ABOVE THIS LINE FOR DIVISION USE ONLY

# NEW MEXICO OIL CONSERVATION DIVISION

- Engineering Bureau -

1220 South St. Francis Drive, Santa Fe, NM 87505



# **ADMINISTRATIVE APPLICATION CHECKLIST**

THIS CHECKLIST IS MANDATORY FOR ALL ADMINISTRATIVE APPLICATIONS FOR EXCEPTIONS TO DIVISION RULES AND REGULATIONS WHICH REQUIRE PROCESSING AT THE DIVISION LEVEL IN SANTA FE **Application Acronyms:** [NSL-Non-Standard Location] [NSP-Non-Standard Proration Unit] [SD-Simultaneous Dedication] [DHC-Downhole Commingling] [CTB-Lease Commingling] [PLC-Pool/Lease Commingling] [PC-Pool Commingling] [OLS - Off-Lease Storage] [OLM-Off-Lease Measurement] [PMX-Pressure Maintenance Expansion] [WFX-Waterflood Expansion] [SWD-Salt Water Disposal] [IPI-Injection Pressure Increase] [EOR-Qualified Enhanced Oil Recovery Certification] [PPR-Positive Production Response] [1]**TYPE OF APPLICATION** - Check Those Which Apply for [A] Location - Spacing Unit - Simultaneous Dedication NSL NSP SD Check One Only for [B] or [C] [B] Commingling - Storage - Measurement ☐ DHC ☐ CTB ☐ PLC ☐ PC ☐ OLS ☐ OLM [C] Injection - Disposal - Pressure Increase - Enhanced Oil Recovery ☐ WFX ☐ PMX ☐ SWD ☐ IPI ☐ EOR ☐ PPR [D]Other: Specify [2] **NOTIFICATION REQUIRED TO:** - Check Those Which Apply, or  $\Box$  Does Not Apply Working, Royalty or Overriding Royalty Interest Owners [A] [B] Market Operators, Leaseholders or Surface Owner [C]Application is One Which Requires Published Legal Notice [D]Notification and/or Concurrent Approval by BLM or SLO U.S. Bureau of Land Management - Commissioner of Public Lands State Land Office For all of the above, Proof of Notification or Publication is Attached, and/or, [E][F]Waivers are Attached SUBMIT ACCURATE AND COMPLETE INFORMATION REQUIRED TO PROCESS THE TYPE OF [3] APPLICATION INDICATED ABOVE. CERTIFICATION: I hereby certify that the information submitted with this application for administrative [4] approval is accurate and complete to the best of my knowledge. I also understand that no action will be taken on this application until the required information and notifications are submitted to the Division. Note: Statement must be completed by an individual with managerial and/or supervisory capacity. Print or Type Name

# HOLLAND & HART LLP

DENVER • ASPEN
BOULDER • COLORADO SPRINGS
DENVER TECH CENTER
BILLINGS • BOISE
CHEYENNE • JACKSON HOLE
SALT LAKE CITY • SANTA FE
WASHINGTON, D.C.

P.O. BOX 2208 SANTA FE. NEW MEXICO 87504-2208 110 NORTH GUADALUPE, SUITE 1 SANTA FE. NEW MEXICO 87501-6525 TELEPHONE (505) 988-4421 FACSIMILE (505) 983-6043

William F. Carr

wcarr@hollandhart.com

May 30, 2002

## HAND-DELIVERED

Lori Wrotenbery, Director
Oil Conservation Division
New Mexico Department of Energy,
Minerals and Natural Resources
1220 South Saint Francis Drive
Santa Fe, New Mexico 87505

Re: Application of EOG Resources, Inc. administrative approval of an unorthodox gas well location for its Chocolate Chip "19" Federal Com Well No. 2, to be drilled at a location 2124 feet from the North line and 944 feet from the West line Section 19, Township 18 South, Range 30 East, N.M.P.M., Lea County, New Mexico.

