

P.O. Box 1980, Hobbs, NM

District II

P.O. Drawer DD, Artesia, NM 88211

District III

Rio Brazos Rd. Aztec, NM 87410

State of New Mexico

Energy, Minerals and Natural Resources Department

Comp - bedrock
sep - bedrock

OIL CONSERVATION DIVISION

P.O. Box 2088

Santa Fe, New Mexico 87504--2088

SUBMIT 1 COPY TO
APPROPRIATE
DISTRICT OFFICE
AND 1 COPY TO
SANTA FE OFFICE

PIT REMEDIATION AND CLOSURE REPORT

Operator: Amoco Production Company **Telephone:** (505) - 326-9200

Address: 200 Amoco Court, Farmington, New Mexico 87401

Facility Or: HUGHES C # 4
Well Name

Location: Unit or Qtr/Qtr Sec A Sec 34 T 29 N R 8 W County SAN JUAN

Pit Type: Separator Dehydrator Other COMPRESSOR

Land Type: BLM ☒, State ☐, Fee ☐, Other ☐

Pit Location: Pit dimensions: length 41', width 67', depth 4'
(Attach diagram)

Reference: wellhead X, other

Footage from reference: 50

Direction from reference: 86 Degrees East North
 ✓ of
 West South ✓

Depth To Ground Water:

(Vertical distance from
contaminants to seasonal
high water elevation of
ground water)

Less than 50 feet (20 points)

50 feet to 99 feet (10 points)

Greater than 100 feet (0 Points) 0

Wellhead Protection Area:

(Less than 200 feet from a private domestic water source, or; less than 1000 feet from all other water sources)

Yes (20 points) ☒

No (0 points)

Distance To Surface Water:

(Horizontal distance to perennial
lakes, ponds, rivers, streams, creeks,
irrigation canals and ditches)

Less than 200 feet (20 points)

200 feet to 1000 feet (10 points)

Greater than 1000 feet (0 points) 2

RANKING SCORE (TOTAL POINTS):

Date Remediation Started: _____ Date Completed: 8/21/00

Remediation Method: Excavation ☒ Approx. cubic yards 375
 (Check all appropriate sections) Landfarmed _____ Insitu Bioremediation _____
 Other COMPOSTED

Remediation Location: Onsite _____ Offsite NYE GC B#1E (E-7-29-9)
 (ie. landfarmed onsite, name and location of offsite facility) TRANSPORTED TO CROUCH MESA 3/01. 2V

General Description Of Remedial Action: _____
Excavation . MOSTLY BEDROCK . ALL SAMPLES COLLECTED FROM
BEDROCK , THEREFORE NO TPH ANALYSIS WAS CONDUCTED .

Ground Water Encountered: No ☒ Yes _____ Depth _____

Final Pit: Sample location see Attached Documents
 Closure Sampling: _____
 (if multiple samples, attach sample results and diagram of sample locations and depths)
 Sample depth 2' (SOUTH SIDEWALL)
 Sample date 8/21/00 Sample time 0845
 Sample Results

Benzene(ppm) _____

Total BTEX(ppm) _____

Field headspace(ppm) 219.9 / 139.1 ^{PIT BOTTOM}

TPH NA

Ground Water Sample: Yes _____ No ☒ (If yes, attach sample results)

I HEREBY CERTIFY THAT THE INFORMATION ABOVE IS TRUE AND COMPLETE TO THE BEST OF MY KNOWLEDGE AND BELIEF

DATE 8/21/00

SIGNATURE

B. Shaw

PRINTED NAME
AND TITLE

Buddy D. Shaw
ENVIRONMENTAL COORDINATOR

CLIENT: AMOCOBLAGG ENGINEERING, INC.
P.O. BOX 87, BLOOMFIELD, NM 87413
(505) 632-1199LOCATION NO: 80767

C.O.C. NO: _____

FIELD REPORT: CLOSURE VERIFICATION

PAGE No: 1 of 1LOCATION: NAME: HUGHESC WELL #: 4PIT: COMPR.DATE STARTED: 8/21/00QUAD/UNIT: A SEC. 34 TWP. 29N RNG. 8W PM: NM CNTY: SJST: NM

