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. 13064 ORDER NO. R-69-E

APPLICATION OF PALADIN ENERGY CORPORATION TO ABOLISH THE SPECIAL POOL RULES AND REGULATIONS FOR THE BAGLEY SILURO-DEVONIAN POOL, LEA COUNTY, NEW MEXICO.

ORDER OF THE DIVISION

<u>BY THE DIVISION;</u>

This case came on for hearing at 8:15 a.m. on May 22, 2003, at Santa Fe, New Mexico, before Examiner David R. Catanach.

NOW, on this 24th day of September, 2003, 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) The applicant, Paladin Energy Corporation ("Paladin"), seeks to abolish the "Special Pool Rules for the Bagley Siluro-Devonian Pool," Lea County, New Mexico, as established by Division Order No. R-69, as amended, dated May 1, 1951, which require:

- (a) standard **80-acre** spacing and proration units to comprise either the E/2 or W/2 of a single governmental quarter section; and
- (b) each well drilled to be located either in the northwest or southeast quarter of the quarter section containing the proration unit, and also to be located within 150 feet of the center of such quarter-quarter section.

Case No. 13004 Order No. R-69-E Page-2-

C

(3) Paladin further seeks an order directing that the Bagley Siluro-Devonian Pool be governed by Division Rule No. 104.B., which requires standard 40-acre spacing and proration units with wells to be located no closer than 330 feet to the outer boundary of the spacing unit.

(4) Pursuant to Division Rule No. 505.A., the current allowable for a standard 80-acre spacing unit within the Bagley Siluro-Devonian Pool is 400 barrels of oil and 800 MCF of gas per day.

(5) The Bagley Siluro-Devonian Pool currently comprises the followingdescribed area in Lea County, New Mexico:

Township 11 South. Range 33 East. NMPM	
Section 33:	SE/4
Section 34:	S/2, NE/4
Section 35:	S/2, NW/4, S/2 NE/4
Section 36:	SW/4
Township 12 South. Range 33 East. NMPM	
Section 1:	W/2
Sections 2 & 3:	All
Section 4:	E/2
	\mathbf{E}/\mathbf{Z}
Section 10:	E/2 E/2

(6) Apache Corporation ("Apache"), an interest owner in the Bagley Siluro-Devonian Pool, appeared at the hearing in opposition to the application. Subsequent to the hearing however, and by letter dated July 9, 2003, Apache informed the Division that it has reached a settlement with Paladin and therefore withdraws its objection to the application.

W/2

(7) Paladin presented evidence that demonstrates that:

Section 12:

(a) the Bagley Siluro-Devonian Pool was discovered in 1950;

Case No. 13004 Order No. R-69-E Page -3-

> (b) in addition to establishing the special pool rules, Division Order No. R-69, as amended, also granted numerous exceptions to the 80-acre spacing unit requirement;

- (c) by virtue of the initial exceptions to 80-acre spacing granted by the Division, and through continued development of the pool since 1950, the Bagley Siluro-Devonian Pool has effectively been developed on 40-acre spacing;
- (d) of the approximately **31** wells that have produced from the pool, only eight are currently active;
- (e) the eight active wells are generally located in the S/2 of Section 35 and the N/2 of Section 2 in the area encompassing the crest of this Devonian structure;
- (f) the eight active wells are located within six standard 80-acre spacing units and one 40-acre non-standard spacing unit; and
- (g) Paladin and Samson Resources Company ("Samson") are the only two operators of active wells in the Bagley Siluro-Devonian Pool. Samson is in agreement with Paladin regarding the proposed future development of this pool.

(8) Paladin has recently drilled its State BT "C" Well No. 5 in the NE/4 SW/4 of Section 35. The well is producing approximately 284 barrels of oil and 1200 barrels of water per day.

(9) Paladin presented geologic and engineering evidence that demonstrates

(a) the Bagley Siluro-Devonian Pool is a thick, fractured dolomite with a strong bottom water drive;

 \cap

that:

Case No. 13004 Order No. R-69-E Page -4-

- (b) wells in this generally depleted pool typically produce large volumes of water, and are produced by means of submersible pumps;
- (c) water has reached the top of this Devonian structure as evidenced by the high water cuts within the active producing wells;
- (d) water coning from the strong bottom water drive has created thin, bypassed oil columns that will not be drained by the existing active wells in the pool. This is evidenced by the production data from the Paladin State BT "C" Well No. 5, which is flanked to the east, west, southeast and south by wells that have cumulatively produced approximately 6.0 million barrels of oil;
- (e) production data show no interference from wells producing on 40-acre spacing;
- (f) future wells or recompletions in this pool will likely target thin, bypassed oil columns, and will drain areas less than 40 acres; and
- (g) the current economics of drilling or recompleting wells in this pool, especially as they relate to water disposal costs, favor wells spaced on 40 acres;

(10) Paladin's evidence regarding the ownership within the active spacing units in the Bagley Siluro-Devonian Pool demonstrates that:

- (a) the acreage contained within the seven active spacing units is all state lands;
- (b) none of the six active 80-acre spacing units are comprised of more than one state lease; and

 \cap

Case No. 15004 Order No. R-69-E Page -5-

> (c) the working interest ownership is common throughout each of the six active 80-acre spacing units.

(11) The ownership evidence presented by Paladin establishes that abolishing the *"Special Pool Rules for the Bagley Siluro-Devonian Poor* will not deprive any interest owner of the benefits of a producing well or result in any interest owner receiving less than what that interest owner is receiving under the existing 80-acre spacing.

(12) The geologic evidence presented by Paladin demonstrates that wells within the Bagley Siluro-Devonian Pool do not effectively drain 80 acres, and any future wells or recompletions will likely drain areas considerably less than 80 acres.

(13) All operators **and/or** interest owners within the Bagley Siluro-Devonian Pool and all operators of Devonian wells within one mile of the pool boundaries were notified of this application.

(14) With the exception of Apache, no operator or interest owner appeared at the hearing in opposition to the application.

(15) Approval of the subject application will allow the operators in the Bagley Siluro-Devonian Pool to economically recover remaining oil reserves that may otherwise not be recovered, thereby preventing waste, and will not violate correlative rights.

IT IS THEREFORE ORDERED THAT;

(1) Pursuant to the application of Paladin Energy Corporation, the *"Special Pool Rules for the Bagley Siluro-Devonian Pool"* as established by Division Order No. R-69, as amended, are hereby rescinded.

(2) The Bagley Siluro-Devonian Pool shall be governed by the provisions of Division Rule No. 104.B., which requires standard 40-acre spacing and proration units with wells to be located no closer than 330 feet to the outer boundary of the spacing unit. In accordance with Division Rule No. 505.A., the Bagley Siluro-Devonian Pool is hereby assigned a depth bracket allowable of 320 barrels of oil and 640 MCF of gas per day.

(3) In accordance with the new spacing rules, any operator of a well within the Bagley Siluro-Devonian Pool shall, within 60 days from the date of this order, file with the Hobbs District Office of the Division a Form C-102 dedicating 40 acres to the well. Failure to file Form C-102 in a timely manner may subject the well to cancellation of allowable.

 \sim

Case No. 13004 Order No. R-69-E Page -6-

(4) Jurisdiction 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.



STATE **OF** NEW MEXICO OIL CONSERVATION DIVISION

tenberg L'ORJ WROTENBERY Director

SEAL

1