Dear Ms. Wrotenbery:

EILY

EOG Resources, Inc. hereby seeks administrative approval pursuant to the provisions of Division Rule 104 F (2)-(4) adopted on August 12, 1999, of an unorthodox well location for its Chocolate Chip Federal Com Well No. 2 to be drilled at an unorthodox location 2124 feet from the North line and 944 feet from the West line of Section 19, Township 18 South, Range 30 East, N.M.P.M., Lea County, New Mexico. This well will be drilled to a depth sufficient to test the Morrow formation, Undesignated North Turkey Track-Morrow Gas Pool and the Mississippian Chester formation. A standard 320-acre spacing and proration unit comprised of the N/2 of Section 19 will be dedicated to the well.

This location in the Morrow and Missippian Chester formations is unorthodox because it is governed by Division Rule 104.C (2), revised by Division Order No. R-11231, issued by the Oil Conservation Commission in Case 12119 on August 12, 1999, which provides for wells on 320-spacing units to be located no closer than 660 feet to the outer boundary of the quarter section on which the well is located and no closer than 10 feet to any quarter-quarter section line or

Administrative application for unorthodox well location Chocolate Chip" Federal Com Well No. 2 May 30, 2002 Page 2

subdivision inner boundary. The proposed unorthodox well location is 516 feet from an outer boundary of a quarter section.

An unorthodox location for this well is required by geologic conditions. The proposed location is based on 3D seismic as integrated with well control. This location is a combination of a seismic thick and higher potential for sand across a seismic high. EOG's geologic model for this area is that there is greater potential for Morrow sands in thicker intervals rather than thins. Seismic data does not "see" Morrow sands but shows a thickening of the Morrow interval which suggests the potential for Morrow sands at the proposed location.

<u>Figure 1</u> is a seismic line through our location and also the EOG Chocolate Chip "19" Federal Com No. 1 located approximately 1900 feet away in the SW/4 of Section 19. This seismic line runs North to South down the axis of a isochron thick between the Morrow M Marker and the Morrow Lower. This figure shows the interpretation of the Morrow M Marker and The Morrow Lower seismic reflections. The proposed location shows to be structurally high and the isochron interval seems to be visually consistent.

<u>Figure 2</u> is an isochron map between a maker in the Morrow M Marker and the Lower Morrow. The blue-purple areas are thicks on this map. The heavy black lines mark the interpreted edges of the seismic thick. This narrow North to South thick is interpreted to be a possible channel system and different than the other areas in Section 19 that are also thick. Our proposed location is in the interpreted thick.

Figure 3 is the time structure map on the Morrow M Marker. The pink-yellow is structurally high to the green/blue/purple. Also the "channel" edges are shown from the isochron map. EOG's proposed location is on the subtle high where the "channel" comes through Section 19. Based on our interpretation, the proposed location keeps the proposed well location in the axis of the channel system and near the time high, mitigating being close to the edge of the interpreted sand system. This location is critical because EOG can stay away from the channel edge and also get approximately 50 feet high to the Chocolate Chip "19" Federal Com Well No. 1 which has a gas-water contact in the targeted Morrow sand package at a -7878 subsea. Therefore, EOG's proposed location for the Chocolate Chip "19" Federal Com Well No. 2 is in a position to maximize EOG's ability to effectively recover hydrocarbons from this N/2 spacing unit.

Administrative application for unorthodox well location Chocolate Chip" Federal Com Well No. 2 May 30, 2002 Page 3

Attached hereto as Figure 4 is a plat which shows the subject area, the 320-acre spacing unit comprised of all of the N/2 of Section 19 and the proposed unorthodox well location. Since this well encroaches on an EOG operated tract to the South a copy of this application, including a copy of the plat described above has been sent to all working interest owners in this offsetting spacing unit by certified mail-return receipt requested in accordance with Rule 1207 (A)(5). These owners are identified on the Notification List attached to this application and have been a advised that if they have an objection to this application it must be filed in writing with the Division's Santa Fe office within twenty days from the date this notice was sent.

Enclosed in hard copy and disc is a proposed administrative order of the Division.

Your attention to this application is appreciated.

