M1	1,1,2-trichlorotrifluoroethane	x	0	0.00	1	ug	100.	<	100.		48000	
107-05-1	M1	allyl chloride	x	0	0.00	1	ug	100.	<	100.		48000	
156-60-5	M1	trans 1,2-dichloroethene	x	0	0.00	1	ug	100.	<	100.		48000	
1634-04-4	M1	[MTBE] tert-butylmethyl ether	x	0	0.00	1	ug	100.	<	100.		48000	
75-34-3	MP1	1,1-dichloroethane	x	0	0.00	1	ug	100.	<	100.		48000	
78-93-3	M1	[MEK] 2-butanone	x	0	0.00	4	ug	100.	<	400.		48000	
156-59-4	M1	cis 1,2-dichloroethene	x	0	0.00	1	ug	100.	<	100.		48000	
590-20-7	M1	2,2-dichloropropane	x	0	0.00	1	ug	100.	<	100.		48000	
74-97-5	M1	bromochloromethane	x	0	0.00	1	ug	100.	<	100.		48000	
67-66-3	MCI	chloroform (trichloromethane)	x	75937	1.19	1	ug	100.	120 ug/L	100.	J	48000	
109-99-9	M1	tetrahydrofuran	x	19113	1.24	4	ug	100.	<	400.		48000	
71-55-6	M1	1,1,1-trichloroethane	x	0	0.00	1	ug	100.	<	100.		48000	
107-06-2	M1	1,2-dichloroethane	x	0	0.00	1	ug	100.	<	100.		48000	
563-58-6	M1	1,1-dichloropropene	x	0	0.00	1	ug	100.	<	100.		48000	
71-43-2	M1	benzene	x	1346667	11.36	1	ug	100.	1100 ug/L	100.		48000	
56-26-5	M1	carbon tetrachloride	x	0	0.00	1	ug	100.	<	100.		48000	
79-01-6	M1	trichloroethene	x	0	0.00	1	ug	100.	<	100.		48000	
78-87-5	MCI	1,2-dichloropropane	x	0	0.00	1	ug	100.	<	100.		48000	
74-95-3	M1	dibromomethane	x	0	0.00	1	ug	100.	<	100.		48000	
75-27-4	M1	bromodichloromethane	x	0	0.00	1	ug	100.	<	100.		48000	
10061-01-5	M1	cis 1,3-dichloropropene	x	0	0.00	1	ug	100.	<	100.		48000	
108-10-1	M1	[MIBK] 4-methyl-2-pentanone	x	0	0.00	1	ug	100.	<	100.		48000	
108-88-3	MCI	toluene	x	7308913	96.16	2	ug	100.	9600 ug/L	200.		48000	
10061-02-6	M1	trans 1,3-dichloropropene	x	0	0.00	1	ug	100.	<	100.		48000	
79-00-5	M1	1,1,2-trichloroethane	x	0	0.00	1	ug	100.	<	100.		48000	
142-28-9	M2	1,3-dichloropropane	x	60303	1.46	1	ug	100.	150 ug/L	100.	J	48000	
124-48-1	M2	dibromochloromethane	x	0	0.00	1	ug	100.	<	100.		48000	
127-18-4	M2	tetrachloroethene	x	0	0.00	1	ug	100.	<	100.		48000	
106-93-4	M2	1,2-dibromoethane	x	0	0.00	1	ug	100.	<	100.		48000	
108-90-7	MP2	chlorobenzene	x	0	0.00	1	ug	100.	<	100.		48000	
630-20-6	M2	1,1,1,2-tetrachloroethane	x	0	0.00	1	ug	100.	<	100.		48000	
100-41-4	MC2	ethylbenzene	x	321015	1.78	1	ug	100.	180 ug/L	100.	J	48000	
	M2	m/p xylene	x	9484449	87.31	1	ug	100.	8700 ug/L	100.		96000	
100-42-5	M2	styrene	x	30237	0.38	1	ug	100.	<	100.		48000	
95-47-6	M2	o-xylene	x	1566359	14.11	1	ug	100.	1400 ug/L	100.		48000	
75-25-2	MP2	bromoform	x	0	0.00	1	ug	100.	<	100.		48000	
79-34-5	MP2	1,1,2,2-tetrachloroethane	x	0	0.00	1	ug	100.	<	100.		48000	
98-82-8	M2	isopropylbenzene	x	23116	0.17	1	ug	100.	<	100.		48000	
96-18-4	M2	1,2,3-trichloropropane	x	0	0.00	1	ug	100.	<	100.		48000	
108-86-1	M2	bromobenzene	x	0	0.00	1	ug	100.	<	100.		48000	
95-49-8	M2	2-chlorotoluene	x	0	0.00	1	ug	100.	<	100.		48000	
103-65-1	M2	n-propylbenzene	x	2373	0.07	1	ug	100.	<	100.		48000	

KEY LABORATORIES, INC.

2479 River Road Unit A
Grand Junction, CO 81505
(970)243-5311 FAX (970)243-6010

8260 Analytical Report

Client : Occidental Oil and Gas Corp
Client Project Name : Project #061908

Lab QC Batch Sample : 08-1646, 0619-03

Client Sample Number : 0619-02

Key Lab # : 08-1645

Work Order # : 0620081644

Date Received : 06/20/08

Method : EPA SW846 5030/5035/8260

Technician : KEY

Data File Name : 1300013.D

Date Analyzed : 23 Jun 2008 2:56 am

Data File Path : C:\MSDCHEM\1\DATA\ 0806JUN22\

Lab Sample Information : Water, 100x dil, Oxy, Source 2-Upstream

Lab Sample Number : 0619-02, 08-1645, 0620081644,

Sampling Date : 6/19/2008

Sampling Time : 17:00

Sample Matrix : Water

Sampler : Brett

Reported====> x		DF =		100	
Lab Sample	Target Compound	MDL	Result	MDL	Result
106-43-4 M2	4-chlorotoluene	x	0	1 ug	100.
108-67-8 M2	1,3,5-trimethylbenzene	x	527673	1 ug	100.
98-06-6 M2	tert-butylbenzene	x	0	1 ug	100.
95-63-6 M2	1,2,4-trimethylbenzene	x	579923	1 ug	100.
96-12-8 M2	1,2-dibromo-3-chloropropane	x	0	1 ug	100.
541-73-1 M3	1,3-dichlorobenzene	x	0	1 ug	100.
99-87-6 M3	p-isopropyltoluene	x	12760	1 ug	100.
135-98-8 M3	sec-butylbenzene	x	6929	1 ug	100.
106-46-7 M3	1,4-dichlorobenzene	x	2634	1 ug	100.
95-50-1 M3	1,2-dichlorobenzene	x	0	1 ug	100.
104-51-8 M3	n-butylbenzene	x	5790	1 ug	100.
87-61-6 M3	1,2,4-trichlorobenzene	x	0	2 ug	100.
87-68-3 M3	hexachlorobutadiene	x	0	2 ug	100.
91-20-3 M3	naphylene	x	31895	2 ug	100.
120-82-1 M3	1,2,3-trichlorobenzene	x	0	2 ug	100.

Lab Sample	Target Compound	MDL	Result	MDL	Result
1868-53-7 S1	dibromofluoromethane	4450574	66.75	85 ug	5211326
17060-07-0 M1	1,2 dichloroethane-d4	1989817	72.32	93 ug	2150224
2037-26-5 S1	toluene-d8	4526053	67.74	86 ug	5285330
460-00-4 S2	4-bromofluorobenzene	4392961	67.08	79 ug	5531588

Lab Sample	Target Compound	MDL	Result	MDL	Result
462-06-6 I1	fluorbenzene	7576647	69.90	89 ug	8484018
3114-55-4 I2	chlorobenzene-d5	4149290	69.90	82 ug	5060990
3835-82-1 I3	1,4-dichlorobenzene-d4	2801776	69.90	72 ug	3894374

MDL = Method Detection Limit

PQL = Practical Quantitation Limit = 4 x MDL

RDL = Reporting Detection Limit = MDL x Dilution Factor

MDL = Maximum Quantization Limit = 110% x DF x Highest Calibration Standard

Reporting basis is Kg for solids and L for liquids

J qualifier = MDL < Result < PQL

E qualifier = Estimated Result > Highest Calibration Standard

Analyst

Approved

Data Path : C:\MSDCHEM\1\5973N\4VRX8260.M
 Lock File : 1500012.D
 Acq On : 23 Jun 2008 2:56 am
 Operator : BEY
 Sample : 0819-02, 08-1645, 0620081644
 Misc : Water, 100xdl1, Oxy, Source 2-Downstream
 ALS Vial : 13 Sample Multiplier: 1

Quant Time: Jun 23 03:14:53 2008
 Quant Method : C:\MSDCHEM\1\5973N\4VRX8260.M
 Quant Title : 5973_8260 - Method 524.2 List - Purgable Volatile Wed Jun 11 16:56
 12 2008
 QLast Update : Wed Jun 11 16:56:12 2008
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) fluorobenzene	4.26	96	7576647	69.90	ug	0.00
40) chlorobenzene-d5	9.34	54	4149290+	69.90	ug	0.00
64) 1,4-dichlorobenzene-d4	13.71	154	2801776+	69.90	ug	0.00

System Monitoring Compounds						
22) dibromofluoromethane	2.91	113	4450574+	66.75	ug	0.00
Spiked Amount	69.900	Range	65 - 135	Recovery	=	95.49%
25) 1,2 dichloroethane-d4	3.35	104	1989817+	72.32	ug	0.00
Spiked Amount	69.900	Range	65 - 135	Recovery	=	103.46%
36) toluene-d8	6.91	100	4526053	67.74	ug	0.00
Spiked Amount	69.900	Range	65 - 135	Recovery	=	96.91%
55) 4-bromofluorobenzene	11.75	174	4392961+	67.08	ug	0.00
Spiked Amount	69.900	Range	65 - 135	Recovery	=	95.97%

Target Compounds						Qvalue
2) dichlorodifluoromethane	0.96	85	1772	0.04	ug	# 53
3) chloromethane	0.00	50	0	N.D.		
4) vinyl chloride	0.00	62	0	N.D.		
5) acetone	1.51	58	81364+	4.00	ug	78
6) diethyl ether	0.00	74	0+	N.D.		
7) bromomethane	1.22	94	1059	0.04	ug	# 1
8) chloroethane	0.00	64	0	N.D.		
9) trichlorofluoromethane	0.00	101	0	N.D.		
10) 1,1-dichloroethene	0.00	96	0	N.D.		
11) methylene chloride	1.72	84	5258	0.17	ug	# 50
12) 1,1,2-trichlorotrifluoroet	0.00	151	0+	N.D.		
13) allyl chloride	0.00	78	0+	N.D.		
14) trans 1,2-dichloroethene	0.00	96	0	N.D.		
15) [MTBE] tert-butylmethyl et	0.00	73	0	N.D.		
16) 1,1-dichloroethane	0.00	63	0	N.D.		
17) [MEK] 2-butanone	0.00	72	0+	N.D.		
18) cis 1,2-dichloroethene	0.00	96	0	N.D.		
19) 2,2-dichloropropane	0.00	77	0+	N.D.		
20) bromochloromethane	0.00	128	0+	N.D.		
21) chloroform (trichlorometha	2.81	83	75937	1.19	ug	93
23) tetrahydrofuran	3.11	71	19113+	1.24	ug	88
24) 1,1,1-trichloroethane	0.00	97	0+	N.D.		
26) 1,2 dichloroethane	0.00	62	0	N.D.		
27) 1,1-dichloropropene	0.00	75	0	N.D.		
28) benzene	3.97	78	1346667	11.36	ug	98
29) carbon tetrachloride	0.00	117	0+	N.D.		
30) trichloroethene	0.00	130	0+	N.D.		
31) 1,2-dichloropropane	0.00	63	0	N.D.		
32) dibromomethane	0.00	174	0	N.D.		
33) bromodichloromethane	0.00	83	0	N.D.		
34) cis 1,3-dichloropropene	0.00	75	0	N.D.		
35) [MIBK] 4-methyl-2-pentanone	0.00	58	0+	N.D.		
37) toluene	7.02	92	7308913	96.16	ug	100
38) trans 1,3-dichloropropene	0.00	75	0	N.D.		
39) 1,1,2-trichloroethane	0.00	83	0	N.D.		
41) 1,3-dichloropropane	7.01	76	60303	1.46	ug	# 1
42) dibromochloromethane	0.00	129	0	N.D.		
43) tetrachloroethene	0.00	166	0+	N.D.		

Data Path : C:\MSDCHEM\1\5973N\4VRX8260.M
 Data File : 1500013.D
 Acq On : 23 Jun 2008 2:56 AM
 Operator : KEF
 Sample : 0519-02, 00-1645, 082008164a,
 Misc : Water, 100xdl1, Oxy, Source 2-Upstream
 ALS Vial : 13 Sample Multiplier: 1

Quant Time: Jun 23 03:14:53 2008
 Quant Method : C:\MSDCHEM\1\5973N\4VRX8260.M
 Quant Title : 5973_8260 - Method 524.2 List - Purgable Volatile Wed Jun 11 16:56
 12 2008
 Qlast Update : Wed Jun 11 16:56:12 2008
 Response via : Initial Calibration

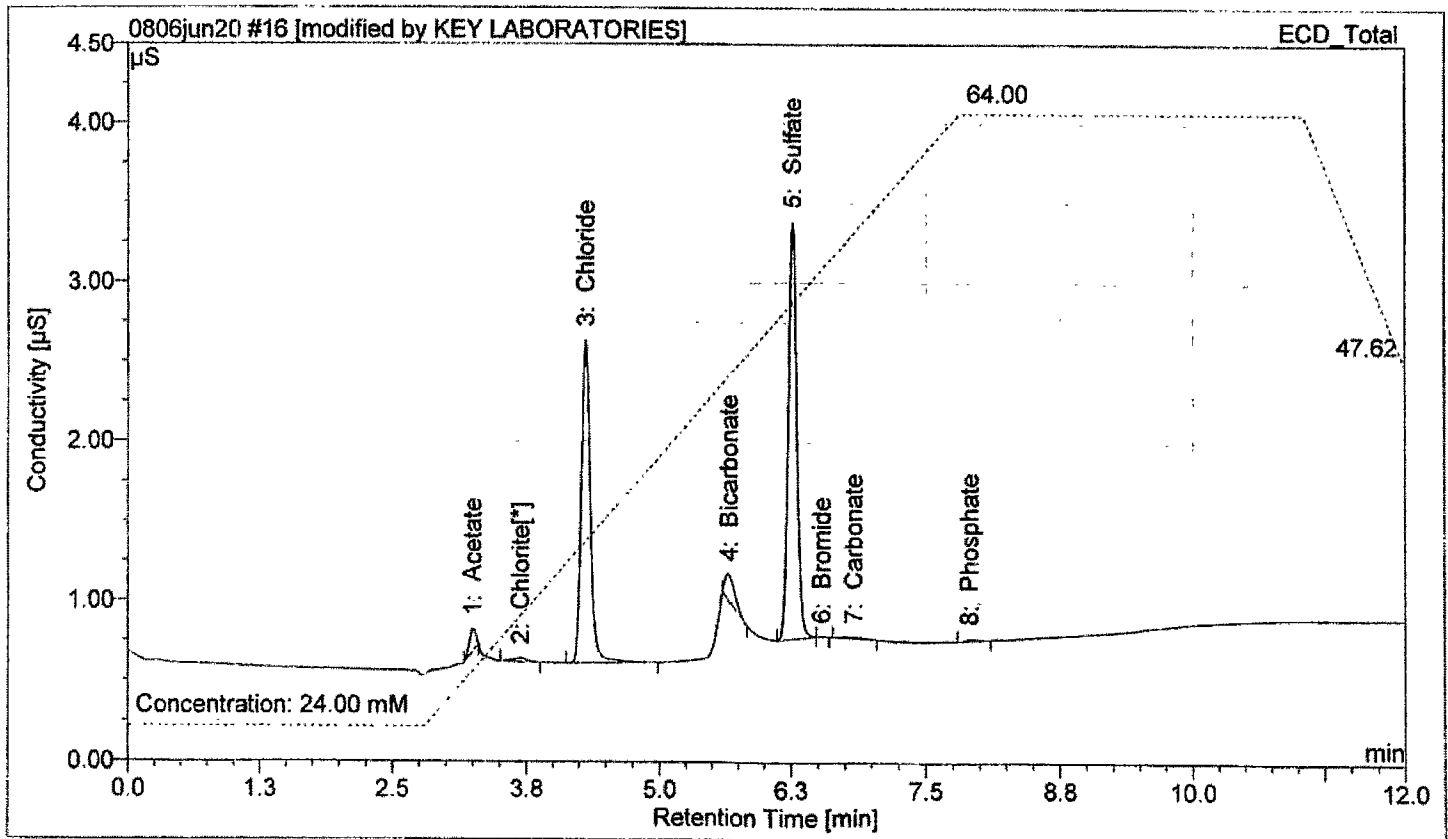
Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
44) 1,2-dibromoethane	0.00	107	0	N.D.		
45) chlorobenzene	0.00	112	0	N.D.		
46) 1,1,1,2-tetrachloroethane	0.00	131	0+	N.D.		
47) ethylbenzene	9.90	91	321015+	1.78	ug	97
48) m/p xylene	10.32	91	9484449	87.31	ug	100
49) styrene	11.03	104	30237	0.38	ug	# 1
50) o-xylene	11.04	91	1566359	14.11	ug	99
51) bromoform	0.00	173	0	N.D.		
52) 1,1,2,2-tetrachloroethane	0.00	83	0+	N.D.		
53) isopropylbenzene	11.81	105	23116	0.17	ug	# 1
54) 1,2,3-trichloropropane	0.00	75	0	N.D.		
56) bromobenzene	0.00	156	0	N.D.		
57) 2-chlorotoluene	0.00	126	0	N.D.		
58) n-propylbenzene	12.64	120	2373	0.07	ug	# 51
59) 4-chlorotoluene	0.00	126	0	N.D.		
60) 1,3,5-trimethylbenzene	13.17	105	527673	4.85	ug	99
61) tert-butylbenzene	0.00	119	0	N.D.		
62) 1,2,4-trimethylbenzene	13.60	105	579923	5.35	ug	100
63) 1,2-dibromo-3-chloropropan	0.00	157	0	N.D.		
65) 1,3-dichlorobenzene	0.00	146	0	N.D.		
66) p-isopropyltoluene	13.93	119	12760	0.13	ug	# 79
67) sec-butylbenzene	13.69	105	6929	0.05	ug	# 1
68) 1,4-dichlorobenzene	13.73	146	2634	0.05	ug	# 72
69) 1,2-dichlorobenzene	0.00	146	0	N.D.		
70) n-butylbenzene	14.31	91	5790	0.06	ug	# 12
71) 1,2,4-trichlorobenzene	0.00	180	0+	N.D.		
72) hexachlorobutadiene	0.00	225	0+	N.D.		
73) naphthylene	15.56	128	31895	0.43	ug	# 95
74) 1,2,3-trichlorobenzene	0.00	180	0+	N.D.		

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Key Laboratories Anion Report

Sample Name:	0619-02_08-1645, 50X, 0620081644.		Sample No.:	16
Sample ID:	water, 50Xdil, OXY,		LQL = Lower Quantitation Limit	
Sample Comments:	Project 061908		MQL = Maximum Quantitation Limit	
Sequence Directory:	ICS2000\Sequences\0806jun		E = Estimated, Value Exceeds MQL	
Sequence Name:	0806jun20		Raw = Dilution Factor not applied	
Program Method:	grad8AS18	Date: 6/23/08	Injection vol. [uL]:	25.0
Quantitation Method:	grad8AS18	Reviewer: <i>JS</i>	Dilution Factor [DF]:	50.0000
Date Time Collected:	6/20/2008 9:52 PM		Sample Wt.:	1.0000
System Operator:	KEY LABORATORIES		Sample Amt.:	1.0000

No.	Component	Retention	Area	Height	Raw LQL	Raw Amt	Pass QC	Amount	DF x LQL	DF x MQL
ECD_Total	ECD_Total	ECD_Total	ECD_Total	ECD_Total	ECD_Total	ECD_Total		ECD_Total	ECD_Total	ECD_Total
Name	Name	Time	uS*min	uS	ppm	ppm	X = Pass	ppm	ppm	ppm
n.a.	Fluoride	n.a.	n.a.	n.a.	0.0018	n.a.	X	n.a.	0.0905	1000.
3	Chloride	4.31	0.198	2.018	0.0524	0.6383	X	31.9128	2.6200	4000.
5	Sulfate	6.26	0.246	2.612	0.1780	1.0995	X	54.9757	8.9000	4000.



