55 OATEIN 1/23/15 SUSPENSE

ABOVE THIS LINE FOR DIVISION USE ONLY

LOGGED IN 7/24/15

NEW MEXICO OIL CONSERVATION DIVISION

ENGINEER MAM

- Engineering Bureau -

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



DHC

TYPE

APP NO 0 JA61520528576

ADMINISTRATIVE APPLICATION CHECKLIST

TH	IS CHECKLIST IS I	MANDATORY FOR ALL ADMINISTRATIVE APPLICATIONS FOR EXCEPTIONS TO DIVISION RULES AND REGULATIONS WHICH REQUIRE PROCESSING AT THE DIVISION LEVEL IN SANTA FE
Applica	ation Acronyn	16:
		andard Location] [NSP-Non-Standard Proration Unit] [SD-Simultaneous Dedication]
		vnhole Commingling] [CTB-Lease Commingling] [PLC-Pool/Lease Commingling] ool Commingling] [OLS - Off-Lease Storage] [OLM-Off-Lease Measurement]
		[WFX-Waterflood Expansion] [PMX-Pressure Maintenance Expansion]
		[SWD-Salt Water Disposal] [IPI-Injection Pressure Increase]
	[EOR-Qui	alified Enhanced Oil Recovery Certification] [PPR-Positive Production Response] \mathcal{VHC} $\mathcal{A}_{\mathcal{P}}^{\mathcal{P}}\mathcal{S}_{\mathcal{P}}$
[1]	TYPE OF A	PPLICATION - Check Those Which Apply for [A]
	[A]	[SWD-Salt Water Disposal] [IPI-Injection Pressure Increase] alified Enhanced Oil Recovery Certification] [PPR-Positive Production Response] DHC 4980, PPLICATION - Check Those Which Apply for [A] Location - Spacing Unit - Simultaneous Dedication Well: Britt & H51, 52, 53, 54,55 NSL NSP SD
	Chec	k One Only for [B] or [C]
	[B]	
	[2]	X DHC CTB PLC PC OLS OLM Pool Weir; bline by
	[C]	Injection - Disposal - Pressure Increase - Enhanced Oil Recovery +3 WFX PMX SWD IPI EOR PPR <u>4</u> :63780
	[D]	Other: Specify
[2]	NOTIFICAT	「ION REQUIRED TO: - Check Those Which Apply, or Does Not Apply
ſ-1	[A]	Working, Royalty or Overriding Royalty Interest Owners
	,	
	[B]	X Offset Operators, Leaseholders or Surface Owner
	[C]	Application is One Which Requires Published Legal Notice
	[D]	X Notification and/or Concurrent Approval by BLM or SLO U.S. Bureau of Land Management - Commissioner of Public Lands, State Land Office
	[E]	For all of the above, Proof of Notification or Publication is Attached, and/or,
	[F]	Waivers are Attached
[3]		CCURATE AND COMPLETE INFORMATION REQUIRED TO PROCESS THE TYPE ATION INDICATED ABOVE.
[4]	CERTIFICA	TION: I hereby certify that the information submitted with this application for administrative

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.

Ashley Bergen	ashlerBean	Regulatory Speci	alist
Print or Type Name	Signature	Title	Date
		ashley.bergen@coi e-mail Address	10cophillips.com

District I 1625 N. French Drive, Hobbs, NM 88240

District II 811 S. First St., Artenia, NM 88210

District III 1000 Rio Brazos Road, Aztec, NM 87410

District IV

1220 S. St. Francis Dr., Santa Fe, NM 87505

.

State of New Mexico Energy, Minerals and Natural Resources Department

> Oil Conservation Division 1220 South St. Francis Dr. Santa Fe, New Mexico 87505

Form C-107A Revised August 1, 2011

APPLICATION TYPE Single Well Establish Pre-Approved Pools EXISTING WELLBORE Yes X No

APPLICATION FOR DOWNHOLE COMMINGLING

ConocoPhillips Compa	any	P.O. Box 518	810 Midland, TX 79710		
Operator		Address			
Britt B	55	I- 10- 20S- 37E		Lea	
Lease	Well No.	Unit Letter-Section-Tow	nship-Range	County	
OGRID No.217817	Property Code 31365	API No. 30-025-	Lease Type: X Fee	deral State	Fee

DATA ELEMENT	UPPER ZONE Skaggs Glorieta		INTERMED	DIATE ZONE	LOWER ZONE		
Pool Name			Weir- Blinebry				
Pool Code	57190		63780		47090		
Top and Bottom of Pay Section (Perforated or Open-Hole Interval)	~5230'-5351' TV	D	~5695'-6377' TV	′D	~6377-6701' TV	D	
Method of Production (Flowing or Artificial Lift)	Artifical Lift		Artifical Lift	•	Artifical Lift		
Bottomhole Pressure (Note: Pressure data will not be required if the bottom perforation in the lower zone is within 150% of the depth of the top perforation in the upper zone)	~2555		~2440		~2150		
Oil Gravity or Gas BTU (Degree API or Gas BTU)	~39		~39	·····	~39		
Producing, Shut-In or New Zone	New Zone		New Zone		New Zone		
Date and Oil/Gas/Water Rates of Last Production. (Note: For new zones with no production history, applicant shall be required to attach production estimates and supporting data.)	Date: Rates: TBD		Date: Rates: TBD		Date: Rates: TBD		
Fixed Allocation Percentage (Note: If allocation is based upon something other than current or past production, supporting data or explanation will be required.)	Oil TBD %	Gas	Oil TBD %	Gas TBD%	Oil TBD%	Gas	

ADDITIONAL DATA

Are all working, royalty and overriding royalty interests identical in all commingled zones? If not, have all working, royalty and overriding royalty interest owners been notified by certified mail?	Yes_ X Yes	No No
Are all produced fluids from all commingled zones compatible with each other?	Yes X	No
Will commingling decrease the value of production?	Yes	NoX
If this well is on, or communitized with, state or federal lands, has either the Commissioner of Public Lands or the United States Bureau of Land Management been notified in writing of this application?	Yes <u>X</u>	No
NMOCD Reference Case No. applicable to this well:	u	
 Attachments: C-102 for each zone to be commingled showing its spacing unit and acreage dedication. Production curve for each zone for at least one year. (If not available, attach explanation.) For zones with no production history, estimated production rates and supporting data. Data to support allocation method or formula. Notification list of working, royalty and overriding royalty interests for uncommon interest cases. Any additional statements, data or documents required to support commingling. 		