Very truly yours,

William F. Carr

Attorney for EOG Resources, Inc.

Enclosures

cc.

Patrick J. Tower, Project Landman

EOG Resources, Inc. Post Office Box 2267 Midland, Texas 79702 Administrative application for unorthodox well location Chocolate Chip" Federal Com Well No. 2 May 30, 2002 Page 4

# **NOTIFICATION LIST**

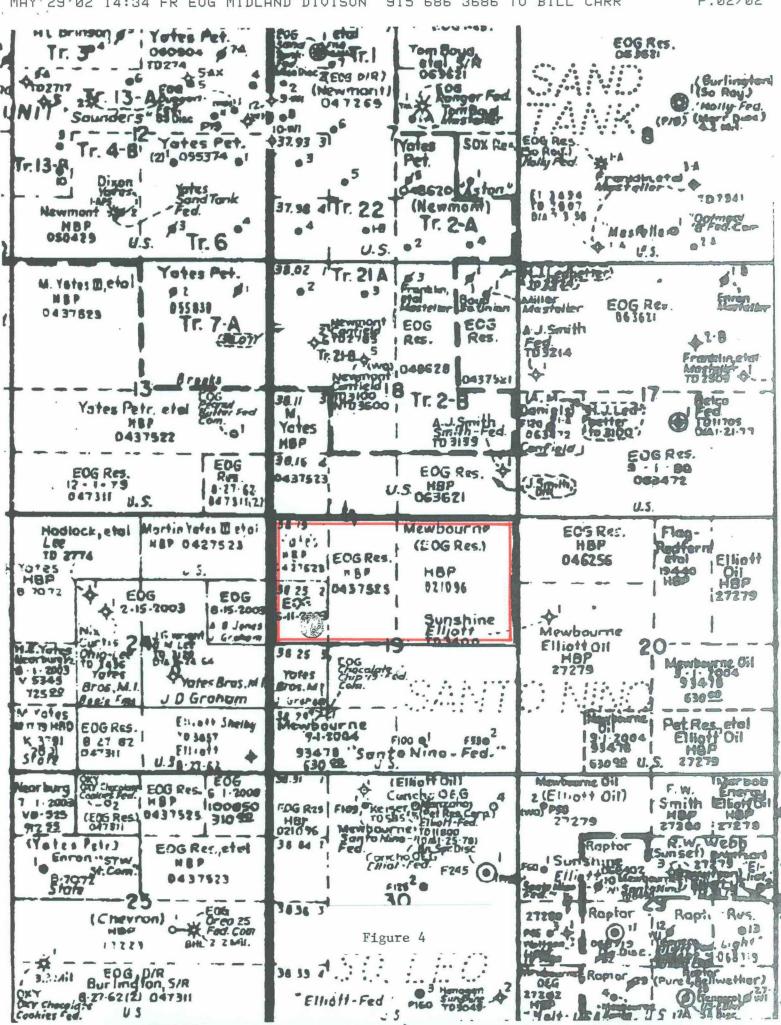
Application of EOG Resources, Inc.
administrative approval of an unorthodox gas well location
Chocolate Chip "19" Federal Com Well No. 2
320 acres (North Half)
Section 19, Township 18 South, Range 30 East, NMPM
Lea County, New Mexico.

Read and Stevens, Inc.
Post Office Box 1518
Roswell, New Mexico 88202-1518

Attention: Robert Watson Land Manager

Paul Slayton and Patricia Slayton Post Office Box 2035 Roswell, New Mexico 88202-2035

Yates Petroleum Corporation 105 South Fourth Street Artesia, New Mexico 88210 Attention: Robert Bullock



EOG Resources, Inc. Post Office Box 2267 Midland, Texas 79705

Attention: Patrick J. Tower

Administrative Order NSL-

Dear Mr. Tower:

Reference is made to the following: (i) your application dated May 28, 2002 on behalf of the operator, EOG Resources, Inc. ("EOG"); and (ii) the records of the New Mexico Oil Conservation Division ("Division") in Santa Fe: all concerning EOG's request for a non-standard gas well location to be applicable to any and all formations and /or pools from the surface to the base of the Mississippian Chester formation that are:

- (1) developed on 320-acre spacing; and
- (2) governed by the provisions of Division Rule 104.C (2), revised by Division Order No. R-11231, issued by the New Mexico Oil Conservation Commission in Case No. 12119 on August 12, 1999, which presently includes but is not necessarily limited to the Undesignated North Turkey Track-Morrow Gas Pool.

