

District 6 Rule 37 Case No. 0208838

APPLICATION OF SAMSON INTERNATIONAL, LTD. (FORMERLY SAMSON RESOURCES COMPANY) FOR AN EXCEPTION TO STATEWIDE RULE 37 TO DRILL ITS NO. 3 WELL, EVA O'BYRNE GAS UNIT, GLADEWATER (HAYNESVILLE) AND WILDCAT FIELDS, UPSHUR COUNTY, TEXAS

APPEARANCES:

REPRESENTING:

APPLICANT -

Joe Christina, Attorney	Samson International, Ltd.
David Nelson, Attorney	"
Mark H. Patheal, Reg. Land Surveyor	"
James E. Mathewson, Geologist	"
Paul Clark, Petroleum Engineer	"

PROTESTANT -

Tim George, Attorney	Exxon Corporation
Robert E. Dreyling, Technical Advisor	"

PROCEDURAL HISTORY

Application Filed:	May 9, 1995
Notice of Hearing:	May 19, 1995
Hearing Held:	June 8, 1995
PFD Circulated	August 16, 1995
Heard by:	Colin K. Lineberry, Hearings Examiner Margaret Allen, Technical Examiner

STATEMENT OF THE CASE

Samson International, Ltd. ("Samson" or "applicant") seeks an exception to Statewide Rule 37 to drill its proposed Well No. 3 on the Eva O'Byrne Gas Unit in the Gladewater (Haynesville) and Wildcat Fields. The application is protested by Exxon Corporation ("Exxon" or "protestant"). The proposed well location complies with the statewide spacing and density rules applicable to the Wildcat Field. An exception is necessary, however, to the Gladewater (Haynesville) Field Rules. Those rules mandate spacing of 1000 feet from unit lines and 1867 feet between wells, with 640 acre regular units (10% tolerance) and optional 320 acre units.

The applied-for location is regular as to lease lines but only 1766 feet from well No. 2 on the unit. Accordingly, an exception to Statewide Rule 37 is necessary. The L-shaped Eva O'Byrne Gas Unit contains 665.10 contiguous acres and Samson already has two wells on the unit producing from the Gladewater (Haynesville) Field. Accordingly, a density exception pursuant to statewide Rule 38 is also necessary for Samson to drill the proposed Well No. 3.

Samson (under its former name "Samson Resources Company") previously filed an application for exceptions to Rules 37 and 38 for a well at the same location as is proposed in this proceeding. That prior application was docketed as Case No. 0207455, was also protested by Exxon, and was heard on October 28, 1994 (the "prior hearing"). During the prior hearing, Samson withdrew its request for an exception to Rule 37, stated that the proposed well would be drilled as a directional well with a bottom location regular as to lease lines and between well spacing, and requested only a Rule 38 exception for any regular location.

A Commission order granting Samson a Rule 38 exception as requested was signed on February 28, 1995 and became final on April 4, 1995 when the Commission overruled Exxon's motion for rehearing. Samson filed this application, renewing its request for a Rule 37 exception for a well at the previously applied-for location, on May 9, 1995.

APPLICANT'S EVIDENCE AND POSITION

Applicant Samson takes the position that the previously granted Rule 38 density exception applies to the re-proposed irregular location and that therefore it is only necessary for it to obtain an exception to Rule 37 to drill its No. 3 well at the applied-for location. Samson further posits that its entitlement to an additional well to prevent confiscation was established at the prior hearing and that, as a result, no evidence of confiscation is required in this proceeding.

Samson presented evidence that a vertical well in a regular location would be expensive and/or difficult to drill because of certain surface features. A small portion of the area available as a regular location for a vertical well is covered by a lake and some of the area immediately adjacent

to the lake is sloping terrain. Samson's surveyor testified that locating a pad on this terrain would be more expensive than locating on a flat area but the difference in cost was not quantified.