District I 1625 N. French Drive, Hobbs, NM 88240 District II 811 S. First St., Artesia, NM 88210

District III 1000 Rio Brazos Road, Aztec, NM 87410

District IV

1226 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico Energy, Minerals and Natural Resources Department

> Oil Conservation Division 1220 South St. Francis Dr. Santa Fe, New Mexico 87505

Form C-107A Revised August 1, 2011

APPLICATION TYPE <u>X</u> Single Well Establish Pre-Approved Pools EXISTING WELLBORE <u>Yes</u> <u>X</u>No

APPLICATION FOR DOWNHOLE COMMINGLING

ConocoPhillips Com	pany	P.O. Box 51	810 Midland, TX 79710	
Operator		Address		
Britt B	55	I- 10- 20S- 37E		Lea
Lease	Well No.	Unit Letter-Section-Tow	vnship-Range	County
OGRID No. <u>217817</u>	Property Code 31365	API No. <u>30-025-</u>	Lease Type: <u>X</u> F	ederal <u>State</u> Fee

DATA ELEMENT	UPI	PER ZO	NE	INTE	RMEDIAT	E ZONE	LOWE	R ZONE
Pool Name							Skaggs Drinkar	d
Pool Code							57000	
Top and Bottom of Pay Section (Perforated or Open-Hole Interval)							~6701'-7011' T'	VD
Method of Production (Flowing or Artificial Lift)							Artifical Lift	
Bottomhole Pressure (Note: Pressure data will not be required if the bottom perforation in the lower zone is within 150% of the depth of the top perforation in the upper zone)							~2100	
Oil Gravity or Gas BTU (Degree API or Gas BTU)		· · · · · · · · · · · · · · · · · · ·					~39 /	
Producing, Shut-In or New Zone							New Zone	
Date and Oil/Gas/Water Rates of Last Production. (Note: For new zones with no production history, applicant shall be required to attach production estimates and supporting data.)	Date: Rates:			Date: Rates:			Date: Rates: TBD	
Fixed Allocation Percentage (Note: If allocation is based upon something other than current or past production, supporting data or explanation will be required.)	Oil	G %	as %	Oil	Ga %	ıs %	Oil TBD%	Gas TBD%

ADDITIONAL DATA

Are all working, royalty and overriding royalty interests identical in all commingled zones?' If not, have all working, royalty and overriding royalty interest owners been notified by certified mail?	Yes X Yes	No No
Are all produced fluids from all commingled zones compatible with each other?	Yes X	_ No
Will commingling decrease the value of production?	Yes	NoX
If this well is on, or communitized with, state or federal lands, has either the Commissioner of Public Lands or the United States Bureau of Land Management been notified in writing of this application?	Yes X	_ No
NMOCD Reference Case No. applicable to this well:		
 Attachments: C-102 for each zone to be commingled showing its spacing unit and acreage dedication. Production curve for each zone for at least one year. (If not available, attach explanation.) For zones with no production history, estimated production rates and supporting data. Data to support allocation method or formula. Notification list of working, royalty and overriding royalty interests for uncommon interest cases. Any additional statements, data or documents required to support commingling. 	· .	

DISTRICT I 1625 N. French Dr., Hobbs, NM 86240 Phone (575) 393-6161 Fax: (575) 393-0720 DISTRICT II 1301 W. Grand Avenue, Artesia, NM 88210 Phone (575) 748-1283 Faz: (575) 748-9720 DISTRICT III 1000 Rio Brazos Rd., Aztec, NM 87410 Phone (505) 334-6175 Par: (505) 234-6170 DISTRICT IV 1220 S. St. Francis Dr., Santa Fe, NM 87505 Phone (505) 476-3460 Fax: (505) 476-3462

API Number

30-025-

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State of New Mexico Energy, Minerals and Natural Resources Department

OIL CONSERVATION DIVISION 1220 South St. Francis Dr. Santa Fe, New Mexico 87505

WELL LOCATION AND ACREAGE DEDICATION PLAT

Skaggs; Glorieta

Pool Code

57190

Revised August 1, 2011

□ AMENDED REPORT

Form C-102

Submit one copy to appropriate District Office

Pool Name

Signatu

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n1

7977

25435

Suevi

Certificate No. Gary L. Jones

BASIN SURVEYS

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Well Number Property Code Property Name BRITT B 55 31365 OGRID No. **Operator** Name Elevation 3594' 217817 CONOCO PHILLIPS Surface Location East/West line UL or lot No. Range Lot Idn Feet from the North/South line Feet from the County Section Township 1775 SOUTH 870 EAST LEA 20 S 37 E 10 Bottom Hole Location If Different From Surface Lot Idn Feet from the North/South line Feet from the East/West line County UL or lot. No. Section Township Range 37 E 20 S 1980 SOUTH 660 EAST LEA 10 Dedicated Acres Joint or Infill **Consolidation** Code Order No. NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED OR A NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION OPERATOR CERTIFICATION OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief, and that this organization either owns a working interest or unleased mineral interest in the location or has a right to drill this well at this location pursuant to a contract with an owner of such a mineral or working interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division. Mlarp BOTTOM HOLE LOCATION Lat - N 32'35'08.84" Long - W 103'13'58.52" NMSPCE - N 578593.6 E 880274.1 Signature Date Ashley Bergen Printed Name (NAD-83) Lot - N 32'35'08.40" Long - W 103'13'56.80" NMSPCE - N 578532.1 E 839091.4 ashley.hergen@cop.com Email Address SURVEYOR CERTIFICATION (NAD-27) SURFACE LOCATION I hereby certify that the well location shown Lat - N 32'35'06.81" Long - W 103'14'00.97" NMSPCE - N 578386.807 E 880066.605 on this plat was plotted from field notes of actual surveys made by me or under my supervison and that the same is true and (NAD-83) correct to the belief. Lat - N 32*35'06.38* Long - W 103*13'59.25" NMSPCE - N 578325.288 E 838883.926 NO Date Su

980

1775

(NAD-27)

DISTRICT I 1625 N. French Dr., Hobbs, NM 55240 Phone (575) 393-6161 Fax: (576) 393-0720 DISTRICT II 1301 W. Grand Avenue, Artesia, NM 88210 Phone (575) 748-1283 Fax: (575) 748-9720 DISTRICT III 1000 Rio Brazos Rd., Aztec, NM 87410 Phone (605) 334-6176 Fax: (505) 334-6170 DISTRICT IV 1220 S. St. Francis Dr., Santa Pe, NM 67505 Phone (505) 476-3450 Par: (505) 476-3452

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State of New Mexico Energy, Minerals and Natural Resources Department