Page 1 of 60, 2008

1470 Lakes Road, Unit A

Grand Junction, Colorado 81501

Phone (970) 243-3311 Fax (970) 243-6010

Client: Occidental Oil and Gas Corp

Client Project Name: Project #0041605

Client Sample Number: 0619-02

Key Lab # 08-1645
 Work Order # 0620081644
 Date Received 06/20/08
 Method EPA ICP-MS Methods 6020 / 200.8
 Technician 6/23/08 Y

Sampling Date 6/19/2008
 Sampling Time 17:00
 Sample Matrix Water
 Sampler Brett

Date Analyzed Friday, June 20, 2008 20:48:20 iday, June 20, 2008 20:55:52 Friday, June 20, 2008 20:08:19

Key Lab Sample ID# WI-0606-08-1645-22 WI-0609-08-1645-22 WI-0606-08-0000-01_LMB

Sample Comments: LMB
 Sample Aliquot (mg): 40000 40000 40000
 Prep Spike Recovery: 1.078 1.211 1.027
 Prep/Digestion DF====> 1.3 1.3 1.26
 Pass Audit ==>> x Total DF====> 12.50 625.00 12.50

Analysis Method	Ion Mass	Time (min)	Symbol	Audit	Analyte	Total Metals	Total Metals	Units	Total DF	MDL ppm	PQL ppm	Max QL ppm
ICP-MS	9	90	Be		Beryllium			mg/Liter	12.5	0.0005	0.002	13
ICP-MS	11	90	B		Boron			mg/Liter	12.5	0.063	0.25	13
ICP-MS	23	90	Na	x	Sodium		200	mg/Liter	0.34 J	0.13	0.5	25
ICP-MS	24	90	Mg	x	Magnesium		43	mg/Liter	<	0.063	0.26	25
ICP-MS	27	90	Al		Aluminum			mg/Liter	12.5	0.013	0.05	2.5
ICP-MS	28	90	Si		Silicon			mg/Liter	12.5	0.13	0.6	130
ICP-MS	31	90	P		Phosphorous			mg/Liter	12.5	0.13	0.6	25
ICP-MS	39	90	K		Potassium			mg/Liter	12.5	1	4	130
ICP-MS	44	180	Ca	x	Calcium		63	mg/Liter	<	0.31	1.3	130
ICP-MS	48	90	Ti		Titanium			mg/Liter	12.5	0.038	0.15	2.5
ICP-MS	51	90	V		Vanadium			mg/Liter	12.5	0.0025	0.01	2.5
ICP-MS	52	90	Cr	x	Chromium	<		mg/Liter	<	0.0075	0.03	2.5
ICP-MS	55	90	Mn		Manganese			mg/Liter	12.5	0.0019	0.0075	5
ICP-MS	56	90	Fe		Iron			mg/Liter	12.5	0.25	1	25
ICP-MS	59	90	Co		Cobalt			mg/Liter	12.5	0.0005	0.002	2.5
ICP-MS	60	90	Ni		Nickel			mg/Liter	12.5	0.0025	0.01	13
ICP-MS	63	90	Cu		Copper			mg/Liter	12.5	0.0025	0.01	2.5
ICP-MS	66	90	Zn		Zinc			mg/Liter	12.5	0.13	0.5	25
ICP-MS	75	90	As	x	Arsenic	0.028		mg/Liter	<	0.0038	0.015	25
ICP-MS	82	90	Se		Selenium			mg/Liter	12.5	0.0075	0.03	5
ICP-MS	88	90	Sr		Strontium			mg/Liter	12.5	0.0025	0.01	25
ICP-MS	96	90	Mo		Molybdenum			mg/Liter	12.5	0.0025	0.01	13
ICP-MS	107	90	Ag		Silver			mg/Liter	12.5	0.005	0.02	2.5
ICP-MS	111	90	Cd		Cadmium			mg/Liter	12.5	0.0005	0.002	13
ICP-MS	123	90	Sb		Antimony			mg/Liter	12.5	0.0005	0.002	2.5
ICP-MS	137	90	Ba	x	Barium	0.22		mg/Liter	<	0.0025	0.01	5
ICP-MS	202	260	Hg		Mercury			mg/Liter	12.5	0.0013	0.005	1.3
ICP-MS	205	90	Tl		Thallium			mg/Liter	12.5	0.0038	0.015	2.5
ICP-MS	204	90	Pb		Lead			mg/Liter	12.5	0.0075	0.03	2.5
ICP-MS	232	90	Th		Thorium			mg/Liter	12.5	0.00063	0.0025	2.5
ICP-MS	238	90	U		Uranium			mg/Liter	12.5	0.0005	0.002	2.5

Notes: LMB = laboratory method blank, M and MD = sample matrix replicates

Notes: LCS = spiked laboratory method blank, MS and MSD = spiked sample matrix replicates

Notes: AU is spiked as sample prep surrogate, DF = Dilution Factor, MDL = Method Detection Limit,

Notes: PQL = Primary Quantitation Limit, MQL = Maximum Quantitation Limit,

Notes: < = less than MDL, E = Estimated Value over MQL, J = Greater than MDL but less than PQL (4 x MDL)

Notes: n.a. = Not Applicable, Blank Space = Not Requested or Not Reported

Notes: **Total RCRA limits are 20 times the TCLP extract limits because of sample size (100g) and extract volume (2000mL).

**EPA SW846 Method 1311, Revision 0, July 1992. Section 11.1.1 "If a total analysis of the waste demonstrates that individual analytes are not present in the waste, or that they are present but at such low concentrations that the appropriate regulatory levels could not possibly be exceeded, the TCLP need not be run."

Analyst / Reviewer

6/23/08 Y

Evergreen Analytical, Inc.
4036 Youngfield Street, White Ridge, Colorado, 80133-3860
(303) 422-6031

Client Sample ID:	#2, Source 2	0619-03	Lab Work Order:	08-4312
Client Project ID:	Occidental Oil & Gas		Lab Sample ID:	08-4312-01A
Date Collected:	6/19/08		Sample Matrix:	Water
Date Received:	6/21/08		Lab File ID:	IGCMS10625\2101005.D
Date Prepared:	6/23/08		Method Blank:	MB-15852
Date Analyzed:	6/26/08		Prep Factor:	0.001
Percent Moisture:	NA		Dilution Factor:	10.00

Method: SW8270C

SEMIVOLATILE ORGANICS

Units: µg/L

Prep Method: SW3520C

Analytes	CAS Number	Result	LQL
Acenaphthene	83-32-9	U	53
Acenaphthylene	208-96-8	U	53
Anthracene	120-12-7	U	53
Benzo(a)anthracene	56-55-3	U	53
Benzo(b&k)fluoranthene	205-99-2 & 207-08-9	U	110
Benzoic acid	65-85-0	U	110
Benzo(g,h,i)perylene	191-24-2	U	53
Benzo(a)pyrene	50-32-8	U	53
Benzyl alcohol	100-51-6	U	53
4-Bromophenyl phenyl ether	101-55-3	U	53
Butyl benzyl phthalate	85-68-7	U	53
4-Chloroaniline	106-47-8	U	110
Bis(2-chloroethoxy)methane	111-91-1	U	53
Bis(2-chloroethyl)ether	111-44-4	U	53
4-Chloro-3-methylphenol	59-50-7	U	53
2-Chloronaphthalene	91-58-7	U	53
2-Chlorophenol	95-57-8	U	53
4-Chlorophenyl phenyl ether	7005-72-3	U	53
Chrysene	218-01-9	U	53
Dibenz(a,h)anthracene	53-70-3	U	53
Dibenzofuran	132-64-9	U	53
Di-n-butyl phthalate	84-74-2	U	53
1,2-Dichlorobenzene	95-50-1	U	53
1,3-Dichlorobenzene	541-73-1	U	53
1,4-Dichlorobenzene	106-46-7	U	53
3,3'-Dichlorobenzidine	91-94-1	U	53
Dichlorodisopropyl ether	108-60-1	U	53
2,4-Dichlorophenol	120-83-2	U	53
Diethyl phthalate	84-66-2	U	53
2,4-Dimethylphenol	105-67-9	350	53
Dimethyl phthalate	131-11-3	U	53
4,6-Dinitro-2-methylphenol	534-52-1	U	53
2,4-Dinitrophenol	51-28-5	U	53
2,4-Dinitrotoluene	121-14-2	U	53
2,6-Dinitrotoluene	606-20-2	U	53
Di-n-octyl phthalate	117-84-0	U	53
Bis(2-ethylhexyl)phthalate	117-81-7	U	53
Fluoranthene	206-44-0	U	53
Fluorene	86-73-7	U	53
Hexachlorobenzene	118-74-1	U	53

TMBS
Analyst

Jm
Approved

Qualifiers: See case narrative for a discussion

B - Analyte detected in the Method Blank, value not subtracted from result

E - Extrapolated value, Value exceeds calibration range

H - Prep or Analytical holding time exceeded

S - Spike Recovery outside acceptance limits

X - See case narrative

* - Value exceeded the Maximum Contamination Level (MCL), TCLP limit, or if compound is undetected, LQL exceeds MCL.

Qualifiers: U - Analyte not detected at or above the reporting limit

J - Estimated value below the LQL

Definitions: NA - Not Applicable

LQL - Lower Quantitation Limit

MDL - Method Detection Limit

Surr - Surrogate Standard

Print Date: 8/20/08

Evergreen Analytical, Inc.
 9025 Young Pointe Drive, Wheat Ridge, Colorado 80033-1862
 (303) 425-5021

Client Sample ID:	#2, Source 2	Lab Work Order:	08-4312
Client Project ID:	Occidental Oil & Gas	Lab Sample ID:	08-4312-01A
Date Collected:	6/19/08	Sample Matrix:	Water
Date Received:	6/21/08	Lab File ID:	\GCMS10625\2101005.D
Date Prepared:	6/23/08	Method Blank:	MB-15852
Date Analyzed:	6/26/08	Prep Factor:	0.001
Percent Moisture:	NA	Dilution Factor:	10.00

Method: SW8270C

SEMIVOLATILE ORGANICS

Units: µg/L

Prep Method: SW3520C

Analytes	CAS Number	Result	LQL
Hexachlorobutadiene	87-68-3	U	53
Hexachlorocyclopentadiene	77-47-4	U	53
Hexachloroethane	67-72-1	U	53
Indeno(1,2,3-cd)pyrene	193-39-5	U	53
Isophorone	78-59-1	U	53
2-Methylnaphthalene	91-57-6	640	53
2-Methylphenol	95-48-7	U	53
4-Methylphenol	106-44-5	330	53
Naphthalene	91-20-3	330	53
2-Nitroaniline	88-74-4	U	53
3-Nitroaniline	99-09-2	U	53
4-Nitroaniline	100-01-6	U	53
Nitrobenzene	98-95-3	U	53
2-Nitrophenol	88-75-5	U	53
4-Nitrophenol	100-02-7	U	110
N-Nitrosodi-n-propylamine	621-64-7	U	53
N-Nitrosodiphenylamine	86-30-6	U	53
Pentachlorophenol	87-86-5	U	53
Phenanthrene	85-01-8	U	53
Phenol	108-95-2	U	53
Pyrene	129-00-0	U	53
1,2,4-Trichlorobenzene	120-82-1	U	53
2,4,5-Trichlorophenol	95-95-4	U	53
2,4,6-Trichlorophenol	88-06-2	U	53
Surr: 2,4,5-Tribromophenol	118-79-6	94	QC Limits: 32-138 %REC
Surr: 2-Fluorobiphenyl	321-60-8	108	QC Limits: 45-130 %REC
Surr: 2-Fluorophenol	367-12-4	114	QC Limits: 43-130 %REC
Surr: Nitrobenzene-d5	4165-60-0	129	QC Limits: 45-130 %REC
Surr: Phenol-d6	13127-88-3	110	QC Limits: 47-130 %REC
Surr: Terphenyl-d14	1718-51-0	94	QC Limits: 47-136 %REC

TMB
 Analyst


 Approved

Qualifiers: See case narrative for a discussion

B - Analyte detected in the Method Blank, value not subtracted from result
 E - Extrapolated value, Value exceeds calibration range
 H - Prep or Analytical holding time exceeded
 S - Spike Recovery outside acceptance limits
 X - See case narrative
 * - Value exceeded the Maximum Contamination Level (MCL), TCLP limit, or if compound is undetected, LQL exceeds MCL.

Qualifiers: U - Analyte not detected at or above the reporting limit

J - Estimated value below the LQL

Definitions: NA - Not Applicable
 LQL - Lower Quantitation Limit
 MDL - Method Detection Limit
 Surr - Surrogate Standard

Print Date: 6/28/08

2475 River Road, Suite 2

Grand Junction, CO 81505

(970)243-5311 FAX: (970)243-4016

Client: Occidental Oil and Gas Corp

Client Project Name: Project #050102

Lab QC Batch Sample: 08-1646, 0619-03

Client Sample Number: 0619-03

Key Lab #: 08-1646

Work Order #: 0620081644

Sampling Date: 6/19/2008

Date Received: 06/20/08

Sampling Time: 17:41

Method: EPA SW846 5030/5035/8260

Sample Matrix: Water

Technician: KEY

Sampler: Brett

Data File Name: 0900008.D

Date Analyzed: 23 Jun 2008 6:29 pm

Data File Path: C:\MSDCHEM\DATA\0806JUN23

Lab Sample Information: Water, 10xdl, Oxy, Sump

Lab Sample Number: 0619-03, 08-1646, M, 0620081644

Reported====>>> x			DF =		10							
CAS#	Type	Target Compound	Ampl	Rep	Ampl	MDL	Units	DF	Final Conc	MDL	Qual	MOE
75-71-8	M1	dichlorodifluoromethane	x	0	0.00	2	ug	10.	<	20.		4800
74-87-3	MP1	chloromethane	x	2543	0.07	2	ug	10.	<	20.		4800
75-01-4	MC1	vinyl chloride	x	0	0.00	2	ug	10.	<	20.		4800
67-64-1	M1	acetone	x	101374	4.89	4.3	ug	10.	49 ug/L	43.	J	4800
60-29-7	M1	diethyl ether	x	0	0.00	2	ug	10.	<	20.		4800
74-83-9	M1	bromomethane	x	1413	0.06	2	ug	10.	<	20.		4800
75-00-3	M1	chloroethane	x	0	0.00	2	ug	10.	<	20.		4800
75-69-4	M1	trichlorofluoromethane	x	0	0.00	1	ug	10.	<	10.		4800
75-35-4	MC1	1,1-dichloroethene	x	0	0.00	1	ug	10.	<	10.		4800
75-09-2	M1	methylene chloride	x	5129	0.17	1	ug	10.	<	10.		4800
76-13-1	M1	1,1,2-trichlorotrifluoroethane	x	0	0.00	1	ug	10.	<	10.		4800
107-05-1	M1	allyl chloride	x	0	0.00	1	ug	10.	<	10.		4800
156-60-5	M1	trans 1,2-dichloroethene	x	0	0.00	1	ug	10.	<	10.		4800
1634-04-4	M1	[MTBE] tert-butylmethyl ether	x	0	0.00	1	ug	10.	<	10.		4800
75-34-3	MP1	1,1-dichloroethane	x	0	0.00	1	ug	10.	<	10.		4800
78-93-3	M1	[MEK] 2-butanone	x	0	0.00	4	ug	10.	<	40.		4800
156-59-4	M1	cis 1,2-dichloroethene	x	0	0.00	1	ug	10.	<	10.		4800
590-20-7	M1	2,2-dichloropropane	x	0	0.00	1	ug	10.	<	10.		4800
74-97-5	M1	bromochloromethane	x	0	0.00	1	ug	10.	<	10.		4800
67-66-3	MC1	chloroform (trichloromethane)	x	1195	0.02	1.5	ug	10.	<	15.		4800
109-99-9	M1	tetrahydrofuran	x	14475	0.92	4.55	ug	10.	<	45.5		4800
71-55-6	M1	1,1,1-trichloroethane	x	0	0.00	1	ug	10.	<	10.		4800
107-06-2	M1	1,2-dichloroethane	x	1058	0.02	1	ug	10.	<	10.		4800
563-58-6	M1	1,1-dichloropropene	x	0	0.00	1	ug	10.	<	10.		4800
71-43-2	M1	benzene	x	16494586	136.74	1	ug	10.	1400 ug/L	10.		4800
56-26-5	M1	carbon tetrachloride	x	0	0.00	1	ug	10.	<	10.		4800
79-01-6	M1	trichloroethene	x	1174	0.02	1	ug	10.	<	10.		4800
78-87-5	MC1	1,2-dichloropropane	x	0	0.00	1	ug	10.	<	10.		4800
74-95-3	M1	dibromomethane	x	0	0.00	1	ug	10.	<	10.		4800
75-27-4	M1	bromodichloromethane	x	0	0.00	1	ug	10.	<	10.		4800
10061-01-5	M1	cis 1,3-dichloropropene	x	0	0.00	1	ug	10.	<	10.		4800
108-10-1	M1	[MIBK] 4-methyl-2-pentanone	x	0	0.00	1	ug	10.	<	10.		4800
108-88-3	MC1	toluene	x	23550541	304.50	2	ug	10.	3000 ug/L	20.		4800
10061-02-6	M1	trans 1,3-dichloropropene	x	0	0.00	1	ug	10.	<	10.		4800
79-00-5	M1	1,1,2-trichloroethane	x	0	0.00	1	ug	10.	<	10.		4800
142-28-9	M2	1,3-dichloropropane	x	181959	4.22	1	ug	10.	42 ug/L	10.		4800
124-48-1	M2	dibromochloromethane	x	0	0.00	1	ug	10.	<	10.		4800
127-18-4	M2	tetrachloroethene	x	0	0.00	1	ug	10.	<	10.		4800
106-93-4	M2	1,2-dibromoethane	x	0	0.00	1	ug	10.	<	10.		4800
108-90-7	MP2	chlorobenzene	x	0	0.00	1	ug	10.	<	10.		4800
630-20-6	M2	1,1,1,2-tetrachloroethane	x	0	0.00	1	ug	10.	<	10.		4800
100-41-4	MC2	ethylbenzene	x	880557	4.68	1	ug	10.	47 ug/L	10.		4800
	M2	m/p xylene	x	30156255	266.59	1	ug	10.	2700 ug/L	10.		9600
100-42-5	M2	styrene	x	118252	1.43	1	ug	10.	14 ug/L	10.	J	4800
95-47-6	M2	o-xylene	x	5139301	44.47	1	ug	10.	440 ug/L	10.		4800
75-25-2	MP2	bromoform	x	0	0.00	1	ug	10.	<	10.		4800
79-34-5	MP2	1,1,2,2-tetrachloroethane	x	0	0.00	1	ug	10.	<	10.		4800
98-82-8	M2	isopropylbenzene	x	23583	0.17	1	ug	10.	<	10.		4800
96-18-4	M2	1,2,3-trichloropropane	x	0	0.00	1	ug	10.	<	10.		4800
108-86-1	M2	bromobenzene	x	0	0.00	1	ug	10.	<	10.		4800
95-49-8	M2	2-chlorotoluene	x	0	0.00	1	ug	10.	<	10.		4800
103-65-1	M2	n-propylbenzene	x	0	0.00	1	ug	10.	<	10.		4800

KEY LABORATORIES, INC.