Samson established that the "dry" regular area for locating a vertical well (which is east of the lake) includes portions of a residential area, a school and a school practice field. Samson's petroleum engineer testified that the proposed well would produce hydrogen sulfide, a toxic gas, at an estimated ratio of 580 parts per million. Samson's witnesses testified that the anticipated hydrogen sulfide production, and the resulting potential liability rendered locations in close proximity to the school and residential area infeasible.

Samson's geologist estimated an ultimate recovery of 13.12 BCF for the two existing wells on the Eva O'Byrne Gas Unit. He further testified that this estimate was unchanged from the prior hearing. Samson also presented evidence of the ultimate recovery for other wells in the Gladewater (Haynesville) Field on the tracts surrounding the Eva O'Byrne Gas Unit.

Samson asserts that, at the time of the prior hearing, drilling a directional well from a surface location on the west side of the lake to a regular location beneath the lake was economically feasible but that now, because of the reduction in the price paid for gas, a directional well would not be economically feasible. Samson's petroleum engineer testified that the difference in production between the proposed irregular well and a directional well to a regular location would be insignificant but that drilling a directional well would add \$171,000 to the estimated \$1.35 million cost of a vertical well.

Samson's engineer further testified that Samson requires an anticipated return on investment (ROI) of 2.0 and a rate of return (ROR) of 20% in determining whether to drill a well. Samson determined ROI and ROR using the present low price of gas and Samson's "best case" estimated recovery from the well of 4 BCF of gas. Samson's engineer testified that, using those parameters, a vertical well would have a ROI of 1.8 and a ROR of 18%, while a directional well would have a ROI of 1.6 and a ROR of 13%. The estimated ROI and ROR would be less if the well produced less than the "best case" 4 BCF estimate. The engineer testified further that although the ROI and ROR for both a vertical and a directional well are less than Samson's economic guidelines, Samson's management would consider drilling the well as a straight hole. Samson would not drill a directional well given the current market conditions.

Samson concludes that it is entitled to a Rule 37 exception permit authorizing it to drill a vertical well at an irregular location on the west side of the lake (the same location it withdrew at the prior hearing) so that it will have a well that meets its criteria for economic viability.

PROTESTANT EXXON'S EVIDENCE AND POSITION

As a preliminary matter, Exxon asserts that the Rule 38 exception that Samson obtained in

the prior hearing is not valid for the applied-for location. Exxon further contends that the issues decided in the prior hearing are not conclusive in this proceeding as conditions have changed during the intervening period of time.

Exxon presented evidence, hotly disputed by Samson, that Exxon had drilled directional wells in the Gladewater (Haynesville) Field for several hundred thousand less than the costs estimated by Samson. Exxon's expert testified that an S-curve directional well of the magnitude required could be drilled for \$50,000 to \$100,000 more than a vertical well, as opposed to the \$171,000 differential cost estimated by Samson for a "build and hold" directional well.

Exxon presented evidence that in seven of the eight months subsequent to the data presented by Samson at the prior hearing, Samson's existing wells on the Eva O'Byrne Gas Unit had recovered more gas than Samson had projected would be recovered. Based on this additional data, Exxon's engineer estimated that the ultimate recovery by the two existing Samson wells would be higher than was estimated by Samson at the prior hearing. According to Exxon's interpretation of the decline curve with the additional points, Samson's No. 1 Well on the Eva O'Byrne Gas Unit will ultimately recover 9-11 BCF rather than the 8.07 BCF estimated by Samson. Exxon established that the applied-for location is 350 feet closer to Exxon's unit line than the nearest regular location would be.

Exxon contends that Samson failed to establish the elements of a prima facie case for an exception to Rule 37 based on confiscation.

EXAMINERS' OPINION

1. Rule 38 Exception

Samson already has two wells producing from the Gladewater (Haynesville) Field on the Eva O'Byrne Gas Unit. As the field rules require a minimum unit size of 320 acres, Samson must have an exception to the well density requirements of Rule 38 in order to produce the applied-for third well concurrently with the two existing wells. Samson takes the position that the Final Order in Docket No. 06-0207455 authorizes a rule 38 exception for the re-applied for well location sought in this proceeding. The examiners disagree.