OIL CONSERVATION DIVISION 1220 South St. Francis Dr. Santa Fe, New Mexico 87505

District Office

^ℓ Submit one copy to appropriate

WELL LOCATION AND ACREAGE DEDICATION PLAT

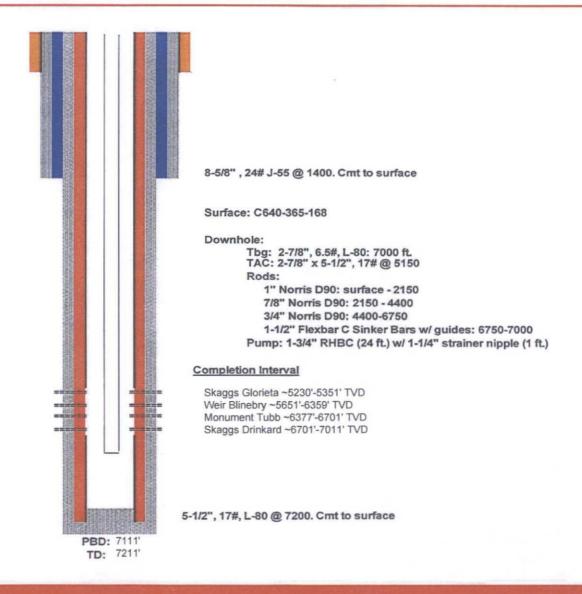
API Number **Pool Code** Pool Name 30-025-63780; 47090; 57000 Weir Blinebry; Monument Tubb; Skaggs Drinkard Well Number **Property** Code Property Name 55 BRITT B 31365 OGRID No. **Operator** Name Elevation 3594' 217817 CONOCO PHILLIPS Surface Location East/West line UL or lot No. Section Township Lot Idn Feet from the North/South line Feet from the County Range 1775 SOUTH 870 EAST LEA 10 20 S 37 E Т Bottom Hole Location If Different From Surface Feet from the Lot Idn North/South line East/West line UL or lot No. Section Range Feet from the County Township 10 20 S 37 E 1980 SOUTH 660 EAST LEA I Dedicated Acres Joint or Infill Consolidation Code Order No. NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED OR A NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION

		·
		OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief, and that this organization either owns a working interest or unleased mineral interest in the land including the proposed bottom hole location or has a right to drill this well at this location pursuant to a contract with an owner of such a mineral or working interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division.
	BOTTOM HOLE LOCATION Lat - N 32'35'08.84" Long - W 103'13'58.52" NMSPCE- N 578593.6 (NAD-83) Lat - N 32'35'08.40" Long - W 103'13'56.80" NMSPCE- N 578532.1 NMSPCE- E 839091.4 (NAD-27)	OWN Ung Date Signature Date Ashley Bergen Printed Name ashley.hergen@cop.com Email Address SURVEYOR CERTIFICATION
SURFACE LOCATION Lot - N 32*35'06.81" Long - N 32*35'06.81" NMSPCE- N 578386.807 NMSPCE- N 578386.807 Lat - N 32*35'06.38" Long - N 32*35'06.38" Long - N 32*35'06.38" Long - N 578325.288 NMSPCE- N 578325.288 NMSPCE- N 578325.283 (NAD-27) - -	BH BH BH BH BH BH BH BH BH BH BH BH BH B	I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervison and that the same is true and correct to the best of my helief. NO MALE USAN Date Surveyer States (S Signature & Seel of
	1980'	W.O. Certificate No. Gary L. Jones 7977 BASIN SURVEYS 25435

□ AMENDED REPORT

Form C-102 Revised August 1, 2011

Britt B 55 Proposed Well Schematic: Production Well





Skaggs-Glorieta Pool Commingling with Weir-Blinebry (or Weir-Blinebry East), Monument-Tubb, and Skaggs-Drinkard Pools

Britt-B Acreage Field Study and Preliminary Results

Summary

ConocoPhillips is proposing to commingle the Skaggs-Glorieta pool with the three preapproved pools, i.e., Weir-Blinebry (or Weir-Blinebry East) pool, Monument-Tubb pool, and Skaggs-Drinkard pool as a part of ConocoPhillips' Blinebry, Tubb, and Drinkard (BTD) development program in Sections 10, 11, and 15, T20S, R37E, Lea County, New Mexico. The working, net revenue, and royalty interests are the same for all pools within the lease being proposed for this commingle. The fluids from all zones are compatible. The allocation will be determined through down-hole production allocation tests after completion.

Purpose

ConocoPhillips requests to commingle the Skaggs-Glorieta ("Glorieta") with the three pre-approved pools, i.e., Weir-Blinebry (or Weir-Blinebry East) pool, Monument-Tubb pool, and Skaggs-Drinkard pools, in SW/4 NW/4 and S1/2 Section 10, W1/2 SW1/4 Section 11, and W/2 and W/2 E/2 Section 15, T20S-R37E in order to access reserves that would otherwise be stranded. Development of the Blinebry, Tubb, and Drinkard (BTD) is not competitively economic as initial production rates and recoveries are low. The commingling of these pools is expected to enhance production and boost ultimate recovery from the field. This will result in increased revenue for royalty interests and lease holder.

With commingling, the total recoverable resource in COP's Britt-B lease is estimated to be ~5.8 MMBO and 11.3 BCFG or an incremental 165 MBO and 324 MMCF per well, for up to 35 potential 40-acre and 20-acre spaced wells in the Britt-B lease. Our 2017 development plan targeting the Glorieta plus BTD includes the Britt B 51, Britt B 52, Britt B 53, Britt B 54, and Britt B 55 proposed wells.

History

ConocoPhillips operates the Britt-B lease in Sections 10, 11, and 15, T20S R37E. This lease has produced from the BTD since the 1960's. Historically, the BTD has been successful in this area with high Initial Production (IP) and long production lives. However, as reservoir pressure declines and the reserves move into lower reservoir quality areas, the BTD pool is becoming uncompetitive and uneconomic. A review of a nearby drilling program meant to produce the BTD pools suggests that the production from the two zones (Glorieta and BTD) needs to be commingled to have more favorable economics, especially in the current economic environment.

^{*} The same formation, Blinebry is called by Weir-Blinebry pool or Weir-Blinebry East pool, depending only on surface location.

The Glorieta started to be commingled with the BTD as early as 1979 in the Britt-B #26 (See Figure 1). It showed some uplift potential. For example, the Glorieta in the Britt-B #13 was discovered to have potential to produce at high rates. The high rate was again repeated in 1998 in the Britt-B #34, with exclusive Glorieta production. The Glorieta, however, hasn't shown consistent results and is considered uneconomic by itself. Therefore, in conjunction with modern completion methods, the commingling of the Glorieta and Blinebry, Tubb, and Drinkard pools in the ConocoPhillips Britt-B lease will allow both of these reserves to be produced economically and at low risk. If this pilot project is successful it will prove the viability of further downhole commingling in future wells. This would also allow recompletions into the Glorieta to be commingled with historical BTD production.

Reservoir Details

The Glorieta and BTD are substantially similar in characteristics to make them compatible for downhole commingling. Oil gravity comparisons between the Glorieta, Blinebry, Tubb, and Drinkard reservoirs indicate that the type of oil found in these reservoirs is similar; approximately 39 degrees API according to the Britt-B #34 and SEMU #174 production analyses.