2479 River Road Unit A
 Graud Junction, CO 81505
 (970)243-5311 FAX (970)243-6010

8260 Analytical Report

Client : **Occidental Oil and Gas Corp**
 Client Project Name : **Project #061908**

Lab QC Batch Sample : **08-1646, 0619-03**
 Key Lab # : **08-1646**
 Work Order # : **0620081644**
 Date Received : **06/20/08**
 Method : **EPA SW846 5030/5035/8260**
 Technician : **KEY**
 Data File Name : **0900008.D**
 Date Analyzed : **23 Jun 2008 6:29 pm**
 Data File Path : **C:\MSDCHEM\DATA\0806JUN23**
 Lab Sample Information : **Water, 10x dil, Oxy, Sump**
 Lab Sample Number : **0619-03, 08-1646, M, 0620081644**

Client Sample Number : **0619-03**

Sampling Date : **6/19/2008**
 Sampling Time : **17:41**
 Sample Matrix : **Water**
 Sampler : **Brett**

Reported=>> x		DF =		10							
Case	Type	Sample Compound	Reported	Unit	Conc	Unit	DF	Conc	Unit	MDL	Conc
106-43-4	M2	4-chlorotoluene	x	0	0.00	1 ug	10	<	10	4800	
108-67-8	M2	1,3,5-trimethylbenzene	x	1577760	13.92	1 ug	10	140 ug/l.	10	4800	
98-06-6	M2	tert-butylbenzene	x	11991	0.12	1 ug	10	<	10	4800	
95-63-6	M2	1,2,4-trimethylbenzene	x	1748833	15.50	1 ug	10	160 ug/l.	10	4800	
96-12-8	M2	1,2-dibromo-3-chloropropane	x	21472	3.12	1 ug	10	31 ug/l.	10	4800	J
541-73-1	M3	1,3-dichlorobenzene	x	7345	0.12	1 ug	10	<	10	4800	
99-87-6	M3	p-isopropyltoluene	x	23087	0.21	1 ug	10	<	10	4800	
135-98-8	M3	sec-butylbenzene	x	11586	0.08	1 ug	10	<	10	4800	
106-46-7	M3	1,4-dichlorobenzene	x	7350	0.11	1 ug	10	<	10	4800	
95-50-1	M3	1,2-dichlorobenzene	x	6687	0.11	1 ug	10	<	10	4800	
104-51-8	M3	n-butylbenzene	x	3833	0.04	1 ug	10	<	10	4800	
87-61-6	M3	1,2,4-trichlorobenzene	x	4637	0.06	2 ug	10	<	20	4800	
87-68-3	M3	hexachlorobutadiene	x	0	0.00	2 ug	10	<	20	4800	
91-20-3	M3	naphthylene	x	170862	2.08	2 ug	10	21 ug/l.	20	4800	J
120-82-1	M3	1,2,3-trichlorobenzene	x	3050	0.04	2 ug	10	<	20	4800	
1868-53-7	S1	dibromofluoromethane	4567339	67.33	88 ug	5211326	65 -	135	50 -	150	69.9 96.3
17060-07-0	M1	1,2 dichloroethane-d4	1945957	69.51	91 ug	2150224	65 -	135	50 -	150	69.9 99.4
2037-26-5	S1	toluene-d8	4698771	69.11	89 ug	5285330	65 -	135	50 -	150	69.9 98.9
460-00-4	S2	4-bromofluorobenzene	4761949	69.83	86 ug	5531588	65 -	135	50 -	150	69.9 99.9
462-06-6	I1	fluorobenzene	7709490	69.90	91 ug	8484018					69.9
3114-55-4	I2	chlorobenzene-d5	4321029	69.90	85 ug	5060990					69.9
3855-82-1	I3	1,4-dichlorobenzene-d4	3094796	69.90	79 ug	3894374					69.9

MDL = Method Detection Limit

PQL = Practical Quantitation Limit = 4 x MDL

RDL = Reporting Detection Limit = MDL x Dilution Factor

MDL = Maximum Quantitation Limit = 110% x DF x Highest Calibration Standard

Reporting basis is Kg for solids and L for liquids

J qualifier = MDL < Result < PQL

E qualifier = Estimated Result > Highest Calibration Standard

Analyst

Approved

Data Path : C:\MSDCHEM\1\DATA\09000008.D
 Data File : 09000008.D
 Acq On : 23 Jun 2008 6:29 pm
 Operator : KEY
 Sample : 0619-05, 08-1646, M, 0620081646,
 Misc : Water, 10xdil, Oxy, Sump
 ALS Vial : 9 Sample Multiplier: 1

Quant Time: Jun 23 18:47:26 2008
 Quant Method : C:\MSDCHEM\1\5973N\4VRX8260.M
 Quant Title : 5973_8260 - Method 524.2 List - Purgable Volatile Wed Jun 11 16:56
 12 2008
 QLast Update : Wed Jun 11 16:56:12 2008
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) fluorobenzene	4.26	96	7709490	69.90	ug	0.00
40) chlorobenzene-d5	9.34	54	4321029+	69.90	ug	0.00
64) 1,4-dichlorobenzene-d4	13.71	154	3094796+	69.90	ug	0.00

System Monitoring Compounds

22) dibromofluoromethane	2.91	113	4567339+	67.33	ug	0.00
Spiked Amount	69.900	Range	65 - 135	Recovery	=	96.32%
25) 1,2 dichloroethane-d4	3.35	104	1945957+	69.51	ug	0.00
Spiked Amount	69.900	Range	65 - 135	Recovery	=	99.44%
36) toluene-d8	6.91	100	4698771	69.11	ug	0.00
Spiked Amount	69.900	Range	65 - 135	Recovery	=	98.87%
55) 4-bromofluorobenzene	11.75	174	4761949+	69.83	ug	0.00
Spiked Amount	69.900	Range	65 - 135	Recovery	=	99.90%

Target Compounds

	R.T.	QIon	Response	Conc	Units	Qvalue
2) dichlorodifluoromethane	0.00	85	0	N.D.		
3) chloromethane	1.01	50	2543	0.07	ug	# 53
4) vinyl chloride	0.00	62	0	N.D.		
5) acetone	1.50	58	101374+	4.89	ug	# 79
6) diethyl ether	0.00	74	0+	N.D.		
7) bromomethane	1.18	94	1413	0.06	ug	# 1
8) chloroethane	0.00	64	0	N.D.		
9) trichlorofluoromethane	0.00	101	0	N.D.		
10) 1,1-dichloroethene	0.00	96	0	N.D.		
11) methylene chloride	1.72	84	5129	0.17	ug	# 85
12) 1,1,2-trichlorotrifluoroet	0.00	151	0+	N.D.		
13) allyl chloride	0.00	78	0+	N.D.		
14) trans 1,2-dichloroethene	0.00	96	0	N.D.		
15) [MTBE] tert-butylmethyl et	0.00	73	0	N.D.		
16) 1,1-dichloroethane	0.00	63	0	N.D.		
17) [MEK] 2-butanone	0.00	72	0+	N.D.		
18) cis 1,2-dichloroethene	0.00	96	0	N.D.		
19) 2,2-dichloropropane	0.00	77	0+	N.D.		
20) bromochloromethane	0.00	128	0+	N.D.		
21) chloroform (trichlorometha	2.80	83	1195	0.02	ug	# 17
23) tetrahydrofuran	3.12	71	14475+	0.92	ug	# 80
24) 1,1,1-trichloroethane	0.00	97	0+	N.D.		
26) 1,2 dichloroethane	3.37	62	1058	0.02	ug	# 1
27) 1,1-dichloropropene	0.00	75	0	N.D.		
28) benzene	3.96	78	16494586	136.74	ug	99
29) carbon tetrachloride	0.00	117	0+	N.D.		
30) trichloroethene	4.79	130	1174+	0.02	ug	31
31) 1,2-dichloropropane	0.00	63	0	N.D.		
32) dibromomethane	0.00	174	0	N.D.		
33) bromodichloromethane	0.00	83	0	N.D.		
34) cis 1,3-dichloropropene	0.00	75	0	N.D.		
35) [MIBK] 4-methyl-2-pentanone	0.00	58	0+	N.D.		
37) toluene	7.02	92	23550541	304.50	ug	100
38) trans 1,3-dichloropropene	0.00	75	0	N.D.		
39) 1,1,2-trichloroethane	0.00	83	0	N.D.		
41) 1,3-dichloropropane	7.01	76	181959	4.22	ug	# 1
42) dibromochloromethane	0.00	129	0	N.D.		
43) tetrachloroethene	0.00	166	0+	N.D.		

Data Path : C:\MSDCHEM\1\DATA\0806300231
 Data File : 0900008.D
 Acq On : 23 Jun 2008 6:29 pm
 Operator : KEY
 Sample : 0619-03, 08-1646, M, 0620081644,
 Misc : Water, 10xdl, Oxy, Sump
 ALS Vial : 9 Sample Multiplier: 1

Quant Time: Jun 23 18:47:26 2008
 Quant Method : C:\MSDCHEM\1\5973N\4VRX8260.M
 Quant Title : 5973_8260 - Method 524.2 List - Purgable Volatile Wed Jun 11 16:56
 12 2008
 QLast Update : Wed Jun 11 16:56:12 2008
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
44) 1,2-dibromoethane	0.00	107	0	N.D.		
45) chlorobenzene	0.00	112	0	N.D.		
46) 1,1,1,2-tetrachloroethane	0.00	131	0+	N.D.		
47) ethylbenzene	9.90	91	880557+	4.68	ug	99
48) m/p xylene	10.32	91	30156255	266.59	ug	99
49) styrene	11.03	104	118252	1.43	ug	# 1
50) o-xylene	11.03	91	5139301	44.47	ug	98
51) bromoform	0.00	173	0	N.D.		
52) 1,1,2,2-tetrachloroethane	0.00	83	0+	N.D.		
53) isopropylbenzene	11.80	105	23583	0.17	ug	# 45
54) 1,2,3-trichloropropane	0.00	75	0	N.D.		
56) bromobenzene	0.00	156	0	N.D.		
57) 2-chlorotoluene	0.00	126	0	N.D.		
58) n-propylbenzene	0.00	120	0	N.D.		
59) 4-chlorotoluene	0.00	126	0	N.D.		
60) 1,3,5-trimethylbenzene	13.16	105	1577760	13.92	ug	100
61) tert-butylbenzene	13.43	119	11991	0.12	ug	# 23
62) 1,2,4-trimethylbenzene	13.60	105	1748833	15.50	ug	99
63) 1,2-dibromo-3-chloropropan	14.46	157	21472	3.12	ug	# 48
65) 1,3-dichlorobenzene	13.74	146	7345	0.12	ug	# 1
66) p-isopropyltoluene	13.93	119	23087	0.21	ug	# 91
67) sec-butylbenzene	13.67	105	11586	0.08	ug	# 36
68) 1,4-dichlorobenzene	13.74	146	7350	0.11	ug	# 1
69) 1,2-dichlorobenzene	14.07	146	6687	0.11	ug	# 24
70) n-butylbenzene	14.32	91	3833	0.04	ug	# 1
71) 1,2,4-trichlorobenzene	15.50	180	4637+	0.06	ug	# 1
72) hexachlorobutadiene	0.00	225	0+	N.D.		
73) naphthylene	15.56	128	170862	2.08	ug	# 64
74) 1,2,3-trichlorobenzene	15.64	180	3050+	0.04	ug	35

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Key Laboratories

2479 River Road, Unit A

Grand Junction, Colorado 81502

Phone (970) 243-5311 Fax (970) 243-6010

Client Occidental Oil and Gas Corp

Client Project Name Project #061906Client Sample Number 0619-03

Key Lab # 08-1646

Work Order # 0620081644

Date Received 06/20/08

Method EPA ICP-MS Methods 6020 / 200.8

Technician

Sampling Date 6/19/2008

Sampling Time 17:41

Sample Matrix Water

Sampler Brett

Date Analyzed.

Friday, June 20, 2008 21:05:25 day, June 20, 2008 21:14:59

Friday, June 20, 2008 20:08:19

Key Lab Sample ID#

WI-0606-08-1646-23

WI-0606-08-1646-23

WI-0606-08-0000-01_LMB

Sample Comments:

LMB

Sample Aliquot [mg]:

40000

40000

40000

Prep Spike Recovery:

0.988

1.296

1.027

Prep/Digestion DF==>>

1.3

1.3

1.25

Pass Audit ==>>>

x

Total DF==>>

12.50

625.00

12.50

Analysis Method	Ion Mass	Time [min]	Symbol	Audit	Analyte	Total Metals	Total Metals	Units	Total DF	MDL ppm	PQL ppm	Max QL ppm
ICP-MS	9	90	Be		Beryllium			mg/Liter	12.5	0.0005	0.002	13
ICP-MS	11	90	B		Boron			mg/Liter	12.5	0.063	0.25	13
ICP-MS	23	90	Na	x	Sodium		290	mg/Liter	0.34 J	0.13	0.5	25
ICP-MS	24	90	Mg	x	Magnesium		130	mg/Liter	<	0.063	0.25	25
ICP-MS	27	90	Al		Aluminum			mg/Liter	12.5	0.013	0.05	2.5
ICP-MS	28	90	Si		Silicon			mg/Liter	12.5	0.13	0.5	130
ICP-MS	31	90	P		Phosphorous			mg/Liter	12.5	0.13	0.5	25
ICP-MS	39	90	K		Potassium			mg/Liter	12.5	1	4	130
ICP-MS	44	180	Ca	x	Calcium		270	mg/Liter	<	0.31	1.3	130
ICP-MS	48	90	Ti		Titanium			mg/Liter	12.5	0.038	0.15	2.5
ICP-MS	51	90	V		Vanadium			mg/Liter	12.5	0.0025	0.01	2.5
ICP-MS	52	90	Cr	x	Chromium	<		mg/Liter	<	0.0075	0.03	2.5
ICP-MS	55	90	Mn		Manganese			mg/Liter	12.5	0.0019	0.0075	5
ICP-MS	54	90	Fe		Iron			mg/Liter	12.5	0.25	1	25
ICP-MS	59	90	Co		Cobalt			mg/Liter	12.5	0.0005	0.002	2.5
ICP-MS	60	90	Ni		Nickel			mg/Liter	12.5	0.0025	0.01	13
ICP-MS	63	90	Cu		Copper			mg/Liter	12.5	0.0025	0.01	2.5
ICP-MS	66	90	Zn		Zinc			mg/Liter	12.5	0.13	0.5	25
ICP-MS	75	90	As	x	Arsenic	0.024		mg/Liter	<	0.0038	0.015	25
ICP-MS	82	90	Se		Selenium			mg/Liter	12.5	0.0075	0.03	5
ICP-MS	88	90	Sr		Strontium			mg/Liter	12.5	0.0025	0.01	25
ICP-MS	98	90	Mo		Molybdenum			mg/Liter	12.5	0.0025	0.01	13
ICP-MS	107	90	Ag		Silver			mg/Liter	12.5	0.005	0.02	2.5
ICP-MS	111	90	Cd		Cadmium			mg/Liter	12.5	0.0005	0.002	13
ICP-MS	123	90	Sb		Antimony			mg/Liter	12.5	0.0005	0.002	2.5
ICP-MS	137	90	Ba	x	Barium	0.49		mg/Liter	<	0.0025	0.01	5
ICP-MS	202	360	Hg		Mercury			mg/Liter	12.5	0.0013	0.005	1.3
ICP-MS	205	90	Tl		Thallium			mg/Liter	12.5	0.0038	0.015	2.5
ICP-MS	204	90	Pb		Lead			mg/Liter	12.5	0.0075	0.03	2.5
ICP-MS	232	90	Th		Thorium			mg/Liter	12.5	0.00063	0.0025	2.5
ICP-MS	238	90	U		Uranium			mg/Liter	12.5	0.0005	0.002	2.5

Notes: LMB = laboratory method blank, M and MD = sample matrix replicates

Notes: LCS = spiked laboratory method blank, MS and MSD = spiked sample matrix replicates

Notes: Au is spiked as sample prep surrogate, DF = Dilution Factor, MDL = Method Detection Limit,

Notes: PQL = Primary Quantitation Limit, MQL = Maximum Quantitation Limit,

Notes: < = less than MDL, E = Estimated Value over MQL, J = Greater than MDL but less than PQL (4 x MDL)

Notes: n.a. = Not Applicable, Blank Space = Not Requested or Not Reported

Notes: ** (Total RCRA limits) are 20 times the TCLP extract limits because of sample size (100g) and extract volume (2000mL).

* EPA SW846 Method 1311, Revision 0, July 1992, Section "If a total analysis of the waste demonstrates that individual analytes are not present in the waste, or that they are present but at such low concentrations that the appropriate regulatory levels could not possibly be exceeded, the TCLP need not be run"

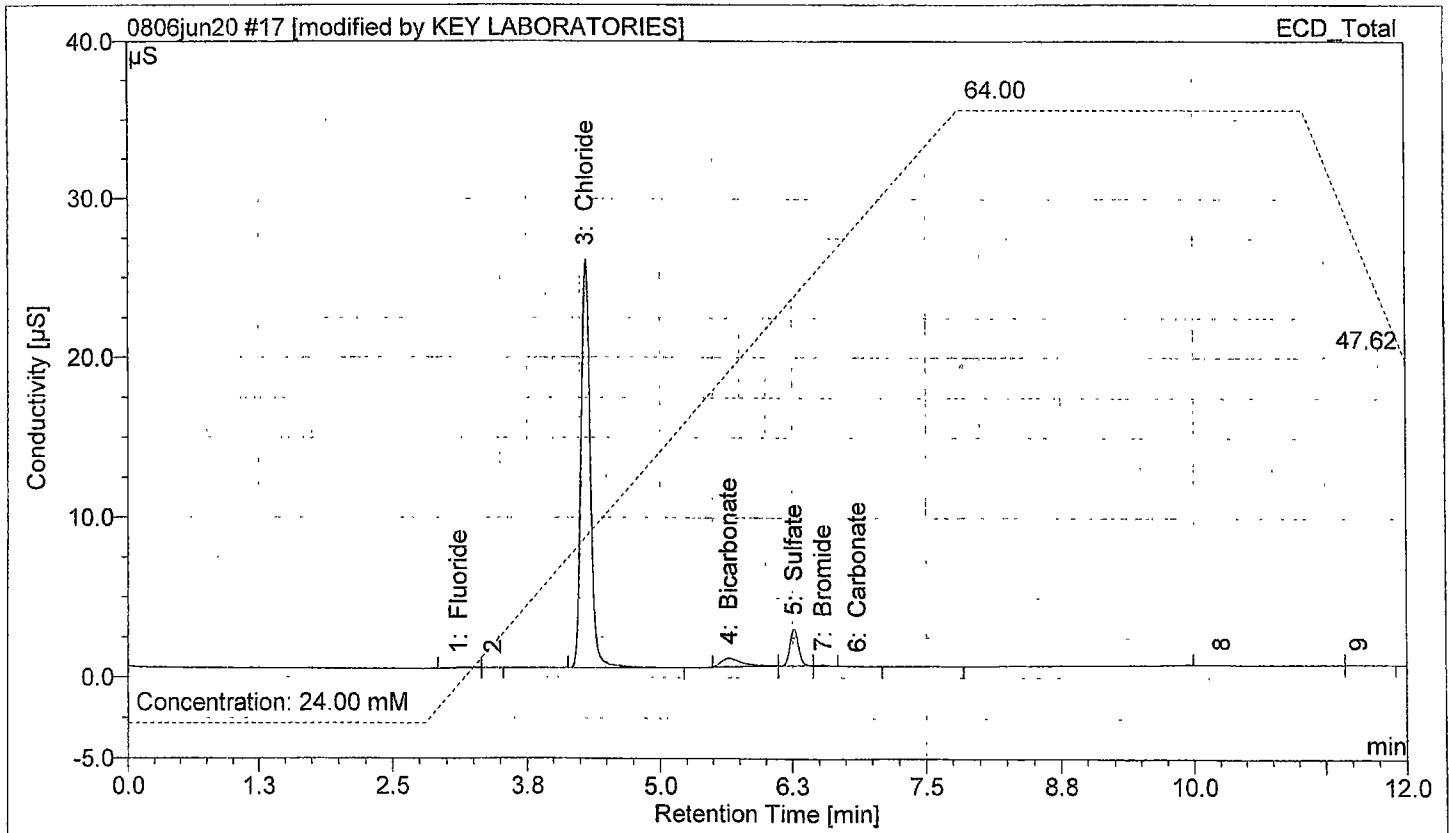
Analyst / Reviewer

6/23/08 Y

Key Laboratories Anion Report

Sample Name:	0619-03, 08-1646, 50X, 0620081644,	Sample No.:	17
Sample ID:	water, 50Xdil, OXY,	LQL = Lower Quantitation Limit	
Sample Comments:	Project 061908	MQL = Maximum Quantitation Limit	
Sequence Directory:	ICS2000\Sequences\0806jun	E = Estimated, Value Exceeds MQL	
Sequence Name:	0806jun20	Raw = Dilution Factor not applied	
Program Method:	grad8AS18	Date:	6/23/08
Quantitation Method:	grad8AS18	Injection vol. [uL]:	25.0
Date Time Collected:	6/20/2008 10:07 PM	Dilution Factor [DF]:	50.0000
System Operator:	KEY LABORATORIES	Sample Wt.:	1.0000
		Sample Amt.:	1.0000

No.	Component	Retention	Area	Height	Raw LQL	Raw Amt	Pass QC	Amount	DF x LQL	DF x MQL
ECD_Total	ECD_Total	ECD_Total	ECD_Total	ECD_Total	ECD_Total	ECD_Total		ECD_Total	ECD_Total	ECD_Total
	Name	Time	uS*min	uS	ppm	ppm	X = Pass	ppm	ppm	ppm
1	Fluoride	3.11	0.003	0.017	0.0018	0.0056	X	0.2803	0.0905	1000.
3	Chloride	4.31	2.620	25.555	0.0524	8.4159	X	420.7939	2.6200	4000.
5	Sulfate	6.26	0.214	2.273	0.1780	0.9532	X	47.6614	8.9000	4000.