The order at issue is unambiguous and grants the applicant precisely the relief it requested - the right to drill a third well **at any regular location**. The pertinent portion of the Final Order in Oil & Gas Docket No. 06-0207455 states:

The Rule 38 exception is only valid for a period of two years from the date this order becomes final **for a regularly spaced location** on the [Eva O'Byrne Gas Unit] ...

(emphasis added). As with court judgments, if an agency order is unambiguous, its effect is declared, "... in light of the literal meaning of the language employed. *P.U.C. v. Coalition of Cities for Affordable Utility Rates*, 776 S.W.2d 224, 227 (Tex. App. -- Austin 1989, *mand. overr.*). The applied-for location in this proceeding is an irregular location and is not covered by the unambiguous terms of the order. A Rule 38 exception for the applied-for irregular location is necessary and has not been requested in this proceeding.

2. Rule 37 Exception

Exceptions to Statewide Rule 37 may be granted to prevent waste or to protect correlative rights/prevent confiscation. There is no allegation that an exception is necessary in this case to prevent waste. To obtain an exception to Statewide Rule 37 to protect correlative rights, the applicant must show: 1) It is not possible for the applicant to recover his fair share by placing the well at any regular location.; and, 2) that the proposed irregular location is reasonable and is necessary due to surface or subsurface conditions.

a. Effect of Prior Hearing

Applicant Samson takes the position that the first element of its confiscation case -that a well at the applied-for irregular location is necessary for it to obtain its fair share of hydrocarbons under its tract - is conclusively established by the grant of the Rule 38 exception in the prior hearing. Exxon asserts that the none of the issues determined in the prior hearing are conclusively established for purposes of this proceeding, apparently because of changed circumstances. It is true that the Commission may re-adjudicate an issue if there is a material change in conditions. *Sexton v. Mount Olivet Cemetery Association*, 720 S.W.2d 129, 139 (Tex. App. -- Austin 1986, *writ ref'd n.r.e.*). Exxon failed, however, to demonstrate any material change of conditions between the prior hearing and this proceeding.

Determining exactly what issues have been conclusively established by the prior hearing requires more analysis. Clearly, the Final Order in Docket No. 06-0207455 conclusively establishes Samson's entitlement to a third well on the Eva O'Byrne Gas Unit in any regular location, as expressly provided by the terms of the order. As to specific issues, the doctrine of collateral estoppel governs whether determinations made in the prior hearing between these parties are conclusively established for purposes of this proceeding.

Collateral estoppel precludes the re-litigation of specific issues of fact or law that were actually litigated in an earlier proceeding. *Van Dyke v. Boswell, O'Toole, Davis & Pickering*, 697 S.W.2d 381, 384 (Tex. 1985). The doctrine of collateral estoppel applies to prior adjudication of issues by administrative agencies, such as the Railroad Commission, that act in a judicial or quasi-judicial capacity. *Muckelroy v. Richardson I.S.D.*, 884 S.W.2d 825, 830 (Tex. App. -- Dallas 1994, *writ denied*); *Magnolia Petroleum Co. v. Railroad Commission*, 96 S.W.2d 273, 275 (Tex. 1936). Collateral estoppel only applies to conclusively establish an issue when:

- 1. The issue sought to be litigated in the second action was fully and fairly litigated
- in the prior action;
- 2. The issue was essential to the judgment in the first action; and,
- 3. The parties were cast as adversaries in the first action.

El Paso Natural Gas Co. v. Berryman, 858 S.W.2d 362, 364 (Tex. 1993); *Mower v. Boyer*, 811 S.W.2d 560, 563 (Tex. 1991); *Eagle Properties, Ltd. v. Scharbauer*, 807 S.W.2d 714, 721 (Tex. 1990).