DATE FINISHED: _____

QTR/FOOTAGE: 990' N / 890' ENENE CONTRACTOR: P & SENVIRONMENTAL
SPECIALIST: NVEXCAVATION APPROX. 41 FT. x 67 FT. x 4 FT. DEEP. CUBIC YARDAGE: 375DISPOSAL FACILITY: NYE GC. BIE (E-7-29-9) REMEDIATION METHOD: COMPOSTEDLAND USE: RANGE LEASE: 5F-078049 FORMATION: MV

FIELD NOTES & REMARKS:

PIT LOCATED APPROXIMATELY 50 FT. S86W FROM WELL HEADDEPTH TO GROUNDWATER: >100' NEAREST WATER SOURCE: >1000' NEAREST SURFACE WATER: >1000'NMDCD RANKING SCORE: 0 NMDCD TPH CLOSURE STD: 5000 PPM

CHECK ONE:

☒ PIT ABANDONED☐ STEEL TANK INSTALLED☐ FIBERGLASS TANK INSTALLED

SOIL AND EXCAVATION

OVM CALIB. READ. 53.1 ppm

DESCRIPTION:

TIME: 9:00 @/pm 8/19/00

EXCAVATION MOSTLY BEDROCK (SANDSTONE), PALE YELL. BROWN TO OLIVE GRAY IN COLOR, FRIABLE BUT HARD ON MOST OF THE SIDEWALLS, VERY HARD @ BOTTOM, STAINING EVIDENT ON SOUTH PORTION OF EAST SIDEWALL (0.5 - 1.0' INTERVAL @ 2' BELOW GRADE) & SOUTH SIDEWALL, ALL SAMPLES COLLECTED FROM BEDROCK, THEREFORE NO TPH ANALYSIS WAS CONDUCTED.

mostly
BEDROCK

(ss)

RISK ASSESSED

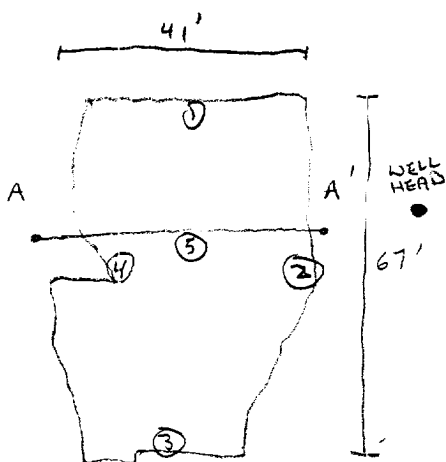
SCALE

0 FT

FIELD 418.1 CALCULATIONS

TIME	SAMPLE I.D.	LAB No:	WEIGHT (g)	mL. FREON	DILUTION	READING	CALC. ppm
0845							

PIT PERIMETER

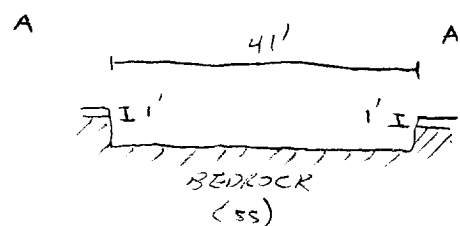
OVM
RESULTS

SAMPLE ID	FIELD HEADSPACE PID (ppm)
1 @ 2'	0.0
2 @ 2'	185.2
3 @ 2'	219.9
4 @ 2'	0.0
5 @ 4'	139.1

LAB SAMPLES

SAMPLE ID	ANALYSIS	TIME

PIT PROFILE



TRAVEL NOTES:

CALLOUT: 8/18/00 - AFTER.ONSITE: 8/21/00 - MORN.