The upper Blinebry, Tubb, and Drinkard are the better reservoir quality areas of the Yeso group formations. The Drinkard tends to be more water saturated than the other formations, while the Tubb tends to be gassier than the other two. The reservoir productive quality is striated with low permeability areas. There is a lot of gross interval to net pay in the Yeso group reservoirs (see Figure 2).

The Glorieta is a higher porosity-permeability reservoir, usually with good oil saturation (see Figure 3). There is a risk of water production due to its proximity with the water saturated Paddock formation below it. A cross section is included in Figure 4.

The pore pressure gradients for the Glorieta and BTD are expected to be similar (~0.40 psi/ft). The BTD is expected to be normally pressured to slightly under-pressured due to historical production. If there is cross-flow between the two zones due to a high fluid level or over-pressured zone, it is expected that production will be recovered once the fluid level is pumped back down or the pressure stabilizes between the two zones.

Production is expected to vary widely among the layers. There will be a total of four layers spreading approximately 1,800 feet apart. The majority of the water is expected to come from the lowest and highest zones (Drinkard and Glorieta). The majority of the gas is expected to come from the middle two layers (Blinebry and Tubb). This, however, is speculation based on a study done in the Warren Unit. The production test and production profile will be useful in confirming this along with the Glorieta production. Appendix A includes the economics for BTD production which is requested to be kept confidential.

Allocation Method

The production allocation method for all zones will be based on a cumulative zone production test (subtraction method) carried out post completion. This will be done the following way:

The Blinebry-Tubb-Drinkard zone will be completed and production tested for a minimum of 45 days. Afterwards, the Blinebry-Tubb-Drinkard will be isolated by a retrievable bridge plug positioned above the Blinebry completion. The Glorieta will be completed and production tested for a minimum 45 days. Afterwards, following the removal of the retrievable bridge plug, the well will be placed on production from the Glorieta & Blinebry-Tubb-Drinkard with production allocation (oil, gas & water) based on:

<u>Glorieta Allocation</u>: Glorieta well test volumes / (Glorieta well test volumes + Blinebry-Tubb-Drinkard well test volumes)

<u>Blinebry-Tubb-Drinkard Allocation</u>: Drinkard well test volumes / (Glorieta well test volumes + Blinebry-Tubb-Drinkard well test volumes)

Our proposal includes production tests on the first two or three wells, depending on initial results.

Based on our review of historical production, the expected allocation for new drill wells is 36% from the Glorieta and 64% from the BTD, according to the estimated first year production average on BOE basis.

Preliminary Supporting Details

Figure 1: Map of all wells used in the Glorieta forecast, which are circled in red. Note that the wells outlined by blue squares are the proposed new drills and the BTD type curve well is indicated by yellow star.

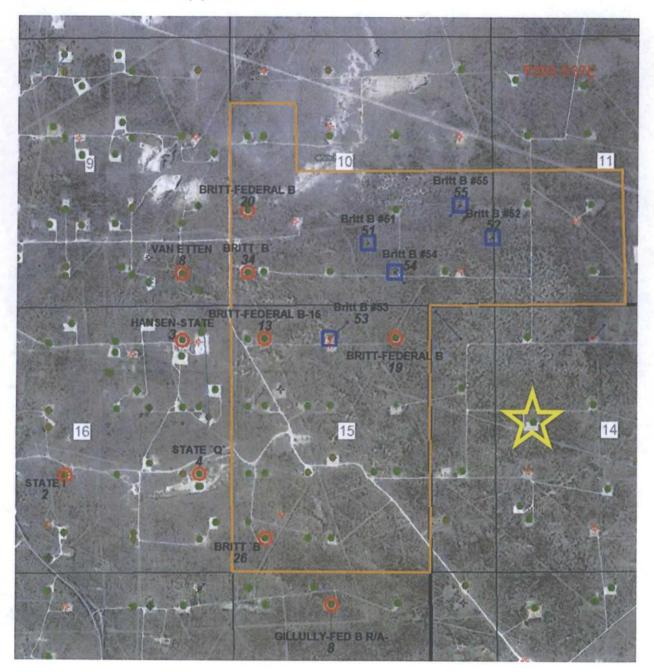
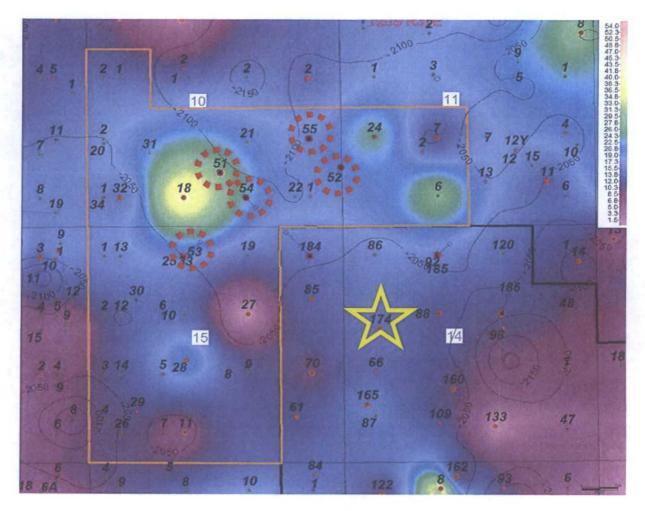


Figure 2: Blinebry/Tubb/Drinkard reservoir quality (SoPhiH) map. The wells with red circles are the proposed Britt-B wells, and the one with yellow Star is SEMU 174 type-well.

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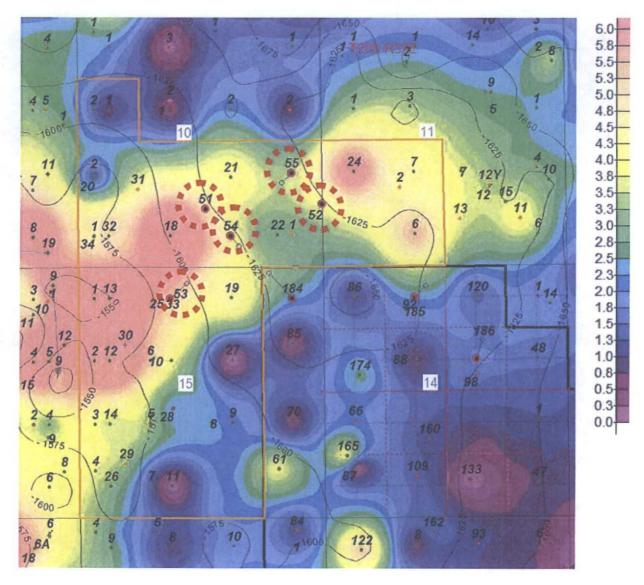


Figure 3: Glorieta reservoir quality (SoPhiH) map. The wells with red circles are the proposed Britt-B wells.