It is undisputed that the parties to this proceeding were adversaries in the prior hearing. However, the other two elements necessary to the invocation of collateral estoppel do not exist with regard to the issue of Samson's purported entitlement to a well **at an irregular location** to prevent confiscation. The issue of whether Samson had to have an irregular location in order to recover its fair share of gas was not fully and fairly litigated at the prior hearing. In fact, it was not litigated at all, since Samson expressly limited its application to regular locations. Similarly, resolution of the issue of the necessity for an irregular location was not essential to the judgment in the prior hearing since the judgment was expressly limited to "any regular location." Accordingly, collateral estoppel does not establish that applicant is entitled to a well at the **irregular** location sought in this proceeding in order to recover its fair share of hydrocarbons and applicant was required to prove that element of its case by evidence presented in this proceeding.

b. Inability to Recover Fair Share from Regular Location

Applicant did not present evidence in the current proceeding establishing that it could not recover its fair share from a well in a regular location. In fact, Samson's engineer testified that the difference in production between the applied-for well and a regularly spaced well at the location previously requested would be "insignificant." Since a regular well would recover the same volume of gas as an irregular well at the applied-for location, no spacing exception is warranted. Applicant failed to carry its burden on the first required element of confiscation.

c. Reasonableness and Necessity of Applied-for Irregular Location

Applicant similarly failed to carry its burden of establishing that the applied-for irregular location is reasonable and necessary due to surface or subsurface conditions. At the prior hearing, applicant Samson determined that directionally drilling from the west side of the lake to a regular location was feasible. Samson's witnesses acknowledged that at the time of the prior hearing Samson was fully aware of the lake, school, topography east of the lake, and other features that render drilling on the east side of the lake more difficult and expensive.

The sole reason that Samson has concluded that drilling to a regular location is no longer feasible, even though it was at the time of the prior hearing, is the decline in the price paid for gas between last fall and this summer. Because of this decline, the proposed well has fallen even farther from meeting the economic criteria that Samson sets for itself in deciding whether to drill a well. Reduced to its essence, Samson's position is that an irregular location was not reasonable and

necessary in the fall when gas prices were high but has become reasonable and necessary in the summer when gas prices are low.

Neither Samson nor any other operator is guaranteed a well that meets its self-imposed criteria for economic viability - each operator is guaranteed a fair and equal **opportunity** to recover its fair share of the hydrocarbons under its tract. Rule 37 is equally applicable to all operators. While the non-discriminatory application of Commission spacing rules may result in some economic loss by Samson, this loss does not amount to legal confiscation. **See** *Railroad Commission v*. *Manziel*, 361 S.W.2d 560, 565 (Tex. 1962); *Railroad Commission v*. *Fain*, 161 S.W.2d 498, 500 (Tex. Civ. App. -- Austin 1942, writ dism'd w.o.m.). The determination of what is a fair opportunity must be based on the relationship between potential drill site locations and the currently recoverable reserves under a tract, not on economic viability guidelines that each operator selects for itself.¹

Samson is not being denied an opportunity to recover its fair share of hydrocarbons, it can drill a third well today (or any future day before its Rule 38 exception expires in two years) in any regular location on the unit. By its own evidence, a regular well will recover essentially the same amount of hydrocarbons as the applied-for irregular well which would be 350 feet closer to protestant Exxon's unit line.

Even if economic viability could form a valid basis for an exception, Samson's economic evidence is not entirely credible. Samson's calculations of ROI and ROR are based on the assumption that, throughout the entire estimated 20-25 year life of the well, the price Samson receives for gas will remain at the same low price that existed at the time of the hearing. Samson's management also prepared ROI and ROR calculations assuming a reasonable escalation in the price received for gas, but Samson chose not to present those calculations at the hearing.

Samson has failed to carry its burden of proof as to either of the elements required for a grant of a Rule 37 exception based on confiscation and its application should be denied.