Evergreen Analytical, Inc.
4036 Youngfield Street, Wheat Ridge, Colorado 80033-3262
(303) 425-6021

Client Sample ID:	#2, Sump-0619-03	0619-03	Lab Work Order:	08-4312
Client Project ID:	Occidental Oil & Gas		Lab Sample ID:	08-4312-02A
Date Collected:	6/19/08		Sample Matrix:	Water
Date Received:	6/21/08		Lab File ID:	\\GCMS10625\0901009.D
Date Prepared:	6/23/08		Method Blank:	MB-15852
Date Analyzed:	6/25/08		Prep Factor:	0.001
Percent Moisture:	NA		Dilution Factor:	1.00

Method: SW8270C
Prep Method: SW3520C

SEMIVOLATILE ORGANICS

Units: µg/L

Analytes	CAS Number	Result	LQL
Acenaphthene	83-32-9	U	5.3
Acenaphthylene	208-96-8	U	5.3
Anthracene	120-12-7	U	5.3
Benzo(a)anthracene	56-55-3	U	5.3
Benzo(b&k)fluoranthene	205-99-2 & 207-08-9	U	11
Benzoic acid	65-85-0	13	11
Benzo(g,h,i)perylene	191-24-2	U	5.3
Benzo(a)pyrene	50-32-8	U	5.3
Benzyl alcohol	100-51-6	4.1 J	5.3
4-Bromophenyl phenyl ether	101-55-3	U	5.3
Butyl benzyl phthalate	85-68-7	U	5.3
4-Chloroaniline	106-47-8	U	11
Bis(2-chloroethoxy)methane	111-91-1	U	5.3
Bis(2-chloroethyl)ether	111-44-4	U	5.3
4-Chloro-3-methylphenol	59-50-7	U	5.3
2-Chloronaphthalene	91-58-7	U	5.3
2-Chlorophenol	95-57-8	U	5.3
4-Chlorophenyl phenyl ether	7005-72-3	U	5.3
Chrysene	218-01-9	U	5.3
Dibenz(a,h)anthracene	53-70-3	U	5.3
Dibenzofuran	132-64-9	U	5.3
Di-n-butyl phthalate	84-74-2	U	5.3
1,2-Dichlorobenzene	95-50-1	U	5.3
1,3-Dichlorobenzene	541-73-1	U	5.3
1,4-Dichlorobenzene	106-46-7	U	5.3
3,3'-Dichlorobenzidine	91-94-1	U	5.3
Dichlorodisopropyl ether	108-60-1	U	5.3
2,4-Dichlorophenol	120-83-2	U	5.3
Dichthyl phthalate	84-66-2	U	5.3
2,4-Dimethylphenol	105-67-9	26	5.3
Dimethyl phthalate	131-11-3	U	5.3
4,6-Dinitro-2-methylphenol	534-52-1	U	5.3
2,4-Dinitrophenol	51-28-5	U	5.3
2,4-Dinitrotoluene	121-14-2	U	5.3
2,6-Dinitrotoluene	606-20-2	U	5.3
Di-n-octyl phthalate	117-84-0	U	5.3
Bis(2-ethylhexyl)phthalate	117-81-7	U	5.3
Fluoranthene	206-44-0	U	5.3
Fluorene	86-73-7	U	5.3
Hexachlorobenzene	118-74-1	U	5.3

TMB
Analyst

Approved

Qualifiers: See case narrative for a discussion

B - Analyte detected in the Method Blank, value not subtracted from result
E - Extrapolated value. Value exceeds calibration range
H - Prep or Analytical holding time exceeded
S - Spike Recovery outside acceptance limits
X - See case narrative
* - Value exceeded the Maximum Contamination Level (MCL), TCLP limit, or if compound is undetected, LQL exceeds MCL.

Qualifiers: U - Analyte not detected at or above the reporting limit

J - Estimated value below the LQL

Definitions: NA - Not Applicable
LQL - Lower Quantitation Limit
MDL - Method Detection Limit
Surr - Surrogate Standard

Print Date: 6/26/08

Evergreen Analytical, Inc.
4036 Youngfield Street, Wheat Ridge, Colorado 80033-3362
(303) 425-6831

Client Sample ID:	#2, Sump-0619-03	Lab Work Order:	08-4312
Client Project ID:	Occidental Oil & Gas	Lab Sample ID:	08-4312-02A
Date Collected:	6/19/08	Sample Matrix:	Water
Date Received:	6/21/08	Lab File ID:	\GCMS10625\0901009.D
Date Prepared:	6/23/08	Method Blank:	MB-15852
Date Analyzed:	6/25/08	Prep Factor:	0.001
Percent Moisture:	NA	Dilution Factor:	1.00

Method: SW8270C

SEMIVOLATILE ORGANICS

Prep Method: SW3520C

Units: µg/L

Analytes	CAS Number	Result	LQL
Hexachlorobutadiene	87-68-3	U	5.3
Hexachlorocyclopentadiene	77-47-4	U	5.3
Hexachloroethane	67-72-1	U	5.3
Indeno(1,2,3-cd)pyrene	193-39-5	U	5.3
Isophorone	78-59-1	U	5.3
2-Methylnaphthalene	91-57-6	6.1	5.3
2-Methylphenol	95-48-7	56	5.3
4-Methylphenol	106-44-5	61	5.3
Naphthalene	91-20-3	9.9	5.3
2-Nitroaniline	88-74-4	U	5.3
3-Nitroaniline	99-09-2	U	5.3
4-Nitroaniline	100-01-6	U	5.3
Nitrobenzene	98-95-3	U	5.3
2-Nitrophenol	88-75-5	U	5.3
4-Nitrophenol	100-02-7	U	11
N-Nitrosodi-n-propylamine	621-64-7	U	5.3
N-Nitrosodiphenylamine	86-30-6	U	5.3
Pentachlorophenol	87-86-5	U	5.3
Phenanthrene	85-01-8	U	5.3
Phenol	108-95-2	44	5.3
Pyrene	129-00-0	U	5.3
1,2,4-Trichlorobenzene	120-82-1	U	5.3
2,4,5-Trichlorophenol	95-95-4	U	5.3
2,4,6-Trichlorophenol	88-06-2	U	5.3
Surr: 2,4,6-Tribromophenol	118-79-6	113	QC Limits: 32-138 %REC
Surr: 2-Fluorobiphenyl	321-60-8	96	QC Limits: 45-130 %REC
Surr: 2-Fluorophenol	357-12-4	99	QC Limits: 43-130 %REC
Surr: Nitrobenzene-d5	4165-60-0	97	QC Limits: 45-130 %REC
Surr: Phenol-d6	13127-88-3	100	QC Limits: 47-130 %REC
Surr: Terphenyl-d14	1718-51-0	100	QC Limits: 47-136 %REC


Analyst


Approved

Qualifiers: See case narrative for a discussion

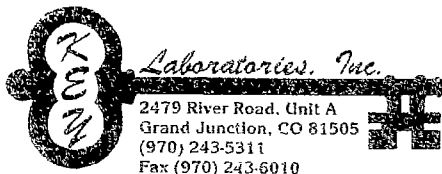
B - Analyte detected in the Method Blank, value not subtracted from result
E - Extrapolated value, Value exceeds calibration range
H - Prep or Analytical holding time exceeded
S - Spike Recovery outside acceptance limits
X - See case narrative
* - Value exceeded the Maximum Contamination Level (MCL), TCLP limit, or if compound is undetected, LQL exceeds MCL.

Qualifiers: U - Analyte not detected at or above the reporting limit

J - Estimated value below the LQL

Definitions: NA - Not Applicable
LQL - Lower Quantitation Limit
MDL - Method Detection Limit
Surr - Surrogate Standard

Print Date: 6/28/08



CHAIN OF CUSTODY RECORD

06/17/81528

Proj. No. 061608		Company Name OXY		SAMPLE ANALYSES										CONTAINER/SIZE/PE	PRESERVATIVES	REMARKS	LABORATORY SAMPLE #
Phone # 970-243-3601		Fax # 970-243-6868															
SAMPLERS: (Signature) <i>Brett Kennedy</i>				PRINT NAME: Brett Kennedy													
SAMPLE NO.	DATE	TIME	MATRIX	PROJECT NAME/ SAMPLE LOCATION	BTEX												
1	6/16/08	1809	H ₂ O	Crk South - 3 miles	✓										2	1520	
2		1818		Crk - Guard Shack											2	1521	
3		1828		Crk - 600-1											2	1522	
4		1833		Crk - Mtn Rd - Waterfall											2	1523	
5		1841	Soil	Crk - Down 43-32											2	1524	
6		1850		Crk - Old Pipeline Rupture											2	1525	
7		1900	H ₂ O	*Crk - Trunked Xing *											2	1526	
8		1920		Lower Williams Corral											2	1527	
9		1925	Sledge	Lower Williams Pond Sledge											2	1528	
10		1930	H ₂ O	Lower Williams Below Pond											2	1529	
11		1935		Lower Williams Pond											2	1530	
12	✓	1955		Joining Stream - Culvert	✓										2	1531	
TOTAL NO. OF CONTAINERS														34			

Relinquished by: (Signature) <i>Brett Kennedy</i>	Date / Time 6/17/08 0815	Received by: (Signature)	Relinquished by: (Signature)	Date / Time	Received by: (Signature)
Custody Seal No.		Custody Seal Present Intact	Date Required		
Method of Shipment		Shipped by: (Signature)	Date Completed	Received for Laboratory by: (Signature) <i>Stastling</i>	Date / Time 6/17/08 0820

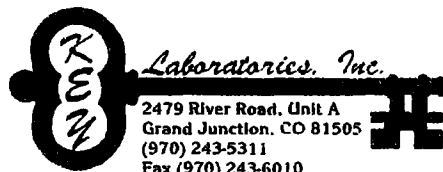


2072

CHAIN OF CUSTODY RECORD

0617031520

Proj. No 061608	Company Name Oxy		Phone # 970-243-3601		Fax # 970-243-6868		SAMPLE ANALYSES				CONTAINER SIZE/TYPE	PRESERVATIVES	REMARKS	LABORATORY SAMPLE #
SAMPLERS: (Signature) <i>Brett Kennedy</i>			PRINT NAME Brett Kennedy											
SAMPLE NO	DATE	TIME	MATRIX	PROJECT NAME/ SAMPLE LOCATION										
13	6/16/08	2001		Joining Stream - upstream		✓				2			1532	
14	1	2010		Lower Williams - hp. culvert						2			1533	
15		2016		Lower Williams - hp - upstream						2			1534	
16		2030		* A1 - Above Dike *						2			1535	
17		2035		* A2 - Below Dike *						2			1536	
18		2100		* Latham - upstream *						2			1537	
19	✓	2110		* Latham - Downstream *		✓				2			1538	
TOTAL NO. OF CONTAINERS														
Relinquished by: (Signature) <i>Brett Kennedy</i>		Date / Time 6/17/08 0815		Received by: (Signature)		Relinquished by: (Signature)		Date / Time		Received by: (Signature)				
Custody Seal No				Custody Seal Present + Intact		Date Required								
Method of Shipment:				Shipped by: (Signature)		Date Completed		Received for Laboratory by: (Signature) <i>Heastaking</i>		Date / Time 6/18/08				

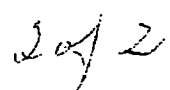


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CHAIN OF CUSTODY RECORD

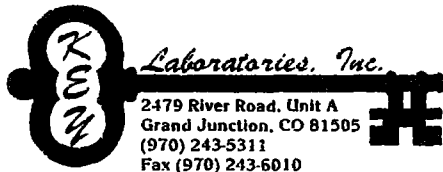
0618081547

Proj. No. 627-07-16		Company Name				SAMPLE ANALYSES										CONTAINER/SIZE/TYPE	PRESERVATIVES	REMARKS	LABORATORY SAMPLE #		
		Phone # Fax #																			
SAMPLERS: (Signature)						PRINT NAME: Brett															
SAMPLE NO.	DATE	TIME	MATRIX	PROJECT NAME/ SAMPLE LOCATION	BTEX																
1	6-17	09:48		CRK - Ground Shuck	✓												06-1547				
2	6-17	09:50		CRK - 620-1	✓												1548				
3	6-17	10:05		CRK - Mountain Rd. Wet Gull	✓												1549				
4	6-17	10:08		CRK - Trinidad X-ing	✓												1550				
5	6-17	13:20		Latham Upstream Spring	✓												1551				
6	6-17	13:25		Latham Upstream Mid	✓												1552				
7	6-17	13:29		Latham Spring Pond	✓												1553				
8	6-17	13:32		Latham Spring Puck	✓												1554				
9	6-17	13:36		Latham Trough	✓												1555				
10	6-17	13:45		Latham Pump Inside	✓												1556				
11	6-17	14:05		Latham Downstream Spring	✓												1557				
12	6-17	13:40		Latham Pump Out	✓												1558				
TOTAL NO. OF CONTAINERS																					
Relinquished by: (Signature) <i>[Signature]</i>				Date / Time 6-18 2:50		Received by: (Signature)				Relinquished by: (Signature)				Date / Time		Received by: (Signature)					
Custody Seal No.						Custody Seal Present Intact				Date Required											
Method of Shipment:						Shipped by: (Signature)				Date Completed:				Received for Laboratory by: (Signature) <i>[Signature]</i>		Date / Time 6/18/08 14:56					



0618081547

Distribution: Original Accompanies Shipment. Copy to Field Files
Form CC-01-6-92 Rev. 7/97



CHAIN OF CUSTODY RECORD

06180815-4

Proj. No 697-09-16		Company Name Oxy		SAMPLE ANALYSES										CONTAINER/SIZE/TYPE	PRESERVATIVES	REMARKS	LABORATORY SAMPLE #		
Phone # Fax #		PRINT NAME: BRETT																	
SAMPLERS: (Signature)																			
SAMPLE NO	DATE	TIME	MATRIX	PROJECT NAME/ SAMPLE LOCATION															
*6	6-18	1130	Hyd	Latham-Downstream Spring 2	X												08-1541		
*4	6-18	0952	Hyd	CRK - Mtn Rd Waterfall	✓												1542		
*2	6-18	0850		CRK - Ground Shock	✓												1543		
*5	6-18	1006		CRK - Trinidad Xing	✓												1544		
*3	6-18	0945		620-1	✓												1545		
*1	6-18	0840		CRK - 3 miles South	✓												1546		
TOTAL NO. OF CONTAINERS																			
Relinquished by: (Signature)		Date / Time		Received by: (Signature)		Relinquished by: (Signature)		Date / Time		Received by: (Signature)									
[Signature]		6-18 2:50																	
Custody Seal No.				Custody Seal Present - Intact				Date Required											
Method of Shipment:				Shipped by: (Signature)				Date Completed				Received for Laboratory by: (Signature)				Date / Time			
												[Signature]				6/18/08 1450			



Colorado Department
of Public Health
and Environment

Laboratory and Radiation Services Division
8100 Lowry Boulevard, Denver, CO 80230-6928
US Mail: PO Box 17123, Denver, CO 80217
(303) 692-3090 fax (303) 344-9989

REQUEST FOR ANALYTICAL SERVICES

Collection No:

--	--	--	--	--	--	--	--	--	--

CUSTOMER

CustomerID : WP027890
Name : Hernandez, Alonzo
Address : 467 Chatfield Ln
City/St/Zip : Grand Junction CO 81504
Phone : 970-985-6055
Contact :
Contact Phone :

SPECIMEN INFORMATION

Collected:

--	--	--	--	--	--

 Time

--	--	--	--

☐ a.m. ☐ p.m.
month day year hour min
Received:

--	--	--	--	--	--

 Time

--	--	--	--

☐ a.m. ☐ p.m.
month day year hour min
Collected by: _____ Water Type: _____

SAMPLE SITE

PWS ID : CO0

--	--	--	--	--	--	--	--

Name : _____
Address : _____
City _____ County _____ State _____ Zip _____
Description : _____
Location _____ Source _____ Point of location _____

COMMENTS

Purpose: ☐ Routine ☐ Special Purpose ☐ Repeat
Chlorine residual:

--	--

 mg/L Temp., Water

--	--

 °C
Temperature at Receipt: _____
Comments: _____

TEST ORDER (Check appropriate box):

CHEMISTRY-INORGANIC

- | | | |
|---|---|---|
| <input type="checkbox"/> Alkalinity, Phenolphthalein | <input type="checkbox"/> ICP Scan | <input type="checkbox"/> Solids, Total |
| <input checked="" type="checkbox"/> Alkalinity, Total | <input type="checkbox"/> Lead | <input checked="" type="checkbox"/> Sulfate |
| <input type="checkbox"/> Aluminum | <input type="checkbox"/> Lithium | <input type="checkbox"/> Thallium |
| <input type="checkbox"/> Antimony | <input checked="" type="checkbox"/> Magnesium | <input type="checkbox"/> Uranium |
| <input checked="" type="checkbox"/> Arsenic | <input type="checkbox"/> Manganese | <input type="checkbox"/> Zinc |
| <input checked="" type="checkbox"/> Barium | <input type="checkbox"/> Mandatory (Phase I, II, V) | <input type="checkbox"/> Other: _____ |
| <input type="checkbox"/> Beryllium | <input type="checkbox"/> Mercury | |
| <input type="checkbox"/> BOD | <input type="checkbox"/> Molybdenum | |
| <input type="checkbox"/> BOD, Carbonaceous | <input type="checkbox"/> Nickel | |
| <input type="checkbox"/> Boron | <input type="checkbox"/> Automated Ammonia | |
| <input type="checkbox"/> Cadmium | <input type="checkbox"/> Nitrogen, Kjeldahl | |
| <input checked="" type="checkbox"/> Calcium (Carbonate) | <input type="checkbox"/> Nitrogen, Total | |
| <input checked="" type="checkbox"/> Chloride | <input type="checkbox"/> Nitrogen, Nitrate/Nitrite | |
| <input type="checkbox"/> Chlorine, Total residual | <input type="checkbox"/> Nitrogen, Nitrite | |
| <input checked="" type="checkbox"/> Chromium | <input type="checkbox"/> Nitrogen, Nitrate | |
| <input type="checkbox"/> Conductivity | <input checked="" type="checkbox"/> pH | |
| <input type="checkbox"/> Copper | <input type="checkbox"/> Phosphate, Ortho | |
| <input type="checkbox"/> Corrosivity (Langlier) | <input type="checkbox"/> Phosphate, Total | |
| <input type="checkbox"/> Cyanide, Distilled | <input type="checkbox"/> Potassium | |
| <input type="checkbox"/> Cyanide, Direct | <input type="checkbox"/> Selenium | |
| <input type="checkbox"/> Cyanide, WAD | <input type="checkbox"/> Silicon (silicates) | |
| <input checked="" type="checkbox"/> Fluoride | <input type="checkbox"/> Silver | |
| <input type="checkbox"/> Hardness total | <input checked="" type="checkbox"/> Sodium | |
| <input type="checkbox"/> Heavy Metals | <input checked="" type="checkbox"/> Solids, Dissolved | |
| <input type="checkbox"/> Iron | <input type="checkbox"/> Solids, Suspended | |

NEW PACKAGE
"BASELINE
DRILLING
PACKAGE"
PER LAURE

CHEMISTRY-ORGANIC

- ☐ Phase 1, 2, 5
☐ VOC (Regulated)
☐ SOC (Regulated)
☐ DBP (Regulated)
☒ VOC (Screen)
☐ SVOC (Screen)
☐ HEM (Oil & Grease)
☐ THM
☐ BTEX
☐ TOC
☐ Other: _____
☐ Other: _____
☐ Other: _____
☐ Other: _____
☐ Other: _____
☐ Other: _____

MICROBIOLOGY

- ☐ Total Coliforms, PA
☐ Total Coliforms, MTF
☐ Fecal Coliforms, MTF
☐ E.Coli., MPN
☐ Heterotrophic Plate Count
☐ Pseudomonas Culture
☐ Other: _____
☐ Other: _____

RADIOCHEMISTRY

- ☐ Alpha/Beta, Gross
☐ Americium
☐ Gamma Spectrometry, Nuclide Specific
☐ Plutonium
☐ Radium 226
☐ Radium 228
☐ Radon
☐ Thorium
☐ Uranium
☐ Leak Test
☐ Alpha/Beta, Gross
☐ Carbon-14
☐ Ni-63
☐ H-3

☐ Other: _____
☐ Other: _____

CPD

- ☐ VOC
☐ Fat + Preservatives In Meat
☐ Water Activity
☐ Other: _____

DISPOSITION

CHAIN OF CUSTODY

RELINQUISHED BY:	DATE / TIME	RECEIVED BY:	DATE / TIME
RELINQUISHED BY:	DATE / TIME	RECEIVED BY:	DATE / TIME
RELINQUISHED BY:	DATE / TIME	RECEIVED BY:	DATE / TIME



CHAIN OF CUSTODY RECORD

0628251644

Proj. No. 061908		Company Name Day 970-201-2305		SAMPLE ANALYSES		CONTAINER/SIZE/TYPE	PRESERVATIVES	REMARKS	LABORATORY SAMPLE #
Phone # 970-243-2525		Fax # ATTN: John O'Connell							
SAMPLERS: (Signature) Brett Kennedy		PRINT NAME: Brett Kennedy							
SAMPLE NO.	DATE	TIME	MATRIX	PROJECT NAME/ SAMPLE LOCATION	List	BTEX	2270	248260	6R0
0619-01	6/19/08	1430	H ₂ O	605-01 W	✓	✓	✓	✓	✓
0619-02	↓	1700	↓	Severe 2 upstream	✓	✓	✓	✓	✓
0619-03	↓	1741	↓	Swamp	✓	✓	✓	✓	✓
0619-04	↓	1756	↓	Crk by Swamp	✓	✓	✓	✓	✓
0619-05	↓	1800	↓	Tri6-SW	✓	✓	✓	✓	✓
0619-06	6/19	1845	H ₂ O	?	✓	✓	✓	✓	✓
					TOTAL NO. OF CONTAINERS				
Relinquished by (Signature) Brett Kennedy		Date / Time 6/20/08 1435		Received by (Signature)		Relinquished by (Signature)		Date / Time	
Custody Seal No.		Custody Seal Present Intact		Date Required		Received for Laboratory by (Signature) Brett Kennedy		Date / Time 6/20/08 1435	
Method of Shipment:		Shipped by: (Signature)		Date Completed.					



