STATE OF NEW MEXICO ENERGY, MINERALS, AND NATURAL RESOURCES DEPARTMENT OIL CONSERVATION DIVISION

IN THE MATTER OF THE HEARING CALLED BY THE OIL CONSERVATION DIVISION FOR THE PURPOSE OF CONSIDERING:

CASE NO. 15416 ORDER NO. R-14195

APPLICATION OF ENCANA OIL AND GAS (USA), INC. FOR APPROVAL OF A 640-ACRE NON-STANDARD PROJECT AREA COMPRISED OF ACREAGE SUBJECT TO A SINGLE FEDERAL LEASE; FOR APPROVAL TO DOWNHOLE COMMINGLE PRODUCTION FROM THE TWO POOLS UNDERLYING THIS ACREAGE; AND FOR ALLOWABLE OF 330 FOOT SETBACKS FROM THE EXTERIOR OF THE PROPOSED PROJECT AREA, SAN JUAN COUNTY, NEW MEXICO

ORDER OF THE DIVISION

BY THE DIVISION:

This case came on for hearing at 8:15 a.m. on February 18, 2016, at Santa Fe New Mexico, before Examiner William V. Jones.

NOW, on this 28th day of July, 2016, the Division Director, having considered the testimony, the record, and the recommendations of the Examiner,

FINDS THAT:

- (1) Due public notice has been given, and the Division has jurisdiction of this case and its subject matter.
- (2) Encana Oil and Gas (USA), Inc. ("Applicant" or "Encana") seeks approval of a 640-acre non-standard project area for oil production from the Mancos formation [Nageezi-Gallup Pool and Basin-Mancos Gas Pool] comprised of all of Section 10, Township 23 North, Range 8 West, NMPM, in San Juan County, New Mexico.
- (3) The E/2 of Section 10 is located within the Basin-Mancos Gas Pool (97232) created by Division Order No. R-12984, which requires 320-acre spacing units and 660-foot setbacks from the outer boundary of the spacing unit.

- (4) The W/2 of Section 10 is in the Nageezi-Gallup Pool (47540) which pool is "unlisted" under Division Order No. R-12984 and subject to Statewide Rule 19.15.15.9(A) NMAC, which rule provides for 40-acre spacing and proration units and 330-foot setbacks from the outer boundary of the spacing unit.
- (5) Encana seeks approval to complete wells as near as 330 feet to the outer boundary of the project area, which is an exception to the rules for the Basin-Mancos Gas Pool.
- (6) Encana also seeks approval of downhole commingling of all Mancos horizontal wells within the project area between the two pools.
- (7) Applicant appeared at the hearing through counsel and presented the following testimony from a Landman and Geologist:
 - (a) Section 10 is federal acreage and covered in whole by one federal lease. The lease is held by production (HBP). Within Section 10, the leasehold ownership, operating rights, and record title are owned by Applicant at 100 percent. There are no over-riding royalty owners. Applicant obtained the record title for this lease from QEP Energy.
 - (b) Applicant seeks relief to orient wells for maximum recovery. Applicant intends to drill multiple horizontal wells within Section 10 in the Mancos formation in a general direction from southeast to northwest. That transverse direction is needed due to the belief that the maximum horizontal stress direction is in a southwest to northeast direction.
 - (c) Applicant expects this portion of the Mancos formation to be productive of primarily oil. The oil gravity and gas heating value are expected to be consistent across Section 10.
 - (d) Applicant identified and provided notice to all working interest owners and operators of spacing units or potential spacing units surrounding Section 10. Addresses were found for all affected parties, but two green cards were returned as undeliverable; therefore notice was published in a newspaper of general circulation within San Juan County.
 - (e) The project area would consist of one stand-up Basin-Mancos Gas Pool spacing unit located in the east half of Section 10 and eight 40-acre Nageezi-Gallup Pool spacing units located in the west half of Section 10.
 - (f) The preferred target for horizontal wells would be the Gallup sandstone member of the Mancos formation ("Gallup"). All acreage within Section 10 is expected to be prospective. This was shown with two cross-sections.

- (g) The prospective Gallup in Section 10 is correlative to that being produced in the Betonnie Tsosie Wash Unit located to the east.
- (h) Applicant intends to drill transverse (diagonal) wells in sufficient number to eventually penetrate (or develop) all nine of the spacing units in this Section 10, although the shorter length wells would not be economical to drill at this time.
- (i) Applicant intends to allocate production from all wells, including the first well drilled, equally to both pools. The proposed downhole commingle would consist of allocating 50 percent of all production from any well in this project area to each of the two pools included in this project area.

The Division Concludes That:

- (8) Applicant adequately showed that it needs flexibility in locating diagonally drilled horizontal Mancos wells within Section 10. Applicant has also shown that the ownership in Section 10 is identical, there is a need for 330-foot setbacks, and the application was unopposed.
- (9) The proposed diagonal drilling configuration would require some wells to be shorter in horizontal length than others and, as testified by Applicant's witness, those short wells would be uneconomical. The probability of developing all of the oil spacing units within the W/2 of Section 10 with horizontally drilled Mancos wells is very low.
- (10) This proposed project area would awkwardly straddle portions of two pools, one of which is considered gas and the other oil, both with differing spacing sizes. The proposal to include eight 40-acre oil spacing units and one 320-acre gas spacing unit within the same one section project area may not be the optimum way to accomplish this and still remain compliant with the requirement in Division rules to only include spacing units within a project area that are "developed" by a well completion.
- (11) Applicant's proposal to form a project area as described over Section 10 covering two separate pools and downhole commingling the Mancos production from this area with a 50:50 allocation between the two pools should be denied.
- (12) Division records indicate that there are no proposed or active vertically or horizontally drilled Nageezi-Gallup Pool well completions within the W/2 of Section 10 and therefore no impediment to contracting the Nageezi-Gallup Pool from the W/2 of Section 10. Encana did not make application in this case for such contraction, but would be free, after consultation with the Division's geologist in the Aztec district, to make application for pool contraction.

- (13) After a nomenclature hearing effecting this contraction, the Basin-Mancos Gas Pool will automatically expand per Division Rule R-12984 into the W/2 of Section 10. Applicant would then be free to form a project area within the Basin-Mancos Gas Pool consisting of two standard gas spacing units and drill wells in the direction and density as allowed by well performance.
- (14) Applicant has provided notice to all affected parties surrounding Section 10 of its intention to complete horizontal wells as near as 330 feet from the section line and has received no protests. Applicant's proposal for wells within Section 10 to be located as near as 330 feet from the outside of Section 10 should be granted.

IT IS THEREFORE ORDERED THAT:

- (1) The application of Encana Oil and Gas (USA), Inc. ("Encana") for approval of a 640-acre non-standard project area comprised of portions of the Nageezi-Gallup Pool and the Basin-Mancos Gas Pool and consisting of all of Section 10, Township 23 North, Range 8 West, NMPM, in San Juan County, New Mexico is hereby denied.
- (2) The portion of Encana's application asking for approval of downhole commingling of production from horizontal Mancos wells to be located within Section 10, between two separate pools in a 50:50 allocation, is denied without prejudice.
- (3) The portion of Encana's application to allow 330-foot setbacks for horizontal Mancos well completions within Section 10 or within any future Basin-Mancos Gas Pool project area consisting solely of Section 10 is hereby approved.
- (4) Jurisdiction of this case is hereby retained for the entry of such further orders as the Division may deem necessary.

DONE at Santa Fe, New Mexico, on the day and year hereinabove designated.

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STATE OF NEW MEXICO
OIL CONSERVATION DIVISION

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DAVID R. CATANACH Director