Well Name:

Well Site location:

Pit Type:

Producing Formation:

Pit Category:

Horizontal Distance to Surface Water:

Vicinity Groundwater Depth:

Hughes C #4

Unit A, Sec. 34, T29N, R8W

Compressor Pit

Mesa Verde

Non Vulnerable

> 1000 ft.

> 100 ft.

RISK ASSESSMENT (non-vulnerable area)

Pit remediation activities were terminated when trackhoe encountered competent sandstone at 4 feet below grade.

No past or future threat to surface water or groundwater is likely based on the following considerations:

1. Groundwater levels located on or close to the well pad are estimated to be at a much greater depth below shallow sandstone bedrock.
2. Topographic information does not indicate off site lateral fluid migration near the earthen pit.
3. Daily discharge into the earthen pit has been terminated (pit abandoned). Prior discharge into the pit is believed to be under 5 barrels per day.
4. Well site located within the **non-vulnerable area** and is approximately 0.70 miles northwest of the nearest vulnerable area boundary (Jasis Canyon wash).

(Refer to Cutter Canyon Quadrangle, New Mexico - San Juan County, 7.5 Minute Series (Topographic), Provisional edition, 1985, (vulnerable area boundary developed by Mr. William C. Olson, Hydrogeologist, Environmental Bureau, New Mexico Oil Conservation Division).

Based upon the information given, we conclude that the subsurface lateral and vertical impact from the earthen pit is very limited and that the sandstone bottom creates enough of a impermeable barrier as to subdue impact to groundwater below it (please refer to AMOCO's report "Post Excavation Pit Closure Investigation Summary, July, 1995", with cover letter dated November 30, 1995). BP AMOCO therefore request pit closure approval on this location.

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Address: 200 Amoco Court, Farmington, New Mexico 87401

Facility Or: HUGHES C #4
Well Name

Location: Unit or Qtr/Qtr Sec A Sec 34 T24N R8W County SAN JUAN

Pit Type: Separator ☒ Dehydrator ☐ Other ☐

Land Type: BLM ☒, State ☐, Fee ☐, Other ☐

Pit Location: Pit dimensions: length 29', width 19', depth 4'
(Attach diagram)

Reference: wellhead ☒, other ☐

Footage from reference: 69'

Direction from reference: 29 Degrees ☒ East North ☒
of
☐ West South ☐

Depth To Ground Water:

(Vertical distance from
contaminants to seasonal
high water elevation of
ground water)

Less than 50 feet (20 points)
50 feet to 99 feet (10 points)
Greater than 100 feet (0 Points) 0

Wellhead Protection Area:

(Less than 200 feet from a private
domestic water source, or; less than
1000 feet from all other water sources)

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No (0 points) 0

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RANKING SCORE (TOTAL POINTS): 0

Date Remediation Started: _____ Date Completed: 8/21/00

Remediation Method: Excavation ☒ Approx. cubic yards 75
(Check all appropriate sections) Landfarmed _____ Insitu Bioremediation _____
Other COMPOSTED

Remediation Location: Onsite ☒ Offsite _____
(ie. landfarmed onsite, name and location of offsite facility)

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Excavation, MOSTLY BEDROCK. ALL SAMPLES COLLECTED FROM
BEDROCK, THEREFORE NO TPH ANALYSIS WAS CONDUCTED.

Ground Water Encountered: No ☒ Yes _____ Depth _____

Final Pit: Sample location see Attached Documents
Closure Sampling: _____
(if multiple samples, attach sample results and diagram of sample locations and depths)
Sample depth 2' (EAST SIDEWALK)
Sample date 8/21/00 Sample time 0730
Sample Results

Benzene(ppm) _____

Total BTEX(ppm) _____

Field headspace(ppm) 93.8 / PIT BOTTOM
0.0

TPH NA

Ground Water Sample: Yes _____ No ☒ (If yes, attach sample results)