The N/2 of Section 19, Township 18 South, Range 30 East, NMPM, Lea County, New Mexico is to be dedicated to this well in order to form a standard 320-acre lay-down spacing and proration unit.

This application has been duly filed under the provisions of Division Rule 104.F, as revised.

The geological interpretation submitted with this application indicates that a well drilled at the proposed unorthodox gas well location will be at a more favorable position within the targeted Morrow Channel system than a well drilled at a location considered to be standard for the Undesignated North Turkey Track- Morrow Gas Pool, which is the primary zone of interest within the proposed unit.

By the authority granted me under the provisions of Division Rule 104.F (2), as revised, the following described well to be drilled at an unorthodox gas well location within this 320-acre unit is hereby approved:

Chocolate Chip "19" Federal Com Well No. 2 2124' FNL & 944' FWL (Unit E) Jurisdiction of this case is retained for the entry of such further orders as the Division may deem necessary.

Sincerely,

Lori Wrotenbery Director

cc: New Mexico Oil Conservation Division - Hobbs U. S. Bureau of Land Management - Carlsbad

# HOLLAND & HART LLP ATTORNEYS AT LAW

DENVER · ASPEN
BOULDER · COLORADO SPRINGS
DENVER TECH CENTER
BILLINGS · BOISE
CHEYENNE · JACKSON HOLE
SALT LAKE CITY · SANTA FE
WASHINGTON, D.C.

P O. BOX 2208 SANTA FE, NEW MEXICO 87504-2208 110 NORTH GUADALUPE, SUITE 1 SANTA FE. NEW MEXICO 87501-6525 TELEPHONE (505) 988-4421 FACSIMILE (505) 983-6043

William F. Carr

wcarr@hollandhart.com

May 30, 2002

## <u>CERTIFIED MAIL</u> RETURN RECEIPT REQUESTED

### TO AFFECTED WORKING INTEREST OWNERS

Re:

Application of EOG Resources, Inc. administrative approval of an unorthodox well location for its Chocolate Chip "19" Federal Com Well No. 2, to be drilled at a location 2124 feet from the North line and 944 feet from the West line of Section 19, Township 18 South, Range 30 East, N.M.P.M., Lea Eddy County, New Mexico.

### Ladies and Gentlemen:

Enclosed is a copy of the above-referenced application and attached plat which was filed with the New Mexico Oil Conservation Division on this date by EOG Resources, Inc. for administrative approval of an unorthodox well location for its Chocolate Chip "19" Well No. 2, to be drilled at an unorthodox location 2124 feet from the North line and 944 feet from the West line of Section 19, Township 18 South, Range 30 East, N.M.P.M., Lea County, New Mexico.

As an owner of an interest which may be affected by the proposed well, you may object to this application. Objections must be filed in writing at the Division's Santa Fe office located at 1220 South Saint Francis Drive, Santa Fe, New Mexico 87505 within twenty days from this date. If no objection is received within this twenty-day period, this application for unorthodox well location may be approved.

Very truly yours.

William F. Carr

Attorney for EOG Resources, Inc.

### Enclosures

cc:

Patrick J. Tower EOG Resources, Inc.

# LARGE FORMAT EXHIBIT HAS BEEN REMOVED AND IS LOCATED IN THE NEXT FILE

# LARGE FORMAT EXHIBIT HAS BEEN REMOVED AND IS LOCATED IN THE NEXT FILE

# LARGE FORMAT EXHIBIT HAS BEEN REMOVED AND IS LOCATED IN THE NEXT FILE