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Figure 4: Glorieta, Paddock, Blinebry, Tubb, Drinkard cross-section

Appendix A

Table 1: Blinebry/Tubb/Drinkard standalone economics

ř		Inputs				I		Outpu	†.	
			<u>r</u>				Preter	After Tax		
Start Dz		1/1/2015	Capital	\$1,800		Discount	NPV	NPV	Pretax IRR	After Tax
31211102	G (2:	17 1 <i>7</i> 20 1.3	Capital	34,800		Rate	[MS]	[M\$]	FIELDX INK	IRR
14111-	ginterest	50%	Tax Bate	35%		0%	(622)		-9%	-15%
	-	43.8%	Gas Tax	557 8 7.5%			• •	· ·	-326	-15%
		\$50	OilTax	7.5% 4.€%		E%	(803)	·		
	æ[\$/bbl] :€ :====		1 -			10%	[827]	,	1 × 1	
8	ce [\$∫mafi	\$3.00	Ad Val Rate	2%		12%	(E45)		1. N.	
OpEx [\$	/6611	\$7				15%	[884]	(1,025)		
ļ		Production	· · · · ·	Net Produ		· ··		rice	<u>\.\</u>	•.
	Oil							····· /	Revenue	`,
		Gas MM::f		Oil	Gzs		Oil	Gas	SM >	\sim
	MBbls			MBbis	MMcf	-	\$/661		/ /Total+	
2015	11.6	65.4		5.1	29.0		500	∕_3.0℃	/ (340%	
2016	e.e	50.4		3.8	22.1		50.0	ંગ્રહ	258	
2017	5.9	34.1		2.6	14.9		/50.0	ο,Ę,	175	
201E	4.4	25.0		1.9	10.9		500 (3.0	128	
2019	3.4	19.3		1.5	8.5		500	− <u>3.0</u>	/ 99	
2020	2.7	15.5		1.2	6.8	· -	ِ 50.0×.	<u>3.0</u>	-80	
2921	2.2	12.8		1.0	5.6	/	50.0	× 30	66	
2022	1.9	10.B		8.0	4.7		1500 V	3.0	55	
2023	1.6	9.2		0.7	4.0	$\langle \langle \langle \rangle \rangle$	500) 3.0	47	
2024	£.4	8.0		0.6	3.5		50.0	Í 3.0	41	
2025	1.2	7.0		0.5	3.1/1	·~. » ».	50.0	3.0	36	
2926	1.1	6.3		0.5	2.2 / /	ちょう	50.0	3.0	32	
2027	1.0	5.6		04八、	25	$1/\infty$	50.0	3.0	29	
2028	0.9	5.1		0.4			50,0	3.0	26	
2029	0.B	4.6		04	22	S. 1. J	50.0	3.0	24	
Total	<u>54.3</u>	311.4		23.7	136.2	•	30.0	23,0	1,596	
10101				<u> </u>	1:1					
			<u> </u>		IN	,			Cum Ca	sh Flow
	Prod Tax			Operating CF-		D T	-		D 7	
	[M\$]	Ad Val Tax [M\$]			CapEx	Рге Тах ст. имби		After Tax	Pre Tax	After Tax
	finist.		Costs [M\$]	ૺૻૻૻૼૼૼૼૼૼૻૢૢૢૢૼૼ૾૽ૼ૾ૺ	•	CF [M\$]	[M\$	CF [M\$]	[M\$	[M\$]
2015	18	7	36.~	`\ 279 `\ ⁄	1,600	-1,521	° 0	-1521	-1521	-1521
2015	14	5	_~27 \	212	0	212	74	138	-1309	-1383
2017	9	3	19 1	143	Ō	143	50	93	-1166	-1290
2018	7	3 /	14 14 >	105	ō	105	r 37	68	-1061	-12.22
2019	5	$\overline{2}$	1. 11	81	ō	81	28	53	-979	-1169
2020	4	2	<u>```8</u> ```	65	ō	65	<u></u>	42	-914	-1126
2021	4	1 7.	N.7	54	õ	54	19	35	-869	-1091
2022	3	11/1	\ `6 ∕	45	õ	45	- 16	29	-815	-1062
2023	3		5	39	õ	39	14	25	-776	-1037
2024	2	s NiN 7	4	34	õ	34	r <u>12</u>	22	-742	-1015
2025	- <u>5</u>		ć <u>a</u>	30	ů.	30	1 0	19	-713	-996
2025	15/	- 14 - 14 - 14 - 14 - 14 - 14 - 14 - 14	3	26	0	26	9	17	-7 13 -686	-996 -978
2025	3	- S i	3	20	0	24	F B	17	-663	-963
	2 2 1						-			
2028	1 E	1, (marked)	3	21 19	0	21	7	14	-641	-949
2029	<u> </u>	<u>~~~ ,0</u> ~~ 32	2	<u>19</u> 1,309	0	19	7	13	-622	-937
Total		22	170	L, 343	1,800	-491	361	-851		

8

Preliminary Field Study Results

The last drilling program in this part of SEMU that targeted the Blinebry, Tubb, and Drinkard was generally uneconomic, with the exception being SEMU 174 that had an IP of 48 BOPD and 273 MCFD. This will add an incremental 55 MBO and 310 MMCF per well. The gas curve is based on a GOR of ~5.7 MCF/STB (see Figures 5 and 6).

SEMU 174 had the best reservoir quality compared to the other wells in its program, as shown by logs. The Britt-B area tends to be of higher or comparable reservoir quality to SEMU 174. For this reason in conjunction of a modern completion design, the Blinebry/Tubb/Drinkard type-curve was chosen to be based on the performance of SEMU 174. The 40-acre Original Oil In Place (OOIP) for the Blinebry/Tubb/Drinkard in the Britt-B lease was calculated to be 3.3 MBO.

Justification for Commingle Proposal

At current commodity prices, the estimated production (type curve) from the BTD in these wells is not sufficient to pay off the costs of a drilling program to this depth. With some successes being shown in the offsetting wells, in regards to producing the Glorieta and downhole commingling it with the Blinebry/Tubb/Drinkard, an uplift of 45 BOPD and 6 MCFD in the IP rate is expected (Figure 7). This will add an incremental 110 MBO and 14 MMCF per well.

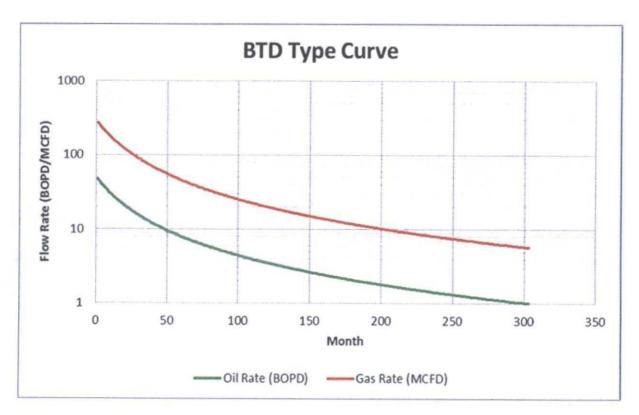
The production curve is based on the production from wells inside and immediately surrounding the Britt-B lease (see Figure 1). The oil curve is based on an average of the IP rates and the decline rates of the wells. The gas curve is based on a GOR of 0.13 MCF/STB taken from the Britt-B #34, the only Glorieta only producer in the lease.