I HEREBY CERTIFY THAT THE INFORMATION ABOVE IS TRUE AND COMPLETE TO THE BEST OF MY KNOWLEDGE AND BELIEF

DATE 8/21/00

SIGNATURE

B. Shaw

PRINTED NAME
AND TITLE

Buddy D. Shaw
Environmental Coordinator

CLIENT: AMOCOBLAGG ENGINEERING, INC.
P.O. BOX 87, BLOOMFIELD, NM 87413
(505) 632-1199LOCATION NO: 80767

C.D.C. NO: _____

FIELD REPORT: CLOSURE VERIFICATION

PAGE No: 1 of 1LOCATION: NAME: HUGHES C WELL #: 4 PIT: SEP.DATE STARTED: 8/21/00QUAD/UNIT: A SEC: 34 TWP: 29N RNG: 8W PM: NM CNTY: SJ ST: NM

DATE FINISHED: _____

QTR/FOOTAGE: 990' N | 890' E NENE CONTRACTOR: P+SENVIRONMENTAL
SPECIALIST: NJEXCAVATION APPROX. 29 FT. x 19 FT. x 4 FT. DEEP. CUBIC YARDAGE: 75DISPOSAL FACILITY: NYE GC BIE (F-7-29-9) REMEDIATION METHOD: COMPOSTEDLAND USE: RANGE LEASE: SF-078049 FORMATION: MU

FIELD NOTES & REMARKS:

PIT LOCATED APPROXIMATELY 69 FT. NNE FROM WELL-HEADDEPTH TO GROUNDWATER: >100' NEAREST WATER SOURCE: >1000' NEAREST SURFACE WATER: >1000'NMOC D RANKING SCORE: 0 NMOC D TPH CLOSURE STD: 5000 PPM

CHECK ONE

SOIL AND EXCAVATION

OVM CALIB. READ. 53.1 ppm☒ PIT ABANDONED

DESCRIPTION:

TIME: 9:00 (AM) PM 8/19/00☐ STEEL TANK INSTALLED☐ FIBERGLASS TANK INSTALLED

EXCAVATION MOSTLY BEDROCK (SANDSTONE), PALE YELL. BROWN TO OLIVE GRAY IN COLOR, FRIABLE BUT HARD ON MOST OF THE SIDEWALLS, VERY HARD @ BOTTOM, NO APPARENT DISCOLORATION OR STAINING OBSERVED, ALL SAMPLES COLLECTED FROM BEDROCK, THEREFORE NO TPH ANALYSIS WAS CONDUCTED.

MOSTLY
BEDROCK

(SS)

CLOSED

SCALE

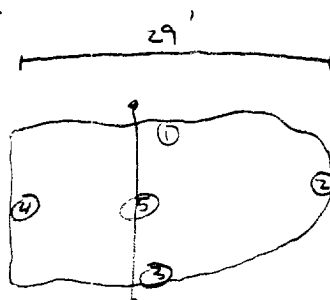
0 FT

FIELD 418.1 CALCULATIONS

TIME	SAMPLE I.D.	LAB No:	WEIGHT (g)	ML. FREON	DILUTION	READING	CALC. ppm
0730							

PIT PERIMETER

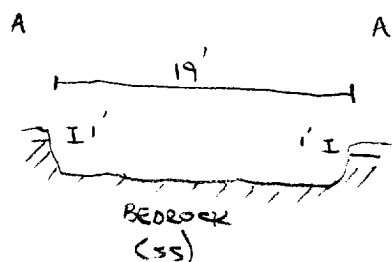
PIT PROFILE

TO
PROD.
TANKTO
WELL
HEADOVM
RESULTS

SAMPLE ID	FIELD HEADSPACE PID (ppm)
1 @ 2'	32.8
2 @ 2'	93.8
3 @ 2'	0.0
4 @ 2'	34.4
5 @ 4'	0.0

LAB SAMPLES

SAMPLE ID	ANALYSIS	TIME



TRAVEL NOTES

CALLOUT: 8/18/00 - MORN.ONSITE: 8/21/00 - MORN.