FINDINGS OF FACT

1. Notice of the hearing was given at least 10 days prior to the hearing to all designated operators, lessees of record for tracts that have no designated operator, and owners of record of unleased mineral interests for each adjacent tract and each tract nearer to the well than the prescribed minimum lease-line spacing distance.

¹ Allowing exceptions based on operator's calculations of economic viability, as Samson seeks here, could lead to anomalous and even absurd results. Directly relevant to this proceeding, an operator might be granted an exception if he applied in the summer when gas prices are low but denied if he applied in the winter when gas prices are high. Other examples include: an operator who judged wells based on a ROR of 15% might be denied an exception while an operator who insisted on a 20% ROR would get an exception; an operator who was very cost conscious and could drill and complete a given well for \$600,000 might be denied an exception while an inefficient operator who would expend \$1 million to drill the same well would be entitled to an exception.

- 2. Samson International, Ltd., formerly known as Samson Resources Company, ("applicant") has applied on Form W-1 for a permit to drill Well No. 3 on the Eva O'Byrne Gas Unit. Applicant proposes to drill its well at a location 1000 feet from the west line and 1000 feet from the south line of the unit, and 1000 feet from the west line and 1000 feet from the south line of the survey. Applicant has applied for completion of its proposed well in the Gladewater (Haynesville) Field and the Wildcat Field.
- 3. The Gladewater (Haynesville) Field has field rules requiring spacing of 1000 feet from unit lines and 1867 feet between wells. The field rules further specify a density pattern of 640 acres per well with optional 320 acre spacing.
- 4. Applicant's Eva O'Byrne Gas Unit is an L-shaped tract containing 665.10 acres.
- 5. The applied-for location of applicant's Well No. 3 is 1766 feet from another well on the Eva O'Byrne Gas Unit which also produces from the Gladewater (Haynesville) Field.
- 6. By final order in Oil & Gas Docket No. 06-0207455, which became final on April 4, 1995, applicant was granted an exception to the density rules for the Gladewater (Haynesville) Field authorizing it to drill a third well at any regular location on the Eva O'Byrne Gas Unit.
- 7. Applicant failed to establish that the applied-for location is necessary for it to recover the hydrocarbons currently in place under the Eva O'Byrne Gas Unit.
- 8. A well at a regular location on the Eva O'Byrne Gas Unit would recover substantially the same volume of hydrocarbons as a well at the applied-for location.
- 9. Applicant failed to establish that an exception to the well spacing rules for the applied for Gladewater (Haynesville) Field, is necessary to give the mineral interest owners a reasonable opportunity to recover their fair share of hydrocarbons in the subject fields underlying the Eva O'Byrne Gas Unit.
- 10. The applied-for location is 350 feet closer to the unit line between applicant and protestant Exxon Corporation than a regular location.
- 11. Applicant failed to establish that the sloping nature of the terrain, the location of the lake on the unit, the potential hydrogen sulfide production, or the existing surface estate development and uses render the applied-for irregular location necessary.
- 12. Applicant selected the applied-for location because of economic considerations arising from decreases in the price paid for natural gas during the last year.
- 13. Applicant failed to establish that the applied-for irregular location is reasonable or that it is necessary due to surface or subsurface conditions.

CONCLUSIONS OF LAW

- 1. Proper notice of hearing was timely given to all persons legally entitled to notice.
- 2. All things have occurred and have been done to give the Commission jurisdiction to decide this matter.
- 3. The final order on Oil & Gas Docket No. 06-0207455 does not grant an exception to Statewide 38 for the irregular location applied for in this docket.
- 4. An exception to Statewide Rule 37 for a well at the applied-for location in not necessary to prevent confiscation.

RECOMMENDATION

The examiners recommend that the subject application be denied in accordance with the attached final order.

Respectfully submitted,

Colin K. Lineberry Hearings Examiner Margaret Allen Technical Examiner