The reservoir quality for the Glorieta in the Britt-B area is comparable to the offsetting Glorieta producers. The $P50^{\ddagger}$ 40-acre OOIP for the Glorieta producers was found to be ~1.1MMBO; there is confidence that the Glorieta will be a major production contributor. For convenience we include the BLM Downhole Commingle Worksheet.

[‡] P50 refers to an estimate with 50% certainty.

Supporting Details

Figure 5: Weir-Blinebry/Weir-Blinebry East/Monument-Tubb/Skaggs-Drinkard type curve



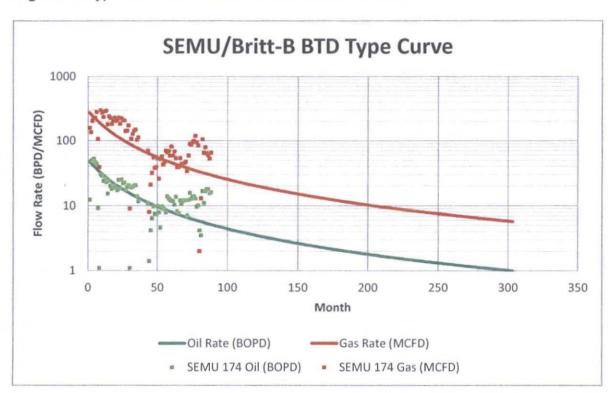
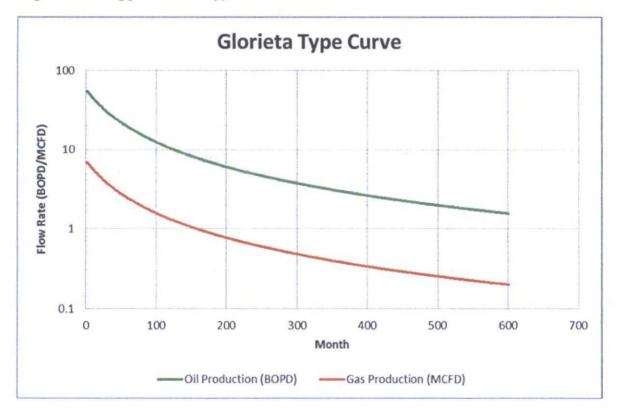


Figure 6: Type curve with SEMU 174 actual well test data

Figure 7: Skaggs-Glorieta type curve.



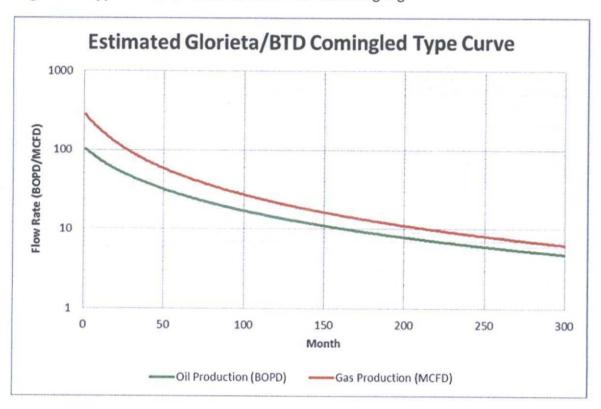


Figure 8: Type curve of Glorieta and BTD commingling



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www.permianls.com

575.397.3713 2609 W Marland Hobbs NM 88240

For:	ConocoPhillips Attention: Vernon I 1410 W. County R Hobbs, New Mexic	load		Sample: Identifica Compan Lease: Plant:		Meter Run Britt B #34 ConocoPhillips
Sample Data:		2/18/2014 2/19/2014 35 83	12:52 PM	Sampleo Analysis		Logan McIlroy Vicki McDaniel
H2S =	4,500 PPM					
	Comp	onent Ana	lysis		,	
Hydrogen Sulfide Nitrogen Carbon Dioxide Methane Ethane Propane I-Butane N-Butane I-Pentane N-Pentane Hexanes Plus	F H2S N2 CO2 C1 C2 C3 IC4 NC4 IC5 NC5 C6+	Mol Percent 0.450 2.639 1.329 74.780 10.706 5.398 0.779 1.919 0.583 0.628 0.789		GPM 2.856 1.483 0.254 0.604 0.213 0.227 0.342		
		100.000		5.978		
REAL BTU/CU.FT At 14.65 DRY At 14.65 WET At 14.696 DRY At 14.696 WET At 14.73 DRY At 14.73 Wet	1261.3 1239.3 1265.2 1243.7 1268.1 1246.3		Specific G Calcula Molecular	ted	0.7683 22.2509	



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ASTM DISTILLATION

ConocoPhillips Attention: Vernon Mackey 1410 W. County Road Hobbs, New Mexico 88240

Sampled By: Logan McIlroy Sample Date: 2/18/14

Sample ID: Britt B #34

Percent Distilled	<u>Temperature</u>		
IBP	125		
5	165		
10	202		
20	261	%Recovered =	93.0
30	327	% Residue =	4.0
40	435	% Loss =	3.0
50	515		
60	610		
70	693		
80	738		
90	761		
EP	765		

Total Sulfur	API Gravity	Specific Gravity
0.6484 wt.%	39.3	0.8284



www.permianls.com

575.397.3713 2609 W Marland Hobbs NM 88240

For:	ConocoPhillips Attention: Vernon 1410 W. County I Hobbs, New Mexi	Road		Sample: Identifica Compan Lease: Plant:	ation:	Casing SEMU 174 ConocoPhillips
Sample Data:	Date Sampled Analysis Date Pressure-PSIA Sample Temp F Atmos Temp F	2/18/2014 2/19/2014 83	11:58 AM	Sampleo Analysis		Logan McIiroy Vicki McDaniel
H2S =	4,400 PPM					
	Com	ponent Ana	lysis			
	I	Mol Percent		GPM		
Hydrogen Sulfide	H2S	0.440				
Nitrogen	N2	2.604				
Carbon Dioxide	CO2	0.618				
Methane	C1	75.574				
Ethane	C2	9.514		2.538		
Propane	C3	5.478		1.505		
I-Butane	IC4	0.754		0.246		
N-Butane	NC4	2.143		0.674		
I-Pentane	IC5	0.602		0.220		
N-Pentane	NC5	0.815	•	0.295		
Hexanes Plus	C6+	<u>1.458</u>		<u>0.631</u>		
		100.000		6.108	i	
REAL BTU/CU.FT At 14.65 DRY At 14.65 WET	1299.6 1276.9		Specific G Calcula		0.7809)
At 14.696 DRY	1303.6					
At 14.696 WET	1281.4		Molecular	Weight	22.6163	3
At 14.73 DRY	1306.6		mologular			-
At 14.73 Wet	1284.0					

.



www.permianls.com 575.397.3713 2609 W Marland Hobbs NM 88240

ASTM DISTILLATION

. .