Colorado Department
of Public Health
and Environment

Laboratory and Radiation Services Division
8100 Lowry Boulevard, Denver, CO 80230-6928
US Mail: PO Box 17123, Denver, CO 80217
(303) 692-3090 fax (303) 344-9989

Collection No:

REQUEST FOR ANALYTICAL SERVICES

CUSTOMER

CustomerID: WP027890
Name: Hernandez, Alonzo
Address: 467 Chatfield Ln
City/ST/Zip: Grand Junction CO 81504
Phone: 970-985-6055
Contact:
Contact Phone:

SPECIMEN INFORMATION

Collected: - - Time : ☐ a.m. ☐ p.m.
month day year hour min
Received: - - Time : ☐ a.m. ☐ p.m.
month day year hour min
Collected by: _____ Water Type: _____

SAMPLE SITE

PWS ID: CO0 -
Name: _____
Address: _____
City: _____ County: _____ State: _____ Zip: _____
Description: _____
Location: _____ Source: _____ Point of location: _____

COMMENTS

Purpose: ☐ Routine ☐ Special Purpose ☐ Repeat
Chlorine residual: mg/L Temp., Water: °C
Temperature at Receipt: _____
Comments: _____

TEST ORDER (Check appropriate box):

CHEMISTRY-INORGANIC

- | | | |
|---|---|---|
| <input type="checkbox"/> Alkalinity, Phenolphthalein | <input type="checkbox"/> ICP Scan | <input type="checkbox"/> Solids, Total |
| <input checked="" type="checkbox"/> Alkalinity, Total | <input type="checkbox"/> Lead | <input checked="" type="checkbox"/> Sulfate |
| <input type="checkbox"/> Aluminum | <input type="checkbox"/> Lithium | <input type="checkbox"/> Thallium |
| <input type="checkbox"/> Antimony | <input checked="" type="checkbox"/> Magnesium | <input type="checkbox"/> Uranium |
| <input checked="" type="checkbox"/> Arsenic | <input type="checkbox"/> Manganese | <input type="checkbox"/> Zinc |
| <input checked="" type="checkbox"/> Barium | <input type="checkbox"/> Mandatory (Phase I, II, V) | <input type="checkbox"/> Other: _____ |
| <input type="checkbox"/> Beryllium | <input type="checkbox"/> Mercury | |
| <input type="checkbox"/> BOD | <input type="checkbox"/> Molybdenum | |
| <input type="checkbox"/> BOD, Carbonaceous | <input type="checkbox"/> Nickel | |
| <input type="checkbox"/> Boron | <input type="checkbox"/> Automated Ammonia | |
| <input type="checkbox"/> Cadmium | <input type="checkbox"/> Nitrogen, Kjeldahl | |
| <input checked="" type="checkbox"/> Calcium (Carbonate) | <input type="checkbox"/> Nitrogen, Total | |
| <input checked="" type="checkbox"/> Chloride | <input type="checkbox"/> Nitrogen, Nitrate/Nitrite | |
| <input type="checkbox"/> Chlorine, Total residual | <input type="checkbox"/> Nitrogen, Nitrite | |
| <input checked="" type="checkbox"/> Chromium | <input type="checkbox"/> Nitrogen, Nitrate | |
| <input type="checkbox"/> Conductivity | <input checked="" type="checkbox"/> pH | |
| <input type="checkbox"/> Copper | <input type="checkbox"/> Phosphate, Ortho | |
| <input type="checkbox"/> Corrosivity (Langlier) | <input type="checkbox"/> Phosphate, Total | |
| <input type="checkbox"/> Cyanide, Distilled | <input type="checkbox"/> Potassium | |
| <input type="checkbox"/> Cyanide, Direct | <input type="checkbox"/> Selenium | |
| <input type="checkbox"/> Cyanide, WAD | <input type="checkbox"/> Silicon (silicates) | |
| <input checked="" type="checkbox"/> Fluoride | <input type="checkbox"/> Silver | |
| <input type="checkbox"/> Hardness total | <input checked="" type="checkbox"/> Sodium | |
| <input type="checkbox"/> Heavy Metals | <input checked="" type="checkbox"/> Solids, Dissolved | |
| <input type="checkbox"/> Iron | <input type="checkbox"/> Solids, Suspended | |

NEW PACKAGE
"BASELINE
DRILLING
PACKAGE"
PER LAURIE

CHEMISTRY-ORGANIC

- ☐ Phase 1, 2, 5
☐ VOC (Regulated)
☐ SOC (Regulated)
☐ DBP (Regulated)
☒ VOC (Screen)
☐ SVOC (Screen)
☐ HEM (Oil & Grease)
☐ THM
☐ BTEX
☐ TOC
☐ Other: _____
☐ Other: _____
☐ Other: _____
☐ Other: _____
☐ Other: _____
☐ Other: _____

MICROBIOLOGY

- ☐ Total Coliforms, PA
☐ Total Coliforms, MTF
☐ Fecal Coliforms, MTF
☐ E Coli., MPN
☐ Heterotrophic Plate Count
☐ Pseudomonas Culture
☐ Other: _____
☐ Other: _____

RADIOCHEMISTRY

- ☐ Alpha/Beta, Gross
☐ Americium
☐ Gamma Spectrometry, Nuclide Specific
☐ Plutonium
☐ Radium 226
☐ Radium 228
☐ Radon
☐ Thorium
☐ Uranium
☐ Leak Test
☐ Alpha/Beta, Gross
☐ Carbon-14
☐ Ni-63
☐ H-3

☐ Other: _____
☐ Other: _____

CPD

- ☐ VOC
☐ Fat + Preservatives In Meat
☐ Water Activity
☐ Other: _____

DISPOSITION

RELINQUISHED BY:	DATE / TIME	RECEIVED BY:	DATE / TIME
RELINQUISHED BY:	DATE / TIME	RECEIVED BY:	DATE / TIME
RELINQUISHED BY:	DATE / TIME	RECEIVED BY:	DATE / TIME

CHAIN OF CUSTODY

Company Name/Address: Walsh Env.- Grand Junction / <i>Oxy</i> 535 Grand Avenue Grand Junction, CO 81501			Alternate billing information:			Analysis/Container/Preservative			Chain of Custody Page 1 of 2								
Report to: <i>Brett Kennedy</i>			Email to: <i>brett-kennedy@oxy.com</i>			<div style="display: flex; justify-content: space-around;"> <div style="writing-mode: vertical-rl; transform: rotate(180deg);">BTX</div> <div style="writing-mode: vertical-rl; transform: rotate(180deg);">TDS</div> <div style="writing-mode: vertical-rl; transform: rotate(180deg);">6RO</div> </div>			Prepared by: ENVIRONMENTAL SCIENCE CORP. 12065 Lebanon Road Mt. Juliet, TN 37122 Phone (615) 758-5858 Phone (800) 767-5859 FAX (615) 758-5859								
Project Description: <i>Latham - Creek</i>			City/State Collected: <i>-</i>						CoCode: WALSHGJC (lab use only) Template/Prelogin: <i>-</i> Shipped Via: <i>-</i>								
Phone: (970) 241-4636 FAX: <i>-</i>		Client Project #: <i>-</i>		ESC Key: <i>-</i>													
Collected by: <i>Brett Kennedy</i>		Site/Facility ID#: <i>-</i>		P.O.#: <i>-</i>													
Collected by (signature): <i>Brett Kennedy</i> Immediately Packed on Ice N <i>-</i> Y <i>✓</i>		Rush? (Lab MUST Be Notified) Same Day.....200% <input checked="" type="checkbox"/> Next Day.....100% Two Day.....50% Three Day.....25%		Date Results Needed: Email? <i>-</i> No <i>-</i> Yes FAX? <i>-</i> No <i>-</i> Yes													
Sample ID		Comp/Grab		Matrix*		Depth		Date		Time		No of Cntrs		Remarks/Contaminant		Sample # (lab only)	
062408-05 <i>Lpstream</i>		6rab		1H2O		3m		06/24/08		0955		3				L351730-01	
062408-06 <i>N Trench</i>										1000						02	
062408-07 <i>N Source</i>										1007						03	
062408-08 <i>Fract</i>										1014						04	
062408-10 <i>Dam 1</i>										1022						04	
062408-11 <i>S Trench</i>										1033						05	
062408-12 <i>S Source</i>										1040						06	
062408-13 <i>Dam 2</i>										1134						07	
062408-14 <i>Creek Confluence</i>		✓		✓		✓		✓		1125		✓				08	

*Matrix: SS - Sol/Solid GW - Groundwater WW - WasteWater DW - Drinking Water OT - Other _____

pH _____ Temp _____

Remarks:

9669 7430 9905

Flow _____ Other _____

Relinquished by: (Signature) <i>Brett Kennedy</i>		Date: <i>06/24/08</i>		Time: <i>1445</i>		Received by: (Signature) 		Samples returned via: <input type="checkbox"/> UPS <input checked="" type="checkbox"/> FedEx <input type="checkbox"/> Courier		Condition: (lab use only) <i>OK</i>	
Relinquished by: (Signature) 		Date:		Time:		Received by: (Signature) 		Temp: <i>34.0c</i>		Bottles Received: <i>27</i>	
Relinquished by: (Signature) 		Date:		Time:		Received for lab by: (Signature) <i>Nick...</i>		Date: <i>6/25/08</i>		Time: <i>0900</i>	
										pH Checked: <i>NCF</i>	

Company Name/Address: Walsh Env.- Grand Junction/ <i>Oxy</i> 535 Grand Avenue Grand Junction, CO 81501				Alternate billing information:				Analysis/Container/Preservative				Chain of Custody Page 2 of 2	
Report to: <i>Brett Kennedy</i>				Email to: <i>brett-kennedy@oxy.com</i>				<div style="display: flex; justify-content: space-around; font-size: 2em;"> BTEx IDS CRD </div>				Prepared by: ENVIRONMENTAL SCIENCE CORP. 12065 Lebanon Road Mt Juliet, TN 37122 Phone (615) 758-5858 Phone (800) 767-5859 FAX (615) 758-5859	
Project Description: <i>Latham - Creek</i>				City/State Collected: <i>—</i>								CoCode: WALSHGJC (lab use only) Template/Prelogin: Shipped Via:	
Phone: (970) 241-4636 FAX:		Client Project #: <i>—</i>		ESC Key: <i>—</i>									
Collected by: <i>Brett Kennedy</i>		Site/Facility ID#: <i>—</i>		P.O.#: <i>—</i>									
Collected by (signature): <i>Brett Kennedy</i> Immediately Packed on Ice N <i>Y</i> <input checked="" type="checkbox"/>		Rush? (Lab MUST Be Notified) <input type="checkbox"/> Same Day.....200% <input type="checkbox"/> Next Day.....100% <input type="checkbox"/> Two Day.....50% <input type="checkbox"/> Three Day.....25%		Date Results Needed: Email? <input type="checkbox"/> No <input type="checkbox"/> Yes FAX? <input type="checkbox"/> No <input type="checkbox"/> Yes		No of Cntrs							
Sample ID		Comp/Grab	Matrix*	Depth	Date	Time					Remarks/Contaminant	Sample # (lab only)	
<i>062408-15 Upstream South Y</i>		<i>grab</i>	<i>H2O</i>	<i>Surf</i>	<i>06/24/08</i>	<i>1121</i>	<i>3</i>	<i>X</i>	<i>X</i>	<i>X</i>		<i>1351930 - A</i>	

*Matrix: SS - Soil/Solid GW - Groundwater WW - WasteWater DW - Drinking Water OT - Other _____

pH _____ Temp _____

Remarks:

Flow _____ Other _____

Relinquished by: (Signature) <i>Brett Kennedy</i>	Date: <i>06/24/08</i>	Time: <i>1445</i>	Received by: (Signature) 	Samples returned via: <input type="checkbox"/> UPS <input checked="" type="checkbox"/> FedEx <input type="checkbox"/> Courier <input type="checkbox"/> _____	Condition: (lab use only) <i>OK</i>
	Relinquished by: (Signature) 	Date:	Time:	Received by: (Signature) 	Temp: <i>3.4°C</i>
Relinquished by: (Signature) 	Date:	Time:	Received for lab by: (Signature) 	Date: <i>6/25/08</i>	Time: <i>0900</i>
				pH Checked:	NCF:

Company Name/Address: Walsh Env.- Grand Junction/ <i>Ody</i> 535 Grand Avenue Grand Junction, CO 81501				Alternate billing information:				Analysis/Container/Preservative				Chain of Custody Page 1 of 1	
Report to: <i>Brett Kennedy</i>				Email to: <i>brett-kennedy@oxy.com</i>				<div style="display: flex; justify-content: space-around; font-weight: bold; font-size: 1.2em;"> BTEX 6RO TDS </div>				Prepared by: <div style="text-align: center;"> ENVIRONMENTAL SCIENCE CORP. 12065 Lebanon Road Mt. Juliet, TN 37122 Phone (615) 758-5858 Phone (800) 767-5859 FAX (615) 758-5859 </div>	
Project Description: <i>Watham 605-01</i>				City/State Collected: <i>—</i>								CoCode: WALSHGJC (lab use only) Template/Program: Shipped Via:	
Phone: (970) 241-4636 FAX: <i>—</i>		Client Project #: <i>—</i>		ESC Key: <i>—</i>									
Collected by: <i>Brett Kennedy</i>		Site/Facility ID#: <i>—</i>		P.O.#: <i>—</i>									
Collected by (signature): <i>Brett Kennedy</i> Immediately Packed on Ice N <i>—</i> Y <i>✓</i>		Rush? (Lab MUST Be Notified) <input type="checkbox"/> Same Day.....200% <input checked="" type="checkbox"/> Next Day.....100% <input type="checkbox"/> Two Day.....50% <input type="checkbox"/> Three Day.....25%		Date Results Needed: Email? <input type="checkbox"/> No <input checked="" type="checkbox"/> Yes FAX? <input checked="" type="checkbox"/> No <input type="checkbox"/> Yes									
Sample ID		Comp/Grab	Matrix*	Depth	Date	Time	No. of Cntrs	Remarks/Contaminant				Sample # (lab only)	
<i>0627-01 Upstream</i>		<i>6ro6</i>	<i>1200</i>	<i>Surface</i>	<i>06/27/08</i>	<i>1448</i>	<i>3</i>	<i>X X X</i>				<i>ES52689-01</i>	
<i>0627-02 N Trench</i>		<i>↓</i>	<i>↓</i>	<i>↓</i>	<i>↓</i>	<i>1455</i>	<i>1</i>	<i>↓ ↓ ↓</i>				<i>02</i>	
<i>0627-03 S Trench</i>		<i>↓</i>	<i>↓</i>	<i>↓</i>	<i>↓</i>	<i>1500</i>	<i>1</i>	<i>↓ ↓ ↓</i>				<i>03</i>	
<i>0627-04 Lower Pit</i>		<i>↓</i>	<i>↓</i>	<i>↓</i>	<i>↓</i>	<i>1508</i>	<i>1</i>	<i>↓ ↓ ↓</i>				<i>04</i>	
<i>0627-05 Downstream</i>		<i>↓</i>	<i>↓</i>	<i>↓</i>	<i>↓</i>	<i>1515</i>	<i>↓</i>	<i>↓ ↓ ↓</i>				<i>05</i>	

*Matrix: **SS** - Soil/Solid **GW** - Groundwater **WW** - WasteWater **DW** - Drinking Water **OT** - Other _____

pH _____ Temp _____

Remarks:

8648 5099 1259

Flow _____ Other _____

Relinquished by: (Signature) <i>[Signature]</i>		Date: <i>06/11/08</i> Time: <i>1205</i>		Received by: (Signature) <i>[Signature]</i>		Samples returned via: <input checked="" type="checkbox"/> UPS <input checked="" type="checkbox"/> FedEx <input type="checkbox"/> Courier <input type="checkbox"/> _____		Condition: <i>OK</i> (lab use only)	
Relinquished by: (Signature) <i>[Signature]</i>		Date: _____ Time: _____		Received by: (Signature) <i>[Signature]</i>		Temp: <i>46°</i> Bottles Received: <i>15</i>		CoC Seals Intact: <input checked="" type="checkbox"/> Y <input type="checkbox"/> N <input type="checkbox"/> NA	
Relinquished by: (Signature) <i>[Signature]</i>		Date: _____ Time: _____		Received for Lab by: (Signature) <i>[Signature]</i>		Date: <i>6-16-08</i> Time: <i>0900</i>		pH Checked: <i>NCF</i>	

Company Name/Address: Walsh Env.- Grand Junction 535 Grand Avenue Grand Junction, CO 81501 <u>Brett Kennedy@oxy.com</u>		Alternate billing information:		Analysis/Container/Preservative				Chain of Custody Page ____ of ____ Prepared by: ENVIRONMENTAL SCIENCE CORP. 12065 Lebanon Road Mt. Juliet, TN 37122 Phone (615) 758-5858 Phone (800) 767-5859 FAX (615) 758-5859			
Report to: <u>Edward Baltzer</u>		Email to: <u>ebaltzer@walshenv.com</u>		6/30/08 7PM LOW FLOW TDS							
Project Description: <u>Well 09-61</u>		City/State Collected:									
Phone: (970) 241-4636 FAX:		Client Project #: <u>7830-160</u>								ESC Key:	
Collected by: <u>Blair K Rollins</u>		Site/Facility ID#:								P.O.#: <u>7830-160</u>	
Collected by (signature): <u>Blair K Rollins</u> Immediately Packed on Ice N <u>Y</u> <input checked="" type="checkbox"/>		<input checked="" type="checkbox"/> Rush? (Lab MUST Be Notified) <input type="checkbox"/> Same Day..... 200% <input checked="" type="checkbox"/> Next Day..... 100% <input type="checkbox"/> Two Day..... 50% <input type="checkbox"/> Three Day..... 25%								Date Results Needed: Email? <u>No</u> <input checked="" type="checkbox"/> Yes FAX? <u>No</u> <input checked="" type="checkbox"/> Yes	
CoCode: WALSHGJC (lab use only) Template/Prelogin Shipped Via:		Remarks/Contaminant		Sample # (lab only)							

Sample ID	Comp/Grab	Matrix*	Depth	Date	Time	No. of Cntrs	TPH	LOW FLOW	TDS	Remarks/Contaminant	Sample # (lab only)
1 - Upstr. Sand bar 063008		SW	NA	6/30/08	0905	3					2552816-01
2 - N. Trench 063008		SW	NA	6/30/08	0915	3					-02
3 - N. Source 063008		SW	NA	6/30/08	0925	3					-03
4 - Trough 063008		SW	NA	6/30/08	0935	3					-04
5 - Latham Cabin pump 063008		SW	NA	6/30/08	0945	3				*HOLD*	*HOLD*
6 - DAM 1 063008		SW	NA	6/30/08	0955	3					-05
7 - S. Trench 063008		SW	NA	6/30/08	1005	3					-06
8 - S. Source 063008		SW	NA	6/30/08	1015	3					-07
9 - DAM 2 063008		SW	NA	6/30/08	1025	3					-08
10 - Creek Confluence 063008		SW	NA	6/30/08	1035	3					-09

