| PI NUMBER: 051 24087 orizontal Hole Oil & Gas | OKLAHOMA CORPORATION COMMISSION OIL & GAS CONSERVATION DIVISION P.O. BOX 52000 OKLAHOMA CITY, OK 73152-2000 (Rule 165:10-3-1) <u>PERMIT TO DRILL</u> | | | Approval Date Expiration Date | |
|---|---|-------------------------------|---|--|-------------------------------|
| WELL LOCATION: Sec: 27 Twp: 4N Rge: 5 SPOT LOCATION: SW SW SE SW | FEET FROM QUARTER: FROM SC | | EST | | |
| Lease Name: MARIE 0405 | 311 Well No: 4- | 27SH | 70 Well w | vill be 310 feet from nea | arest unit or lease boundary. |
| Operator MARATHON OIL COMPANY Name: | | Telephone: 7132 | 962003 | OTC/OCC Number | |
| MARATHON OIL COMPANY 5555 SAN FELIPE ST HOUSTON, TX | 77056-2701 | | SPIES PROPER 136 7TH AVENU KIRKLAND | TY TRUST/RUSSELL I E WA | LEE SPIES 98033 |
| Formation(s) (Permit Valid for Listed For Name 1 CHESTER 2 3 4 | rmations Only): Depth 14200 | 6 7 8 9 | Name | De | epth |
| 5 Spacing Orders: 585288 | | 10 | | | |
| | Location Exception Ord | lers: 653502 | | Increased Density Orders | s: 650411 |
| Pending CD Numbers: Total Depth: 17717 Ground Elevation: 1 | 211 Surface Ca | sing: 1500 | | Special Orders: Depth to base of Treatable Wa | ater-Bearing FM: 510 |
| Under Federal Jurisdiction: No PIT 1 INFORMATION | Fresh Water Su | pply Well Drilled: 1 Appro | lo ved Method for disposal c | | er used to Drill: No |
| Type of Pit System: CLOSED Closed System Means Type of Mud System: WATER BASED Chlorides Max: 5000 Average: 3000 Is depth to top of ground water greater than 10ft below b Within 1 mile of municipal water well? N | | | ne time land application E MEMO | (REQUIRES PERMIT) | PERMIT NO: 16-3120 |
| Wellhead Protection Area? N Pit is located in a Hydrologically Sensitive Area. Category of Pit: C Liner not required for Category: C | | | | | |
| Pit Location is BED AQUIFER Pit Location Formation: DUNCAN | | | | | |

 PIT 2 INFORMATION

 Type of Pit System:
 CLOSED Closed System Means Steel Pits

 Type of Mud System:
 OIL BASED

 Chlorides Max: 300000
 Average: 200000

 Is depth to top of ground water greater than 10ft below base of pit?
 Y

 Within 1 mile of municipal water well?
 N

 Wellhead Protection Area?
 N

 Pit
 is located in a Hydrologically Sensitive Area.

 Category of Pit:
 C

 Liner not required for Category: C
 C

 Pit Location is
 BED AQUIFER

 Pit Location Formation:
 DUNCAN

HORIZONTAL HOLE 1

| Sec | 27 | Twp | 4N | Rge | 5W | V C | ounty | GRADY |
|--------------------------------|----------|---------|--------|--------|-------|---------|-------|-------|
| Spot | Locatior | n of En | d Poin | t: N2 | 2 | NW | NW | NW |
| Feet | From: | NOF | RTH | 1/4 Se | ctior | n Line: | 50 |) |
| Feet | From: | WE: | ST | 1/4 Se | ctior | n Line: | 33 | 80 |
| Depth of Deviation: 12223 | | | | | | | | |
| Radius of Turn: 462 | | | | | | | | |
| Direction: 336 | | | | | | | | |
| Total Length: 4768 | | | | | | | | |
| Measured Total Depth: 17717 | | | | | | | | |
| True Vertical Depth: 14200 | | | | | | | | |
| End Point Location from Lease, | | | | | | | | |
| Unit, or Property Line: 50 | | | | | | | | |

| Notes: | |
|-----------------------------|--|
| Category | Description |
| DEEP SURFACE CASING | 11/18/2016 - G71 - APPROVED; NOTIFY OCC FIELD INSPECTOR IMMEDIATELY OF ANY LOSS OF CIRCULATION OR FAILURE TO CIRCULATE CEMENT TO SURFACE ON ANY CONDUCTOR OR SURFACE CASING |
| HYDRAULIC FRACTURING | 11/18/2016 - G71 - OCC 165:10-3-10 REQUIRES: 1) THE CHEMICAL DISCLOSURE OF HYDRAULIC FRACTURING INGREDIENTS FOR ALL WELLS BE REPORTED TO FRACFOCUS USING THE FOLLOWING LINK HTTP://FRACFOCUS.ORG/ WITH NOTICE GIVEN 48 HOURS IN ADVANCE OF FRACTURING TO THE LOCAL OCC DISTRICT OFFICE; AND, 2) PRIOR TO COMMENCEMENT OF FRACTURING OPERATIONS FOR HORIZONTAL WELLS, NOTICE ALSO GIVEN FIVE BUSINESS DAYS IN ADVANCE TO OFFSET OPERATORS WITH WELLS COMPLETED IN THE SAME COMMON SOURCE OF SUPPLY WITHIN 1/2 MILE. |
| INCREASED DENSITY - 650411 | 11/21/2016 - G60 - 27-4N-5W X585288 CSTR 3 WELLS MARATHON OIL COMPANY 3/2/16 |
| LOCATION EXCEPTION - 653502 | 11/21/2016 - G60 - (I.O.) 27-4N-5W X585288 CSTR COMPL. INT. NCT 150' FNL, NCT 150' FSL, NCT 250' FEL MARATHON OIL COMPANY 2/22/16 |
| MEMO | 11/18/2016 - G71 - PITS 1 & 2 - CLOSED SYSTEM=STEEL PITS PER OPERATOR REQUEST, PIT 2 - OBM RETURNED TO VENDOR, CUTTINGS PERMITTED PER DISTRICT |
| SPACING - 585288 | 11/21/2016 - G60 - (640) 27-4N-5W EST CSTR, OTHERS EXT OTHERS COMPL. INT. NCT 660' FB |