ConocoPhillips Attention: Vernon Mackey 1410 W. County Road Hobbs, New Mexico 88240

Sampled By: Logan McIlroy Sample Date: 2/18/14

Sample ID: SEMU 174

Percent Distilled	Temperature		
IBP	130		
5	180		
10	215		
20	280	%Recovered =	94.0
30	345	% Residue =	4.0
40	445	% Loss =	2.0
50	536		
60	617		
70	680		
80	703		
90	738		
EP	7,41		

Total Sulfur	API Gravity	Specific Gravity
0.3688 wt.%	39.4	0.8279

NALCO Champion

Water Analysis Report

An Ecolab Company Attention:Anthony.baeza@champ-tech.com

Attention:Anthony.baeza@champ-tech.con

Location Code: 23130

Sample ID: AB42153 Login Batch: 2014-02-24_MFA_SWICPW

Collection Date: 02/19/2014

Receive Date: 02/24/2014

Report Date: 03/03/2014

Analyses	Result	Unit
Dissolved CO2	50	mg/L
Dissolved H2S	188.1	mg/L
рН	8	
Pressure	70	psi
Temperature	83	۹F

Cations	Result	Unit
Iron	0.038	mg/L
Manganese	0.013	mg/L
Barium	0.056	mg/L
Strontium	66.68	mg/L
Calcium	2657	mg/L
Magnesium	804.1	mg/l
Sodium	28272.82	mg/L

Customer: ConocoPhillips (1500390)

Region: Eunice Field Location: Britt B Lease System: Production System Equipment: Well 34

Lab ID: ABU-1031

Sample Point: Well Head Valve Up Stream of Choke

Analyses	Result	Unit
Bicarbonate	634.4	mg/L
Conductivity	130163	µS - cm3
lonic Strength	1.47	
Resistivity	0.077	ohms - m
Specfic Gravity	1.055	
Total Dissolved Solids	83304.07	mg/L
Anions	Result	Unit
CHLORIDE	48788.96	mg/L
SULFATE	1880	mg/L

Comments:		_

Scale Type	Result
Anhydrite CaSO4 SI	-0.52
Barite BaSO4 SI	-0.53
Catcite CaCO3 PTB	263.3
Calcite CaCO3 SI	1.17
Celestite SrSO4 SI	-0.07
Gypsum CaSO4 SI	-0.35
Hemihydrate CaSO4 SI	-0.35
Saturation Index Calculation (Tomso	n-Oddo Model)

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NALCO Champion

Water Analysis Report

An Ecolab Company

Attention: Anthony.baeza@champ-tech.com

Location Code: 23299

Sample ID: AB42154

Login Batch: 2014-02-24_MFA_SWICPW

Collection Date: 02/19/2014

Receive Date: 02/24/2014

Report Date: 03/03/2014

Analyses	Result	Unit
Dissolved CO2	50	mg/L
Dissolved H2S	119.7	mg/L
рН	8	
Pressure	100	psi
Temperature	81	°F

Cations	Result	Unit
Iron	0.082	mg/L
Manganese	0.044	mg/L
Barium	0.078	mg/L
Strontium	95.58	mg/L
Calcium	3793	mg/L
Magnesium +	1040	mg/L
Sodium	41169.79	mg/L

Result

-0.46

-0.55

195.3

1.12

-0.05

-0.34

-0.38

Scale Type

Anhydrite CaSO4 SI

Calcite CaCO3 PTB

Calcite CaCO3 SI

Celestite SrSO4 SI

Gypsum CaSO4 SI

Hemihydrate CaSO4 51

Saturation Index Calculation (Tomson-Oddo Model)

Barite BaSO4 SI

Customer: ConocoPhillips	(1500390)
	110000000

Region: Eunice Field Location: SEMU Tubb Lease System: Production System Equipment: Well 174 Lab ID: ABU-1031

Sample Point: Well Head Valve Up Stream of Choke

Analyses	Result	ปกม่
Bicarbonate	475.8	mg/L
Conductivity	187614	µS - cm3
Ionic Strength	2.13	
Resistivity	0.053	ohms - m
Specfic Gravity	1.082	
Total Dissolved Solids	120073.1	mg/L
Anions	Result	Unit
CHLORIDE	71983.77	mg/L
SULFATE	1515	ma/L

Comments:			
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NALCO Champion

Water Analysis Report

An Ecolab Company Attention:Anthony.baeza@champ-tech.com

inenienzanneny.beerdeenenip ieen

Location Code: 23130

Sample ID: AB42153

Login Batch: 2014-02-24_MFA_SWICPW

Collection Date: 02/19/2014

Receive Date: 02/24/2014

Report Date: 03/03/2014

Analyses	Result	Unit ·
Dissolved CO2	50	mg/L
Dissolved H2S	188.1	mg/L
рН	8	
Pressure	70	psi
Temperature	83	° F

Cations	Result	Unit
Iron	0.038	mg/L
Manganese	0.013	mg/L
Barium	0.056	mg/L
Strontium	66.68	mg/L
Calcium	2657	mg/L
Magnesium	804.1	mg/L
Sodium	28272.82	mg/L

Region: Eunice Field
Location: Britt B Lease
System: Production System
Equipment: Well 34
Lab ID: ABU-1031

Customer: ConocoPhillips (1500390)

Sample Point: Well Head Valve Up Stream of Choke

Analyses	Result	Unit
Bicarbonate	634.4	mg/L
Conductivity	130163	µ\$ - cm3
Ionic Strength	1.47	
Resistivity	0.077	ohms - m
Specfic Gravity	1.055	
Total Dissolved Solids	83304.07	mg/L
Anions	Result	Unit
CHLORIDE	48988.96	mg/L
SULFATE	1880	ma/L

Scale Type	Result
Anhydrite CaSO4 Sl	-0.52
Barite BaSO4 St	-0.53
Calcite CaCO3 PTB	263.3
Calcite CaCO3 SI	1.17
Celestite SrSO4 SI	-0.07
Gypsum CaSO4 SI	-0.35
Hemihydrate CaSO4 Sf	-0.35
Saturation Index Catculation (Tomso	n-Oddo Model)

Comments:	 		
	•		

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Michael Fitzgerald SE New Mexico Permian ConocoPhillips Company 600 N. Dairy Ashford

P10-05-5055 Houston, TX 77079

Phone: 281-206-5684 Michael.d.fitzgerald@cop.com



June 9, 2015

RE: Downhole Commingling Application <u>Township 20 South, Range 37 East, N.M.P.M.</u> Section 10: SW/4 SE4 and E/2 SE/4 Section 15: NE/4 NW/4 Containing 160.00 acres, more or less Lea County, New Mexico