*Matrix: SS - Soil/Solid GW - Groundwater WW - WasteWater DW - Drinking Water OT - Other SW - surface water

pH _____ Temp _____

Flow _____ Other _____

Relinquished by: (Signature) <u>Blair K Rollins</u>		Date: <u>6/30/08</u>		Time: <u>1730</u>		Received by: (Signature) <u>FED EX</u>		Samples returned via: <input type="checkbox"/> UPS <input checked="" type="checkbox"/> FedEx <input type="checkbox"/> Courier		Condition: (lab use only): <u>OK</u>	
Relinquished by: (Signature) <u>[Signature]</u>		Date:		Time:		Received by: (Signature) <u>[Signature]</u>		Temp: <u>8.5</u>		Bottles Received: <u>30</u>	
Relinquished by: (Signature) <u>[Signature]</u>		Date:		Time:		Received for lab by: (Signature) <u>[Signature]</u>		Date: <u>7/1/08</u>		Time: <u>09:00</u>	
								pH Checked:		NCF:	

Company Name/Address: Walsh Env.- Grand Junction / <i>Org</i> 535 Grand Avenue Grand Junction, CO 81501				Alternate billing information:				Analysis/Container/Preservative				Chain of Custody Page ____ of ____ Prepared by: ENVIRONMENTAL SCIENCE CORP. 12065 Lebanon Road Mt. Juliet, TN 37122 Phone (615) 758-5858 Phone (800) 767-5859 FAX (615) 758-5859							
Report to: <i>Brett Kennedy</i>				Email to: <i>brett-kennedy@eas.com</i>															
Project Description: <i>Latham</i>				City/State Collected: _____															
Phone: (970) 241-4636				Client Project #: _____				ESC Key: _____											
FAX: _____																			
Collected by: <i>BEN CREINKE</i>				Site/Facility ID#: _____				P.O.#: _____											
Collected by (signature): <i>[Signature]</i> Immediately Packed on Ice N ____ Y <input checked="" type="checkbox"/>				Rush? (Lab MUST Be Notified) ____ Same Day..... 200% ____ Next Day..... 100% ____ Two Day..... 50% ____ Three Day..... 25%				Date Results Needed: Email? <input checked="" type="checkbox"/> No <input checked="" type="checkbox"/> Yes FAX? <input checked="" type="checkbox"/> No <input checked="" type="checkbox"/> Yes				No. of Cntrs <i>BTX 6 RO</i>				CoCode: WALSHGJC (lab use only) Template/Prelogin Shipped Via:			
Sample ID		Comp/Grab	Matrix*	Depth	Date	Time													
0702-08 <i>LATHAM - CATTLE TRAIL</i>		✓	WATER	SURFACE	7/2/08	12:30PM	2	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>										
0702-09 <i>LATHAM - UPSTREAM</i>		✓	WATER	SURFACE	7/2/08	12:45PM	2	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>										
0702-10 <i>LATHAM - DAM 1</i>		✓	WATER	SURFACE	7/2/08	1:00PM	2	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>										
0702-11 <i>LATHAM - S2 SOURCE</i>		✓	WATER	SURFACE	7/2/08	1:15PM	2	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>										

*Matrix: SS - Soil/Solid GW - Groundwater WW - WasteWater DW - Drinking Water OT - Other _____

pH _____ Temp _____

Remarks:

Flow _____ Other _____

Relinquished by: (Signature) <i>[Signature]</i>		Date: <i>07/02/08</i>	Time: <i>5:30PM</i>	Received by: (Signature) <i>[Signature]</i>		Samples returned via: <input checked="" type="checkbox"/> UPS <input checked="" type="checkbox"/> FedEx <input type="checkbox"/> Courier		Condition: (lab use only)	
Relinquished by: (Signature) <i>[Signature]</i>		Date:	Time:	Received by: (Signature) <i>[Signature]</i>		Temp: <i>4.0</i>	Bottles Received: <i>2</i>	CoC Seals Intact: Y ____ N ____ NA ____	
Relinquished by: (Signature) <i>[Signature]</i>		Date:	Time:	Received for lab by: (Signature) <i>[Signature]</i>		Date: <i>7-3-08</i>	Time: <i>0500</i>	pH Checked: NCF: <input checked="" type="checkbox"/>	



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Fax (615) 758-5859

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Est. 1970

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue

Grand Junction, CO 81501

Report Summary

Thursday June 26, 2008

Report Number: L351930

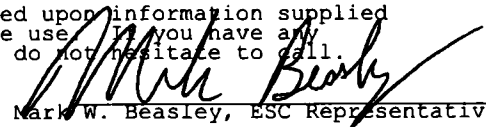
Samples Received: 06/25/08

Client Project:

Description: Latham Creek

The analytical results in this report are based upon information supplied by you, the client, and are for your exclusive use. If you have any questions regarding this data package, please do not hesitate to call.

Entire Report Reviewed By:


Mark W. Beasley, ESC Representative

Laboratory Certification Numbers

A2LA - 1461-01, AIHA - 09227, AL - 40660, CA - I-2327, CT - PH-0197, FL - E87487
GA - 923, IN - C-TN-01, KY - 90010, KYUST - 0016, NC - ENV375, DW21704, ND - R-140
NJ - TN002, SC - 84004, TN - 2006, VA - 00109, WV - 233
AZ - 0612, MN - 047-999-395, NY - 11742, WI - 998093910

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9 Samples Reported: 06/26/08 13:22 Printed: 06/26/08 13:22

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

June 26, 2008

Date Received : June 25, 2008
Description : Latham Creek
Sample ID : 062408-05 UPSTREAM
Collected By : Brett Kennedy
Collection Date : 06/24/08 09:55

ESC Sample # : L351930-01

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	340	10.	mg/l	2540C	06/26/08	1
Benzene	0.0060	0.00050	mg/l	8021/8015	06/25/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	06/25/08	1
Ethylbenzene	0.0019	0.00050	mg/l	8021/8015	06/25/08	1
Total Xylene	0.016	0.0015	mg/l	8021/8015	06/25/08	1
TPH (GC/FID) Low Fraction	0.50	0.10	mg/l	GRO	06/25/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	93.0		% Rec.	8021/8015	06/25/08	1
a,a,a-Trifluorotoluene(PID)	102.		% Rec.	8021/8015	06/25/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

June 26, 2008

Date Received : June 25, 2008
Description : Latham Creek

Sample ID : 062408-06 N TRENCH

Collected By : Brett Kennedy
Collection Date : 06/24/08 10:00

ESC Sample # : L351930-02

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	470	10.	mg/l	2540C	06/26/08	1
Benzene	1.6	0.25	mg/l	8021/8015	06/25/08	500
Toluene	11.	2.5	mg/l	8021/8015	06/25/08	500
Ethylbenzene	BDL	0.25	mg/l	8021/8015	06/25/08	500
Total Xylene	11.	0.75	mg/l	8021/8015	06/25/08	500
TPH (GC/FID) Low Fraction	BDL	50.	mg/l	GRO	06/25/08	500
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	94.8		% Rec.	8021/8015	06/25/08	500
a,a,a-Trifluorotoluene (PID)	99.7		% Rec.	8021/8015	06/25/08	500

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit (PQL)

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

June 26, 2008

Date Received : June 25, 2008
Description : Latham Creek

Sample ID : 062408-07 N SOURCE

Collected By : Brett Kennedy
Collection Date : 06/24/08 10:07

ESC Sample # : L351930-03

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	360	10.	mg/l	2540C	06/26/08	1
Benzene	0.13	0.00050	mg/l	8021/8015	06/25/08	1
Toluene	0.36	0.0050	mg/l	8021/8015	06/25/08	1
Ethylbenzene	0.0011	0.00050	mg/l	8021/8015	06/25/08	1
Total Xylene	1.6	0.0015	mg/l	8021/8015	06/25/08	1
TPH (GC/FID) Low Fraction	6.5	0.10	mg/l	GRO	06/25/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	91.9		% Rec.	8021/8015	06/25/08	1
a,a,a-Trifluorotoluene(PID)	102.		% Rec.	8021/8015	06/25/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

June 26, 2008

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

Date Received : June 25, 2008
Description : Latham Creek
Sample ID : 062408-10 DAM 1
Collected By : Brett Kennedy
Collection Date : 06/24/08 10:22

ESC Sample # : L351930-04

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	370	10.	mg/l	2540C	06/26/08	1
Benzene	0.11	0.00050	mg/l	8021/8015	06/25/08	1
Toluene	0.49	0.0050	mg/l	8021/8015	06/25/08	1
Ethylbenzene	0.032	0.00050	mg/l	8021/8015	06/25/08	1
Total Xylene	1.0	0.0015	mg/l	8021/8015	06/25/08	1
TPH (GC/FID) Low Fraction	4.0	0.10	mg/l	GRO	06/25/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	95.2		% Rec.	8021/8015	06/25/08	1
a,a,a-Trifluorotoluene (PID)	102.		% Rec.	8021/8015	06/25/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit (PQL)

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

June 26, 2008

Date Received : June 25, 2008
Description : Latham Creek
Sample ID : 062408-11 S TRENCH
Collected By : Brett Kennedy
Collection Date : 06/24/08 10:33

ESC Sample # : L351930-05

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	800	10.	mg/l	2540C	06/26/08	1
Benzene	1.2	0.025	mg/l	8021/8015	06/26/08	50
Toluene	3.3	0.25	mg/l	8021/8015	06/26/08	50
Ethylbenzene	0.084	0.025	mg/l	8021/8015	06/26/08	50
Total Xylene	1.5	0.075	mg/l	8021/8015	06/26/08	50
TPH (GC/FID) Low Fraction	11.	5.0	mg/l	GRO	06/26/08	50
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	95.6		% Rec.	8021/8015	06/26/08	50
a,a,a-Trifluorotoluene (PID)	101.		% Rec.	8021/8015	06/26/08	50

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit (PQL)

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REPORT OF ANALYSIS

June 26, 2008

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

Date Received : June 25, 2008
Description : Latham Creek
Sample ID : 062408-12 S SOURCE
Collected By : Brett Kennedy
Collection Date : 06/24/08 10:40

ESC Sample # : L351930-06

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	540	10.	mg/l	2540C	06/26/08	1
Benzene	0.94	0.050	mg/l	8021/8015	06/25/08	100
Toluene	3.0	0.50	mg/l	8021/8015	06/25/08	100
Ethylbenzene	0.071	0.050	mg/l	8021/8015	06/25/08	100
Total Xylene	3.8	0.15	mg/l	8021/8015	06/25/08	100
TPH (GC/FID) Low Fraction	15.	10.	mg/l	GRO	06/25/08	100
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	94.7		% Rec.	8021/8015	06/25/08	100
a,a,a-Trifluorotoluene (PID)	100.		% Rec.	8021/8015	06/25/08	100

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

June 26, 2008

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

Date Received : June 25, 2008
Description : Latham Creek
Sample ID : 062408-13 DAM 2
Collected By : Brett Kennedy
Collection Date : 06/24/08 11:34

ESC Sample # : L351930-07

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	1300	10.	mg/l	2540C	06/26/08	1
Benzene	0.0011	0.00050	mg/l	8021/8015	06/25/08	1
Toluene	0.0056	0.0050	mg/l	8021/8015	06/25/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	06/25/08	1
Total Xylene	0.016	0.0015	mg/l	8021/8015	06/25/08	1
TPH (GC/FID) Low Fraction	0.13	0.10	mg/l	GRO	06/25/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	94.8		% Rec.	8021/8015	06/25/08	1
a,a,a-Trifluorotoluene (PID)	100.		% Rec.	8021/8015	06/25/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit (PQL)

Note:

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Reported: 06/26/08 13:22 Printed: 06/26/08 13:22



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REPORT OF ANALYSIS

June 26, 2008

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

Date Received : June 25, 2008
Description : Latham Creek
Sample ID : 062408-14 CREEK CONFLUENCE
Collected By : Brett Kennedy
Collection Date : 06/24/08 11:25

ESC Sample # : L351930-08

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	350	10.	mg/l	2540C	06/26/08	1
Benzene	BDL	0.00050	mg/l	8021/8015	06/25/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	06/25/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	06/25/08	1
Total Xylene	0.0024	0.0015	mg/l	8021/8015	06/25/08	1
TPH (GC/FID) Low Fraction	BDL	0.10	mg/l	GRO	06/25/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	94.6		% Rec.	8021/8015	06/25/08	1
a,a,a-Trifluorotoluene(PID)	101.		% Rec.	8021/8015	06/25/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

June 26, 2008

Date Received : June 25, 2008
Description : Latham Creek
Sample ID : 062408-15 UPSTREAM SOUTH Y
Collected By : Brett Kennedy
Collection Date : 06/24/08 11:21

ESC Sample # : L351930-09

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	340	10.	mg/l	2540C	06/26/08	1
Benzene	BDL	0.00050	mg/l	8021/8015	06/25/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	06/25/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	06/25/08	1
Total Xylene	BDL	0.0015	mg/l	8021/8015	06/25/08	1
TPH (GC/FID) Low Fraction	BDL	0.10	mg/l	GRO	06/25/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	94.7		% Rec.	8021/8015	06/25/08	1
a,a,a-Trifluorotoluene (PID)	100.		% Rec.	8021/8015	06/25/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit (PQL)

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Attachment A
List of Analytes with QC Qualifiers

Sample #	Analyte	Qualifier
L351930-03	Toluene	E
	Total Xylene	E
L351930-04	Toluene	E
	Total Xylene	E

Attachment B
Explanation of QC Qualifier Codes

Qualifier	Meaning
E	GTL (EPA) - Greater than upper calibration limit: Actual value is known to be greater than the upper calibration range.

Qualifier Report Information

ESC utilizes sample and result qualifiers as set forth by the EPA Contract Laboratory Program and as required by most certifying bodies including NELAC. In addition to the EPA qualifiers adopted by ESC, we have implemented ESC qualifiers to provide more information pertaining to our analytical results. Each qualifier is designated in the qualifier explanation as either EPA or ESC. Data qualifiers are intended to provide the ESC client with more detailed information concerning the potential bias of reported data. Because of the wide range of constituents and variety of matrices incorporated by most EPA methods, it is common for some compounds to fall outside of established ranges. These exceptions are evaluated and all reported data is valid and useable unless qualified as 'R' (Rejected).

Definitions

- Accuracy - The relationship of the observed value of a known sample to the true value of a known sample. Represented by percent recovery and relevant to samples such as: control samples, matrix spike recoveries, surrogate recoveries, etc.
- Precision - The agreement between a set of samples or between duplicate samples. Relates to how close together the results are and is represented by Relative Percent Difference.
- Surrogate - Organic compounds that are similar in chemical composition, extraction, and chromatography to analytes of interest. The surrogates are used to determine the probable response of the group of analytes that are chemically related to the surrogate compound. Surrogates are added to the sample and carried through all stages of preparation and analyses.
- TIC - Tentatively Identified Compound: Compounds detected in samples that are not target compounds, internal standards, system monitoring compounds, or surrogates.

Summary of Remarks For Samples Printed
06/26/08 at 13:22:44

TSR Signing Reports: 134
R2 - Rush: Next Day

Sample: L351930-01 Account: WALSHGJCO Received: 06/25/08 09:00 Due Date: 06/26/08 00:00 RPT Date: 06/26/08 13:22
Sample: L351930-02 Account: WALSHGJCO Received: 06/25/08 09:00 Due Date: 06/26/08 00:00 RPT Date: 06/26/08 13:22
Sample: L351930-03 Account: WALSHGJCO Received: 06/25/08 09:00 Due Date: 06/26/08 00:00 RPT Date: 06/26/08 13:22
Sample: L351930-04 Account: WALSHGJCO Received: 06/25/08 09:00 Due Date: 06/26/08 00:00 RPT Date: 06/26/08 13:22
Sample: L351930-05 Account: WALSHGJCO Received: 06/25/08 09:00 Due Date: 06/26/08 00:00 RPT Date: 06/26/08 13:22
Sample: L351930-06 Account: WALSHGJCO Received: 06/25/08 09:00 Due Date: 06/26/08 00:00 RPT Date: 06/26/08 13:22
Sample: L351930-07 Account: WALSHGJCO Received: 06/25/08 09:00 Due Date: 06/26/08 00:00 RPT Date: 06/26/08 13:22
Sample: L351930-08 Account: WALSHGJCO Received: 06/25/08 09:00 Due Date: 06/26/08 00:00 RPT Date: 06/26/08 13:22
Sample: L351930-09 Account: WALSHGJCO Received: 06/25/08 09:00 Due Date: 06/26/08 00:00 RPT Date: 06/26/08 13:22



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Est. 1970

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue

Grand Junction, CO 81501

Report Summary

Thursday June 26, 2008

Report Number: L351933

Samples Received: 06/25/08

Client Project:

Description: 605-01

The analytical results in this report are based upon information supplied by you, the client, and are for your exclusive use. If you have any questions regarding this data package, please do not hesitate to call.

Entire Report Reviewed By:


Mark W. Beasley, ESC Representative

Laboratory Certification Numbers

A2LA - 1461-01, AIHA - 09227, AL - 40660, CA - I-2327, CT - PH-0197, FL - E87487
GA - 923, IN - C-TN-01, KY - 90010, KYUST - 0016, NC - ENV375, DW21704, ND - R-140
NJ - TN002, SC - 84004, TN - 2006, VA - 00109, WV - 233
AZ - 0612, MN - 047-999-395, NY - 11742, WI - 998093910

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4 Samples Reported: 06/26/08 13:22 Printed: 06/26/08 13:22

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REPORT OF ANALYSIS

June 26, 2008

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

Date Received : June 25, 2008
Description : 605-01
Sample ID : 062408-01 605-01 UPS
Collected By : Brett Kennedy
Collection Date : 06/24/08 08:25

ESC Sample # : L351933-01

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	600	10.	mg/l	2540C	06/26/08	1
Benzene	BDL	0.00050	mg/l	8021/8015	06/25/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	06/25/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	06/25/08	1
Total Xylene	BDL	0.0015	mg/l	8021/8015	06/25/08	1
TPH (GC/FID) Low Fraction	BDL	0.10	mg/l	GRO	06/25/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	94.7		% Rec.	8021/8015	06/25/08	1
a,a,a-Trifluorotoluene (PID)	101.		% Rec.	8021/8015	06/25/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit (PQL)

Note:

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

June 26, 2008

Date Received : June 25, 2008
Description : 605-01
Sample ID : 062408-02 605-01 N S
Collected By : Brett Kennedy
Collection Date : 06/24/08 08:35

ESC Sample # : L351933-02

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	570	10.	mg/l	2540C	06/26/08	1
Benzene	0.036	0.00050	mg/l	8021/8015	06/25/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	06/25/08	1
Ethylbenzene	0.0084	0.00050	mg/l	8021/8015	06/25/08	1
Total Xylene	0.26	0.0015	mg/l	8021/8015	06/25/08	1
TPH (GC/FID) Low Fraction	2.0	0.10	mg/l	GRO	06/25/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	92.6		% Rec.	8021/8015	06/25/08	1
a,a,a-Trifluorotoluene (PID)	102.		% Rec.	8021/8015	06/25/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit (PQL)

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

June 26, 2008

Date Received : June 25, 2008
Description : 605-01
Sample ID : 062408-03 605-01 S S
Collected By : Brett Kennedy
Collection Date : 06/24/08 08:44

ESC Sample # : L351933-03

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	690	10.	mg/l	2540C	06/26/08	1
Benzene	0.064	0.00050	mg/l	8021/8015	06/26/08	1
Toluene	0.028	0.0050	mg/l	8021/8015	06/26/08	1
Ethylbenzene	0.0023	0.00050	mg/l	8021/8015	06/26/08	1
Total Xylene	0.94	0.0015	mg/l	8021/8015	06/26/08	1
TPH (GC/FID) Low Fraction	2.8	0.10	mg/l	GRO	06/26/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	93.7		% Rec.	8021/8015	06/26/08	1
a,a,a-Trifluorotoluene (PID)	102.		% Rec.	8021/8015	06/26/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

June 26, 2008

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

Date Received : June 25, 2008
Description : 605-01

Sample ID : 062408-04 605-01 DOW

Collected By : Brett Kennedy
Collection Date : 06/24/08 08:54

ESC Sample # : L351933-04

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	720	10.	mg/l	2540C	06/26/08	1
Benzene	0.0032	0.00050	mg/l	8021/8015	06/26/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	06/26/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	06/26/08	1
Total Xylene	0.019	0.0015	mg/l	8021/8015	06/26/08	1
TPH (GC/FID) Low Fraction	0.23	0.10	mg/l	GRO	06/26/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	94.4		% Rec.	8021/8015	06/26/08	1
a,a,a-Trifluorotoluene(PID)	99.7		% Rec.	8021/8015	06/26/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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Attachment A
List of Analytes with QC Qualifiers

Sample #	Analyte	Qualifier
L351933-03	Total Xylene	E

Attachment B
Explanation of QC Qualifier Codes

Qualifier	Meaning
E	GTL (EPA) - Greater than upper calibration limit: Actual value is known to be greater than the upper calibration range.