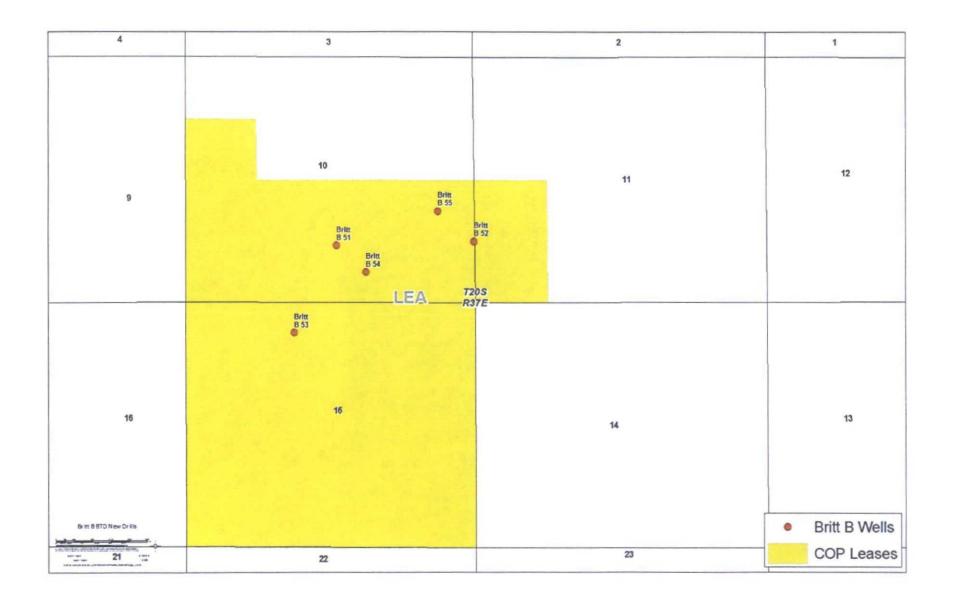
ConocoPhillips Company, as operator of the Britt-B Lease, is seeking approval to downhole commingle the wells referenced herein. (See attached map for specific locations).

Britt-B wells numbered 51, 52, 53, 54, and 55 are all located on the Britt-B Federal Lease (NMLC-031621B).

Interest Owner	Working <u>Interest</u>	Net Revenue Interest
ConocoPhillips Company	50.000%	43.750%
Chevron USA Inc.	25.000%	21.875%
ZPZ Delaware LLC	25.000%	21.875%
Office of Natural Resource Revenue	<u>00.000%</u>	12.500%
Total	100.000%	100.00%

I certify that the above information is true and correct.

Michael Fitzgerald Associate Landman ConocoPhillips Company





Ashley Bergen Regulatory Specialist Phone: (432) 688-6938 ConocoPhillips Company P.O. Box 51810 Midland, TX 79710-1810

July 20, 2015

2.3

Chevron USA Inc. 15 Smith Rd, Claydesta Plaza Midland, TX 79705

COPY

SUBJECT: REQUEST FOR APPROVAL OF DOWNHOLE COMMINGLE FOR BRITT B LEASE

To Whom It May Concern:

ConocoPhillips Company is requesting an approval to Downhole Commingle the Skaggs-Glorieta Pool (57190) with the pre-approved pools Weir-Blinebry (63780), Weir-Blinebry East (63800), Monument-Tubb (47090), and Skaggs-Drinkard (57000) pools in ConocoPhillips' Blinebry, Tubb, Drinkard development program in Sections 10 and 15, T20S, R37E, Lea County, New Mexico.

You are being provided notification of this action as an interest owner in the spacing unit. Any comments need to be provided to New Mexico Oil Conservation Division; 1220 South Saint Francis Drive, Santa Fe, New Mexico 87505 within 20 days.

If you have any questions regarding this request, I can be reached at 432-688-6938 or via email at ashley.bergen@cop.com

Sincerely,

ley Bergen

Ashley Bergen Regulatory Specialist



Ashley Bergen Regulatory Specialist Phone: (432) 688-6938

July 20, 2015

r.a

ZPZ Delaware LLC 303 Veterans Airpark Lane Midland, TX 79705 ConocoPhillips Company P.O. Box 51810 Midland, TX 79710-1810



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Sincerely,

lag Bergen

Ashley Bergen Regulatory Specialist



Ashley Bergen Regulatory Specialist Phone: (432) 688-6938

July 20, 2015

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Office of Natural Resource Revenue Room A 614 Building 85 Denver Federal Center (6th Kipling) Denver, CO 80225

COPY

ConocoPhillips Company

Midland, TX 79710-1810

P.O. Box 51810

SUBJECT: REQUEST FOR APPROVAL OF DOWNHOLE COMMINGLE FOR BRITT B LEASE

To Whom It May Concern:

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If you have any questions regarding this request, I can be reached at 432-688-6938 or via email at ashley.bergen@cop.com

Sincerely,

Mley Borgen

Ashley Bergen Regulatory Specialist

	SENDER: COMPLETE THIS SE	CTION:	COMPLETE THIS SECTION ON	
₩.	Complete items 1, 2, and 3. A item 4 if Restricted Delivery is		A. Signature	☐ Agent
	Print your name and address of so that we can return the card	on the reverse	B. Received by (Printed Name)	C. Date of Delivery
	Attach this card to the back of or on the front if space permit			
	1. Article Addressed to:		D. Is delivery address different fro If YES, enter delivery address	
	Chevron			
·	15 smith Rd,			
	Claydesta P	vala,	3. Service Type	
	Midland, TX "	79705	Registered Return	/ Mail Express [™] Receipt for Merchandise
•			4. Restricted Delivery? (Extra Fer	t on Delivery 9) 🛛 Yes
	2. Article Number (Transfer from service label)	7013	3020 000l 2047	9982
	PS Form 3811, July 2013	Domestic Re		
SEEGNERS	Contraction of the second seco	BDHC		Certified Fee Postage \$ Return Receipt Fee Endorsement Required) Postmark (Endorsement Required) Endorsement Required) Postmark 1 Total Postage & Fees \$
Complet item 4 if Print you so that w Attach th	e items 1, 2, and 3. Also complete Restricted Delivery is desired. r name and address on the reverse re can return the card to you. is card to the back of the mailpiece, front if space permits.	A. Signature X B. Received by (Prin	۲۰۰۰۰۰۰ S۲۹۲ ۲۰۱۰ ted Name)	3050 000° 508
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ZPZ	2 — .			
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Midla	nd, 7X 79705	 Service Type Certified Mail^o Registered Insured Mail Restricted Deliver 	Return Receipt for Merchandis Collect on Delivery	
2. Article Nu	لسائل اسارائي	1		
	om service label) TUBS SUE 111, July 2013 Domestic Ret		· · · · · · · · · · · · · · · · · · ·	· · ·