Qualifier Report Information

ESC utilizes sample and result qualifiers as set forth by the EPA Contract Laboratory Program and as required by most certifying bodies including NELAC. In addition to the EPA qualifiers adopted by ESC, we have implemented ESC qualifiers to provide more information pertaining to our analytical results. Each qualifier is designated in the qualifier explanation as either EPA or ESC. Data qualifiers are intended to provide the ESC client with more detailed information concerning the potential bias of reported data. Because of the wide range of constituents and variety of matrices incorporated by most EPA methods, it is common for some compounds to fall outside of established ranges. These exceptions are evaluated and all reported data is valid and useable unless qualified as 'R' (Rejected).

Definitions

- Accuracy - The relationship of the observed value of a known sample to the true value of a known sample. Represented by percent recovery and relevant to samples such as: control samples, matrix spike recoveries, surrogate recoveries, etc.
- Precision - The agreement between a set of samples or between duplicate samples. Relates to how close together the results are and is represented by Relative Percent Difference.
- Surrogate - Organic compounds that are similar in chemical composition, extraction, and chromatography to analytes of interest. The surrogates are used to determine the probable response of the group of analytes that are chemically related to the surrogate compound. Surrogates are added to the sample and carried through all stages of preparation and analyses.
- TIC - Tentatively Identified Compound: Compounds detected in samples that are not target compounds, internal standards, system monitoring compounds, or surrogates.

Summary of Remarks For Samples Printed
06/26/08 at 13:22:35

TSR Signing Reports: 134
R2 - Rush: Next Day

Sample: L351933-01 Account: WALSHGJCO Received: 06/25/08 09:00 Due Date: 06/26/08 00:00 RPT Date: 06/26/08 13:22
Sample: L351933-02 Account: WALSHGJCO Received: 06/25/08 09:00 Due Date: 06/26/08 00:00 RPT Date: 06/26/08 13:22
Sample: L351933-03 Account: WALSHGJCO Received: 06/25/08 09:00 Due Date: 06/26/08 00:00 RPT Date: 06/26/08 13:22
Sample: L351933-04 Account: WALSHGJCO Received: 06/25/08 09:00 Due Date: 06/26/08 00:00 RPT Date: 06/26/08 13:22



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Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue

Grand Junction, CO 81501

Report Summary

Wednesday July 02, 2008

Report Number: L352846

Samples Received: 07/01/08

Client Project: 7830-160

Description: 605-01

The analytical results in this report are based upon information supplied by you, the client, and are for your exclusive use. If you have any questions regarding this data package, please do not hesitate to call.

Entire Report Reviewed By:


Mark W. Beasley, ESC Representative

Laboratory Certification Numbers

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NJ - TN002, SC - 84004, TN - 2006, VA - 00109, WV - 233
AZ - 0612, MN - 047-999-395, NY - 11742, WI - 998093910

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9 Samples Reported: 07/02/08 15:19 Printed: 07/02/08 15:19

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REPORT OF ANALYSIS

July 02, 2008

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

Date Received : July 01, 2008
Description : 605-01
Sample ID : 1-UPSTR. SAND BAR 063008
Collected By : Blair K. Rollins
Collection Date : 06/30/08 09:05

ESC Sample # : L352846-01

Site ID :

Project # : 7830-160

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	350	10.	mg/l	2540C	07/02/08	1
Benzene	0.0024	0.00050	mg/l	8021/8015	07/01/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	07/01/08	1
Ethylbenzene	0.0018	0.00050	mg/l	8021/8015	07/01/08	1
Total Xylene	0.0098	0.0015	mg/l	8021/8015	07/01/08	1
TPH (GC/FID) Low Fraction	0.59	0.10	mg/l	GRO	07/01/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	89.9		% Rec.	8021/8015	07/01/08	1
a,a,a-Trifluorotoluene(PID)	102.		% Rec.	8021/8015	07/01/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 02, 2008

Date Received : July 01, 2008
Description : 605-01

ESC Sample # : L352846-02

Sample ID : 2-N. TRENCH 063008

Site ID :

Collected By : Blair K. Rollins
Collection Date : 06/30/08 09:15

Project # : 7830-160

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	470	10.	mg/l	2540C	07/02/08	1
Benzene	1.2	0.050	mg/l	8021/8015	07/01/08	100
Toluene	8.3	0.50	mg/l	8021/8015	07/01/08	100
Ethylbenzene	0.52	0.050	mg/l	8021/8015	07/01/08	100
Total Xylene	10.	0.15	mg/l	8021/8015	07/01/08	100
TPH (GC/FID) Low Fraction	46.	10.	mg/l	GRO	07/01/08	100
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	94.6		% Rec.	8021/8015	07/01/08	100
a,a,a-Trifluorotoluene (PID)	105.		% Rec.	8021/8015	07/01/08	100

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit (PQL)

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 02, 2008

Date Received : July 01, 2008
Description : 605-01
Sample ID : 3-N. SOURCE 063008
Collected By : Blair K. Rollins
Collection Date : 06/30/08 09:25

ESC Sample # : L352846-03

Site ID :

Project # : 7830-160

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	540	10.	mg/l	2540C	07/02/08	1
Benzene	0.96	0.50	mg/l	8021/8015	07/01/08	1000
Toluene	12.	5.0	mg/l	8021/8015	07/01/08	1000
Ethylbenzene	0.85	0.50	mg/l	8021/8015	07/01/08	1000
Total Xylene	19.	1.5	mg/l	8021/8015	07/01/08	1000
TPH (GC/FID) Low Fraction	150	100	mg/l	GRO	07/01/08	1000
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	95.0		% Rec.	8021/8015	07/01/08	1000
a,a,a-Trifluorotoluene(PID)	104.		% Rec.	8021/8015	07/01/08	1000

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Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 02, 2008

Date Received : July 01, 2008
Description : 605-01

ESC Sample # : L352846-04

Sample ID : 4-TROUGH 063008

Site ID :

Collected By : Blair K. Rollins
Collection Date : 06/30/08 09:35

Project # : 7830-160

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	360	10.	mg/l	2540C	07/02/08	1
Benzene	BDL	0.00050	mg/l	8021/8015	07/02/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	07/02/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	07/02/08	1
Total Xylene	BDL	0.0015	mg/l	8021/8015	07/02/08	1
TPH (GC/FID) Low Fraction	BDL	0.10	mg/l	GRO	07/02/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	93.7		% Rec.	8021/8015	07/02/08	1
a,a,a-Trifluorotoluene(PID)	103.		% Rec.	8021/8015	07/02/08	1

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Det. Limit - Practical Quantitation Limit (PQL)

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 02, 2008

Date Received : July 01, 2008
Description : 605-01

ESC Sample # : L352846-06

Sample ID : 7. S. TRENCH 063008

Site ID :

Collected By : Blair K. Rollins
Collection Date : 06/30/08 10:05

Project # : 7830-160

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	790	10.	mg/l	2540C	07/02/08	1
Benzene	1.6	0.050	mg/l	8021/8015	07/01/08	100
Toluene	5.8	0.50	mg/l	8021/8015	07/01/08	100
Ethylbenzene	0.16	0.050	mg/l	8021/8015	07/01/08	100
Total Xylene	5.3	0.15	mg/l	8021/8015	07/01/08	100
TPH (GC/FID) Low Fraction	27.	10.	mg/l	GRO	07/01/08	100
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	94.1		% Rec.	8021/8015	07/01/08	100
a,a,a-Trifluorotoluene(PID)	104.		% Rec.	8021/8015	07/01/08	100

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Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 02, 2008

Date Received : July 01, 2008
Description : 605-01

ESC Sample # : L352846-07

Sample ID : 8. S. SOURCE 063008

Site ID :

Collected By : Blair K. Rollins
Collection Date : 06/30/08 10:15

Project # : 7830-160

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	640	10.	mg/l	2540C	07/02/08	1
Benzene	1.3	0.0050	mg/l	8021/8015	07/01/08	10
Toluene	6.0	0.050	mg/l	8021/8015	07/01/08	10
Ethylbenzene	0.14	0.0050	mg/l	8021/8015	07/01/08	10
Total Xylene	6.0	0.015	mg/l	8021/8015	07/01/08	10
TPH (GC/FID) Low Fraction	30.	1.0	mg/l	GRO	07/01/08	10
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	89.4		% Rec.	8021/8015	07/01/08	10
a,a,a-Trifluorotoluene(PID)	103.		% Rec.	8021/8015	07/01/08	10

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 02, 2008

Date Received : July 01, 2008
Description : 605-01

ESC Sample # : L352846-08

Sample ID : 9. DAM 2 063008

Site ID :

Collected By : Blair K. Rollins
Collection Date : 06/30/08 10:25

Project # : 7830-160

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	890	10.	mg/l	2540C	07/02/08	1
Benzene	BDL	0.00050	mg/l	8021/8015	07/02/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	07/02/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	07/02/08	1
Total Xylene	BDL	0.0015	mg/l	8021/8015	07/02/08	1
TPH (GC/FID) Low Fraction	BDL	0.10	mg/l	GRO	07/02/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	93.7		% Rec.	8021/8015	07/02/08	1
a,a,a-Trifluorotoluene(PID)	103.		% Rec.	8021/8015	07/02/08	1

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 02, 2008

Date Received : July 01, 2008
Description : 605-01
Sample ID : 10. CREEK CONFL 063008
Collected By : Blair K. Rollins
Collection Date : 06/30/08 10:35

ESC Sample # : L352846-09

Site ID :

Project # : 7830-160

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Dissolved Solids	370	10.	mg/l	2540C	07/02/08	1
Benzene	BDL	0.00050	mg/l	8021/8015	07/02/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	07/02/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	07/02/08	1
Total Xylene	BDL	0.0015	mg/l	8021/8015	07/02/08	1
TPH (GC/FID) Low Fraction	BDL	0.10	mg/l	GRO	07/02/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	93.8		% Rec.	8021/8015	07/02/08	1
a,a,a-Trifluorotoluene(PID)	103.		% Rec.	8021/8015	07/02/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

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Reported: 07/02/08 15:19 Printed: 07/02/08 15:20

Attachment A
List of Analytes with QC Qualifiers

Sample #	Analyte	Qualifier
L352846-07	Toluene	E
	Total Xylene	E

Attachment B
Explanation of QC Qualifier Codes

Qualifier	Meaning
E	GTL (EPA) - Greater than upper calibration limit: Actual value is known to be greater than the upper calibration range.

Qualifier Report Information

ESC utilizes sample and result qualifiers as set forth by the EPA Contract Laboratory Program and as required by most certifying bodies including NELAC. In addition to the EPA qualifiers adopted by ESC, we have implemented ESC qualifiers to provide more information pertaining to our analytical results. Each qualifier is designated in the qualifier explanation as either EPA or ESC. Data qualifiers are intended to provide the ESC client with more detailed information concerning the potential bias of reported data. Because of the wide range of constituents and variety of matrices incorporated by most EPA methods, it is common for some compounds to fall outside of established ranges. These exceptions are evaluated and all reported data is valid and useable unless qualified as 'R' (Rejected).

Definitions

- Accuracy - The relationship of the observed value of a known sample to the true value of a known sample. Represented by percent recovery and relevant to samples such as: control samples, matrix spike recoveries, surrogate recoveries, etc.
- Precision - The agreement between a set of samples or between duplicate samples. Relates to how close together the results are and is represented by Relative Percent Difference.
- Surrogate - Organic compounds that are similar in chemical composition, extraction, and chromatography to analytes of interest. The surrogates are used to determine the probable response of the group of analytes that are chemically related to the surrogate compound. Surrogates are added to the sample and carried through all stages of preparation and analyses.
- TIC - Tentatively Identified Compound: Compounds detected in samples that are not target compounds, internal standards, system monitoring compounds, or surrogates.

Summary of Remarks For Samples Printed
07/02/08 at 15:20:05

TSR Signing Reports: 134
R2 - Rush: Next Day

Sample: L352846-01 Account: WALSHGJCO Received: 07/01/08 09:00 Due Date: 07/02/08 00:00 RPT Date: 07/02/08 15:19
Sample: L352846-02 Account: WALSHGJCO Received: 07/01/08 09:00 Due Date: 07/02/08 00:00 RPT Date: 07/02/08 15:19
Sample: L352846-03 Account: WALSHGJCO Received: 07/01/08 09:00 Due Date: 07/02/08 00:00 RPT Date: 07/02/08 15:19
Sample: L352846-04 Account: WALSHGJCO Received: 07/01/08 09:00 Due Date: 07/02/08 00:00 RPT Date: 07/02/08 15:19
Sample: L352846-05 Account: WALSHGJCO Received: 07/01/08 09:00 Due Date: 07/02/08 00:00 RPT Date: 07/02/08 15:19
Sample: L352846-06 Account: WALSHGJCO Received: 07/01/08 09:00 Due Date: 07/02/08 00:00 RPT Date: 07/02/08 15:19
Sample: L352846-07 Account: WALSHGJCO Received: 07/01/08 09:00 Due Date: 07/02/08 00:00 RPT Date: 07/02/08 15:19
Sample: L352846-08 Account: WALSHGJCO Received: 07/01/08 09:00 Due Date: 07/02/08 00:00 RPT Date: 07/02/08 15:19
Sample: L352846-09 Account: WALSHGJCO Received: 07/01/08 09:00 Due Date: 07/02/08 00:00 RPT Date: 07/02/08 15:19



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Est. 1970

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue

Grand Junction, CO 81501

Report Summary

Monday July 07, 2008

Report Number: L353462

Samples Received: 07/03/08

Client Project:

Description: 605-01

The analytical results in this report are based upon information supplied by you, the client, and are for your exclusive use. If you have any questions regarding this data package, please do not hesitate to call.

Entire Report Reviewed By:


Mark W. Beasley, ESC Representative

Laboratory Certification Numbers

A2LA - 1461-01, AIHA - 09227, AL - 40660, CA - I-2327, CT - PH-0197, FL - E87487
GA - 923, IN - C-TN-01, KY - 90010, KYUST - 0016, NC - ENV375, DW21704, ND - R-140
NJ - TN002, SC - 84004, TN - 2006, VA - 00109, WV - 233
AZ - 0612, MN - 047-999-395, NY - 11742, WI - 998093910

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11 Samples Reported: 07/07/08 16:54 Printed: 07/07/08 16:55

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REPORT OF ANALYSIS

July 07, 2008

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

Date Received : July 03, 2008
Description : 605-01

Sample ID : 01 605-01-UPSTREAM

Collected By : Ben Greinke
Collection Date : 07/02/08 09:00

ESC Sample # : L353462-01

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Benzene	BDL	0.00050	mg/l	8021/8015	07/05/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	07/05/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	07/05/08	1
Total Xylene	BDL	0.0015	mg/l	8021/8015	07/05/08	1
TPH (GC/FID) Low Fraction	BDL	0.10	mg/l	GRO	07/05/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	94.4		% Rec.	8021/8015	07/05/08	1
a,a,a-Trifluorotoluene (PID)	103.		% Rec.	8021/8015	07/05/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit (PQL)

Note:

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 07, 2008

Date Received : July 03, 2008
Description : 605-01
Sample ID : 0702-02 605-01 N SPRING
Collected By : Ben Greinke
Collection Date : 07/02/08 09:20

ESC Sample # : L353462-02

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Benzene	BDL	0.00050	mg/l	8021/8015	07/05/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	07/05/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	07/05/08	1
Total Xylene	BDL	0.0015	mg/l	8021/8015	07/05/08	1
TPH (GC/FID) Low Fraction	0.39	0.10	mg/l	GRO	07/05/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	85.1		% Rec.	8021/8015	07/05/08	1
a,a,a-Trifluorotoluene (PID)	103.		% Rec.	8021/8015	07/05/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 07, 2008

Date Received : July 03, 2008
Description : 605-01
Sample ID : 0702-03 605-01 S SPRING
Collected By : Ben Greinke
Collection Date : 07/02/08 09:40

ESC Sample # : L353462-03

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Benzene	0.0033	0.00050	mg/l	8021/8015	07/05/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	07/05/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	07/05/08	1
Total Xylene	0.37	0.0015	mg/l	8021/8015	07/05/08	1
TPH (GC/FID) Low Fraction	2.2	0.10	mg/l	GRO	07/05/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	81.7		% Rec.	8021/8015	07/05/08	1
a,a,a-Trifluorotoluene(PID)	103.		% Rec.	8021/8015	07/05/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 07, 2008

Date Received : July 03, 2008
Description : 605-01
Sample ID : 0702-04 605-01 LOWER DAM
Collected By : Ben Greinke
Collection Date : 07/02/08 10:00

ESC Sample # : L353462-04

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Benzene	BDL	0.00050	mg/l	8021/8015	07/05/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	07/05/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	07/05/08	1
Total Xylene	BDL	0.0015	mg/l	8021/8015	07/05/08	1
TPH (GC/FID) Low Fraction	BDL	0.10	mg/l	GRO	07/05/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	94.7		% Rec.	8021/8015	07/05/08	1
a,a,a-Trifluorotoluene(PID)	104.		% Rec.	8021/8015	07/05/08	1

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Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 07, 2008

Date Received : July 03, 2008
Description : 605-01
Sample ID : 0702-05 605-01 DOWN STREAM
Collected By : Ben Greinke
Collection Date : 07/02/08 10:20

ESC Sample # : L353462-05

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Benzene	BDL	0.00050	mg/l	8021/8015	07/06/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	07/06/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	07/06/08	1
Total Xylene	BDL	0.0015	mg/l	8021/8015	07/06/08	1
TPH (GC/FID) Low Fraction	BDL	0.10	mg/l	GRO	07/06/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	95.1		% Rec.	8021/8015	07/06/08	1
a,a,a-Trifluorotoluene (PID)	104.		% Rec.	8021/8015	07/06/08	1

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REPORT OF ANALYSIS

July 07, 2008

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

Date Received : July 03, 2008
Description : 605-01
Sample ID : 0702-06 605-01 BEDROCK
Collected By : Ben Greinke
Collection Date : 07/02/08 10:40

ESC Sample # : L353462-06

Site ID :
Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
pH	9.0		su	9045D	07/05/08	1
Sodium Adsorption Ratio	4.6			Calc.	07/07/08	1
Specific Conductance	1800		umhos/cm	9050AMod	07/07/08	1
Mercury	0.033	0.020	mg/kg	7471	07/05/08	1
Arsenic	22.	1.0	mg/kg	6010B	07/07/08	1
Barium	260	0.25	mg/kg	6010B	07/07/08	1
Boron	BDL	10.	mg/kg	6010B	07/07/08	1
Cadmium	1.1	0.25	mg/kg	6010B	07/07/08	1
Chromium	27.	0.50	mg/kg	6010B	07/07/08	1
Copper	22.	1.0	mg/kg	6010B	07/07/08	1
Lead	15.	0.25	mg/kg	6010B	07/07/08	1
Molybdenum	3.2	0.25	mg/kg	6010B	07/07/08	1
Nickel	22.	1.0	mg/kg	6010B	07/07/08	1
Selenium	BDL	1.0	mg/kg	6010B	07/07/08	1
Silver	BDL	0.50	mg/kg	6010B	07/07/08	1
Zinc	50.	1.5	mg/kg	6010B	07/07/08	1
Benzene	BDL	0.0025	mg/kg	8021/8015	07/06/08	5
Toluene	BDL	0.025	mg/kg	8021/8015	07/06/08	5
Ethylbenzene	BDL	0.0025	mg/kg	8021/8015	07/06/08	5
Total Xylene	0.019	0.0075	mg/kg	8021/8015	07/06/08	5
TPH (GC/FID) Low Fraction	3.4	0.50	mg/kg	GRO	07/06/08	5
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	94.4		% Rec.	8021/8015	07/06/08	5
a,a,a-Trifluorotoluene(PID)	99.2		% Rec.	8021/8015	07/06/08	5

BDL - Below Detection Limit

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L353462-06 (PH) - 9.0@23.5c



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REPORT OF ANALYSIS

July 07, 2008

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

Date Received : July 03, 2008
Description : 605-01
Sample ID : 0702-07 605-01 DIRECTLY BELOW LINER
Collected By : Ben Greinke
Collection Date : 07/02/08 11:00

ESC Sample # : L353462-07

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
pH	8.7		su	9045D	07/05/08	1
Sodium Adsorption Ratio	19.			Calc.	07/07/08	1
Specific Conductance	1500		umhos/cm	9050AMod	07/07/08	1
Mercury	0.064	0.020	mg/kg	7471	07/05/08	1
Arsenic	13.	1.0	mg/kg	6010B	07/07/08	1
Barium	260	0.25	mg/kg	6010B	07/07/08	1
Boron	BDL	10.	mg/kg	6010B	07/07/08	1
Cadmium	1.1	0.25	mg/kg	6010B	07/07/08	1
Chromium	32.	0.50	mg/kg	6010B	07/07/08	1
Copper	20.	1.0	mg/kg	6010B	07/07/08	1
Lead	15.	0.25	mg/kg	6010B	07/07/08	1
Molybdenum	0.62	0.25	mg/kg	6010B	07/07/08	1
Nickel	24.	1.0	mg/kg	6010B	07/07/08	1
Selenium	BDL	1.0	mg/kg	6010B	07/07/08	1
Silver	BDL	0.50	mg/kg	6010B	07/07/08	1
Zinc	61.	1.5	mg/kg	6010B	07/07/08	1
Benzene	BDL	0.0025	mg/kg	8021/8015	07/06/08	5
Toluene	BDL	0.025	mg/kg	8021/8015	07/06/08	5
Ethylbenzene	BDL	0.0025	mg/kg	8021/8015	07/06/08	5
Total Xylene	BDL	0.0075	mg/kg	8021/8015	07/06/08	5
TPH (GC/FID) Low Fraction	0.55	0.50	mg/kg	GRO	07/06/08	5
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	93.9		% Rec.	8021/8015	07/06/08	5
a,a,a-Trifluorotoluene(PID)	99.9		% Rec.	8021/8015	07/06/08	5

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

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L353462-07 (PH) - 8.7@23.5c



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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 07, 2008

Date Received : July 03, 2008
Description : 605-01
Sample ID : 0702-08 LATHAM CATTLE TROUGH
Collected By : Ben Greinke
Collection Date : 07/02/08 12:30

ESC Sample # : L353462-08

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Benzene	BDL	0.00050	mg/l	8021/8015	07/06/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	07/06/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	07/06/08	1
Total Xylene	BDL	0.0015	mg/l	8021/8015	07/06/08	1
TPH (GC/FID) Low Fraction	BDL	0.10	mg/l	GRO	07/06/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	95.6		% Rec.	8021/8015	07/06/08	1
a,a,a-Trifluorotoluene(PID)	104.		% Rec.	8021/8015	07/06/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 07, 2008

Date Received : July 03, 2008
Description : 605-01
Sample ID : 0702-09 LATHAM UPSTREAM
Collected By : Ben Greinke
Collection Date : 07/02/08 12:45

ESC Sample # : L353462-09

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Benzene	BDL	0.00050	mg/l	8021/8015	07/06/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	07/06/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	07/06/08	1
Total Xylene	BDL	0.0015	mg/l	8021/8015	07/06/08	1
TPH (GC/FID) Low Fraction	BDL	0.10	mg/l	GRO	07/06/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	95.4		% Rec.	8021/8015	07/06/08	1
a,a,a-Trifluorotoluene (PID)	104.		% Rec.	8021/8015	07/06/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit (PQL)

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REPORT OF ANALYSIS

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

July 07, 2008

Date Received : July 03, 2008
Description : 605-01
Sample ID : 0702-10 LATHAM-DAM 1
Collected By : Ben Greinke
Collection Date : 07/02/08 13:00

ESC Sample # : L353462-10

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Benzene	BDL	0.00050	mg/l	8021/8015	07/06/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	07/06/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	07/06/08	1
Total Xylene	BDL	0.0015	mg/l	8021/8015	07/06/08	1
TPH (GC/FID) Low Fraction	BDL	0.10	mg/l	GRO	07/06/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene (FID)	92.5		% Rec.	8021/8015	07/06/08	1
a,a,a-Trifluorotoluene (PID)	104.		% Rec.	8021/8015	07/06/08	1

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Det. Limit - Practical Quantitation Limit (PQL)

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1-800-767-5859
Fax (615) 758-5859

Tax I.D. 62-0814289

Est. 1970

REPORT OF ANALYSIS

July 07, 2008

Brett Kennedy
Walsh Env.- Grand Junction
535 Grand Avenue
Grand Junction, CO 81501

Date Received : July 03, 2008
Description : 605-01
Sample ID : 0702-11 LATHAM S2 SOURCE
Collected By : Ben Greinke
Collection Date : 07/02/08 13:15

ESC Sample # : L353462-11

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Benzene	BDL	0.00050	mg/l	8021/8015	07/06/08	1
Toluene	BDL	0.0050	mg/l	8021/8015	07/06/08	1
Ethylbenzene	BDL	0.00050	mg/l	8021/8015	07/06/08	1
Total Xylene	0.015	0.0015	mg/l	8021/8015	07/06/08	1
TPH (GC/FID) Low Fraction	0.20	0.10	mg/l	GRO	07/06/08	1
Surrogate Recovery (70-130)						
a,a,a-Trifluorotoluene(FID)	95.0		% Rec.	8021/8015	07/06/08	1
a,a,a-Trifluorotoluene(PID)	104.		% Rec.	8021/8015	07/06/08	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

The reported analytical results relate only to the sample submitted.

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Reported: 07/07/08 16:54 Printed: 07/07/08 16:55

Attachment A
List of Analytes with QC Qualifiers

Sample #	Analyte	Qualifier
L353462-01	Toluene	J6
	Ethylbenzene	J6

Attachment B
Explanation of QC Qualifier Codes

Qualifier	Meaning
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low

Qualifier Report Information

ESC utilizes sample and result qualifiers as set forth by the EPA Contract Laboratory Program and as required by most certifying bodies including NELAC. In addition to the EPA qualifiers adopted by ESC, we have implemented ESC qualifiers to provide more information pertaining to our analytical results. Each qualifier is designated in the qualifier explanation as either EPA or ESC. Data qualifiers are intended to provide the ESC client with more detailed information concerning the potential bias of reported data. Because of the wide range of constituents and variety of matrices incorporated by most EPA methods, it is common for some compounds to fall outside of established ranges. These exceptions are evaluated and all reported data is valid and useable unless qualified as 'R' (Rejected).

Definitions

- Accuracy** - The relationship of the observed value of a known sample to the true value of a known sample. Represented by percent recovery and relevant to samples such as: control samples, matrix spike recoveries, surrogate recoveries, etc.
- Precision** - The agreement between a set of samples or between duplicate samples. Relates to how close together the results are and is represented by Relative Percent Difference.
- Surrogate** - Organic compounds that are similar in chemical composition, extraction, and chromatography to analytes of interest. The surrogates are used to determine the probable response of the group of analytes that are chemically related to the surrogate compound. Surrogates are added to the sample and carried through all stages of preparation and analyses.
- TIC** - Tentatively Identified Compound: Compounds detected in samples that are not target compounds, internal standards, system monitoring compounds, or surrogates.

Summary of Remarks For Samples Printed
07/07/08 at 16:55:52

TSR Signing Reports: 134
R2 - Rush: Next Day

Sample: L353462-01 Account: WALSHGJCO Received: 07/03/08 09:00 Due Date: 07/07/08 00:00 RPT Date: 07/07/08 16:54
Sample: L353462-02 Account: WALSHGJCO Received: 07/03/08 09:00 Due Date: 07/07/08 00:00 RPT Date: 07/07/08 16:54
Sample: L353462-03 Account: WALSHGJCO Received: 07/03/08 09:00 Due Date: 07/07/08 00:00 RPT Date: 07/07/08 16:54
Sample: L353462-04 Account: WALSHGJCO Received: 07/03/08 09:00 Due Date: 07/07/08 00:00 RPT Date: 07/07/08 16:54
Sample: L353462-05 Account: WALSHGJCO Received: 07/03/08 09:00 Due Date: 07/07/08 00:00 RPT Date: 07/07/08 16:54
Sample: L353462-06 Account: WALSHGJCO Received: 07/03/08 09:00 Due Date: 07/07/08 00:00 RPT Date: 07/07/08 16:54
Sample: L353462-07 Account: WALSHGJCO Received: 07/03/08 09:00 Due Date: 07/07/08 00:00 RPT Date: 07/07/08 16:54
Sample: L353462-08 Account: WALSHGJCO Received: 07/03/08 09:00 Due Date: 07/07/08 00:00 RPT Date: 07/07/08 16:54
Sample: L353462-09 Account: WALSHGJCO Received: 07/03/08 09:00 Due Date: 07/07/08 00:00 RPT Date: 07/07/08 16:54
Sample: L353462-10 Account: WALSHGJCO Received: 07/03/08 09:00 Due Date: 07/07/08 00:00 RPT Date: 07/07/08 16:54
Sample: L353462-11 Account: WALSHGJCO Received: 07/03/08 09:00 Due Date: 07/07/08 00:00 RPT Date: 07/07/08 16:54



Rocky Mountain Assets

MESA INSET-SAMPLING LOCATIONS

0 0.05 0.1 0.15 0.2 Miles
1:4,500 1 inch equals 375 feet Garfield County, Colorado

Legend

Sampling Locations

<MCL

>MCL

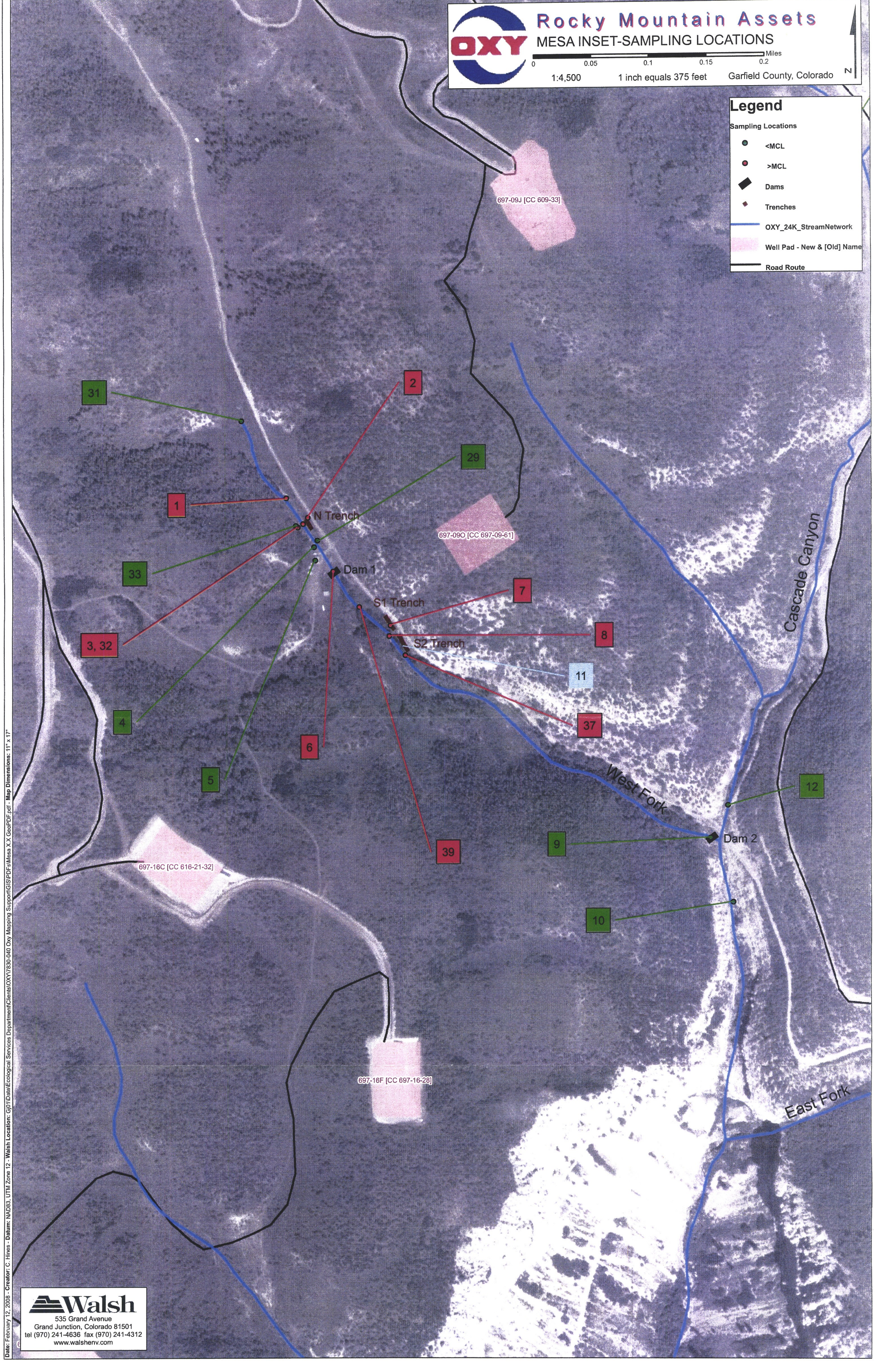
Dams

Trenches

OXY_24K_StreamNetwork

Well Pad - New & [Old] Name

Road Route



Date: February 12, 2008 - Creator: C. Hines - Datum: NAD83 - UTM Zone 12 - Walsh Location: C:\GIS\MapData\Ecological Services Department\Clients\OXY\830-040 Oxy Mapping Support\GIS\PDFs\Mesa XX GeoPDF.pdf - Map Dimensions: 11" x 17"

535 Grand Avenue
Grand Junction, Colorado 81501
tel (970) 241-4636 fax (970) 241-4312
www.walshenv.com



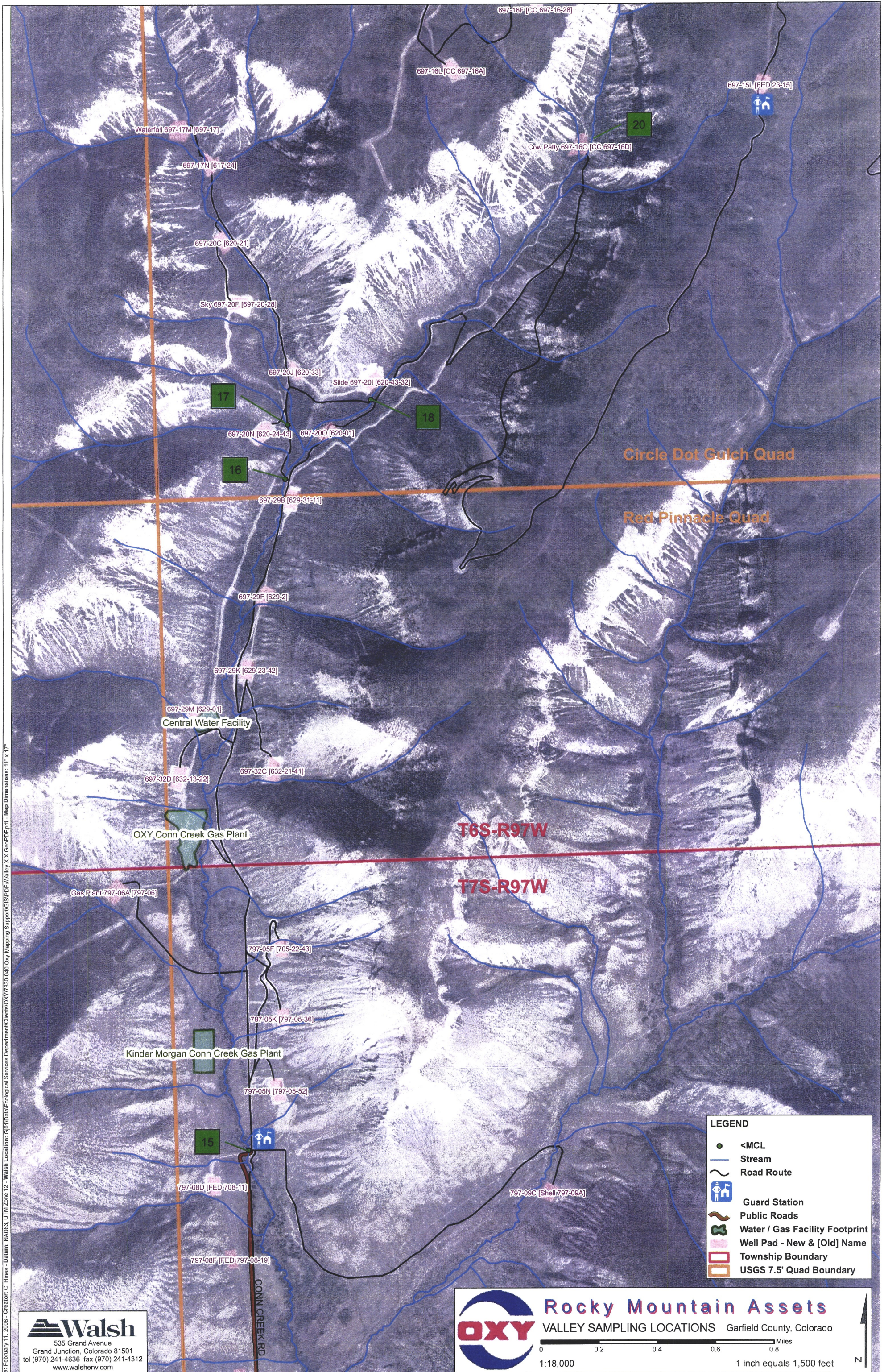
Rocky Mountain Assets
MESA SAMPLING LOCATIONS

0 0.1 0.2 0.3 0.4 Miles
1:12,000 1 inch equals 1,000 feet Garfield County, Colorado

Legend

- Sampling Locations
- <MCL
 - >MCL
 - Dams
 - Trenches
 - OXY_24K_StreamNetwork
 - Well Pad - New & [Old] Name
 - Road Route


Date: February 12, 2008 Creator: C. Hines Datum: NAD83 UTM Zone 12 Walsh Location: G:\Data\Ecological Services Department\Clients\OXY\7830-040 Oxy Mapping Support\GIS\PDFs\Mesa XX GeoPDF.pdf Map Dimensions: 11" x 17"



Date: February 11, 2008 - Creator: C. Hines - Datum: NAD83, UTM Zone 12 - Walsh Location: G:\Data\Ecological Services Department\Clients\OXY\7830-040 Oxy Mapping Support\GIS\PDF\Valley.XX GeoPDF.pdf - Map Dimensions: 11" x 17"



535 Grand Avenue
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www.walshenv.com



Rocky Mountain Assets

VALLEY SAMPLING LOCATIONS Garfield County, Colorado

00.20.40.60.8

Miles

1:18,0001 inch equals 1,500 feet

N

Appendix G

Proposed Sampling Points, Sampling Frequency, and Analytical Methods

1 PROPOSED CHARACTERIZATION PLAN

This section describes actions to be taken to characterize impact in soil and groundwater, and to define the characteristics of the aquifer in the vicinity of the release.

1.1 Tracer Dye Study

Fluorescent dye with fluorescein was mixed with fresh water and added to the reserve pit on June 19, 2008. No visual indication of the dye had appeared in the creek area at the time of this report. A fluorometer capable of detecting parts per billion levels of fluorescein will be used to measure for concentrations of fluorescein at the seeps, interceptor trenches and check dams (Dams 1 and 2). The introduced concentration will be compared to the discharge concentration through time to determine the aquifer permeability rate and the dilution factor between the introduction and discharge points. This information will be used to determine aquifer characteristics.

1.2 Sediment Characterization

Sediment samples will be collected from the vicinity of the seeps (sample points 3, 7 and 8) to characterize potential impact in the areas where groundwater recharges the ephemeral unnamed tributary. Samples will be collected from the intervals 0" to 6", 6" to 12" and 12" to 18" and analyzed for the soil compound list on Table 910-1 in the COGCC regulations.

1.3 Groundwater Characterization

Along the ephemeral unnamed tributary, groundwater provides the primary recharge source once seasonal snowmelt run-off ceases. Water samples collected from the groundwater interceptor trenches near the seep areas (sample locations 2, 7 and 11) will be used to characterize potential impacts to groundwater. The analyses and frequency detailed in Section 1.4 below will be followed. In addition, field parameters including presence of free product, fluorescence, pH, conductivity, and dissolved oxygen may be obtained.

1.4 Surface Water Characterization

The surface water in the area has been characterized through sampling that has been conducted two times per week from the time of discovery through mid-July. This baseline data is summarized in Appendix F. Sampling points are shown on the attached figures. The following water sampling points will continue to be sampled at the following rates:

Map #	Location Name	Analytes	Frequency
1	Upstream	BTEX/TVH	Bi-weekly
2	North trench	BTEX/TVH	Bi-weekly
4	Water trough	BTEX/TVH	Weekly
6	Dam 1	BTEX/TVH	Bi-weekly
7	S1 Trench	BTEX/TVH	Bi-weekly
11	S2 Trench	BTEX/TVH	Bi-weekly
9	Dam 2	BTEX/TVH	Weekly
10	Downstream of confluence	BTEX/TVH, TDS	Weekly

The sampling frequencies shown above will be continued until a given sampling point is dry, until data results stabilize below MCLs or until winter weather conditions no longer allow safe access to the sample locations. When these instances occur, the sampling frequency will be revised.