

KANSAS CORPORATION COMMISSION **OIL & GAS CONSERVATION DIVISION** 

Form must be typed March 2009 9

Form ACO-4

APPLICATION FOR COMMINGLING OF

		*****	-
Commingling ID # $COO$	71	22	1

<b>PRODUCTION</b> (K.A.R. 82-3-123)	) OR FLUIDS (K.A.R. 82-3-123a)

API No. 15 - 15-205-25935-00-01
Spot Description:
N2 S2 SE SW Sec. 23 Twp. 30 S. R. 15 East West
510 Feet from North / South Line of Section
1980 Feet from 🔲 East / 🗹 West Line of Section
County: Wilson
Lease Name: HAINLINE TERRY G Well #: 23-1

Name and upper and lower limit of each production interval to be commingled: 1

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Formation:	WEIR	(Perfs):	1087-1090
		(Perfs):	1020-022
Formation:	CROWEBURG	(Perfs):	982-985
Formation:	BEVIER	(Perfs):	982-985 962-964
Formation:	MULKY	(Perfs):	915-920
		• •	

5/ 2. Estimated amount of fluid production to be commingled from each interval:

Formation: WEIR	BOPD: 0	MCFPD: 0	BWPD: 21
Formation: FLEMING	BOPD: 0	MCFPD: 0	<sub>вwpd:</sub> 21
Formation: CROWEBURG	BOPD 0	MCEPD 0	BWPD: 21
Formation: BEVIER	BOPD: 0	MCFPD: 0	BWPD: 21
Formation: MULKY	BOPD: 0		BWPD: 21

**V** 3. Plat map showing the location of the subject well, all other wells on the subject lease, and all wells on offsetting leases within a 1/2 mile radius of the subject well, and for each well the names and addresses of the lessee of record or operator.

**V** 4. Signed certificate showing service of the application and affidavit of publication as required in K.A.R. 82-3-135a,

For Commingling of PRODUCTION ONLY, include the following:

Wireline log of subject well. Previously Filed with ACO-1: Ves [] No 2 5.

 $\mathbf{Z}$ 6. Complete Form ACO-1 (Well Completion form) for the subject well.

For Commingling of FLUIDS ONLY, include the following:

7 7. Well construction diagram of subject well.

**Z** 8. Any available water chemistry data demonstrating the compatibility of the fluids to be commingled.

AFFIDAVIT: I am the affiant and hereby certify that to the best of my current information, knowledge and personal belief, this request for commingling is true and proper and I have no information or knowledge, which is inconsistent with the information supplied in this application.

KCC Office Use Only	
Denied 🗸 Approved	
15-Day Periods Ends: 7/6/2012	
Approved By: Rick Hestermann	Date: 07/13/2012

Submitted Electronically

Protests may be filed by any party having a valid interest in the application. Protests must be in writing and comply with K.A.R. 82-3-135b and must be filed wihin 15 days of publication of the notice of application.

Mail with all required attachments and files to: KCC - Conservation Division, 130 S. Market - Room 2078, Wichita, Kansas 67202

1 NAME & UPPER & LOWER LIMIT OF EACH PRODUCTION INTERVAL TO BE COMMINGLED

FORMATION:	SUMMITT	(PERFS):	901 - 905	
FORMATION:	BARTLESVILLE	(PERFS):	1172 - 1174	
FORMATION:		(PERFS):		

2 ESTIMATED AMOUNT OF FLUID PRODUCTION TO BE COMMINGLED FROM EACH INTERVAL

FORMATION:	SUMMITT	BOPD:	0	MCFPD:	0	BWPD:	21
FORMATION:	BARTLESVILLE	BOPD:	3	MCFPD:	0	BWPD:	20
FORMATION:		BOPD:		MCFPD:		BWPD:	
FORMATION:		BOPD:		MCFPD:		BWPD:	
FORMATION:		BOPD:		MCFPD:		BWPD:	
FORMATION:		BOPD:		MCFPD:		BWPD:	
FORMATION:		BOPD:		MCFPD:		BWPD:	
FORMATION:		BOPD:		MCFPD:		BWPD:	
FORMATION:		BOPD:		MCFPD:		BWPD:	
FORMATION:		BOPD:		MCFPD:		BWPD:	
FORMATION:		BOPD:		MCFPD:		BWPD:	
FORMATION:		BOPD:		MCFPD:		BWPD:	

Allidavil of Nouce Serveu	Affidavit of Notice Served	
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Re:	Application for: APPLICATION FOR COMMINGLING OF F	RODUCTION OR FLUIDS - ACO-4	
	Well Name: HAINLINE, TERRY G 23-1	Legal Location: SESW S23-T30S-R15E	
The unde	rsigned hereby certificates that he / she is a duly authorized agent for the ap	licant, and that on the day _15TH of JUNE	·
0040			

2012 , a true and correct copy of the application referenced above was delivered or malled to the following parties:

Note: A copy of this affidavil must be served as a part of the application.

Name	Address (Attach additional sheets if necessary)
POSTROCK MIDCONTINENT PRODUCTION, LLC	210 PARK AVENUE, SUITE 2750, OKLAHOMA CITY, OK 73102-5641
Dart Cherokee Basin Operating Co., LLC	600 Dart Rd, PO Box 177, Mason, MI 48854
Douglas & Deidka Arnold JT	108 Pikes Peak Lane, Florissant, Co 80816
JD Clegg Trust	13856 300 Rd, Neodesha, KS 66757
Robert James	2912 Marion Rd, Neodesha, KS 66757
John Floyd	PO 724, Whitewright, TX 75491
Betty June Bruce Almond, Trustee of the Almond Family Irrev Trust	4000 W. Washington, Sherman, TX 75092
Charles & Kaye Herder	13615 300 Rd, Neodesha, KS 66757
Charles James	11455 300 Rd, Neodesha, KS 66757
William P. Wertz	6240 CR 4100, Neodesha, KS 66757

I further attest that no	olice of the filling of this application we	as published in the WILSON COUNTY CITIZEN	the official county publication
of WILSON		county. A copy of the affidavil of this publication is atlached.	
Signed this <u>15th</u>	day of JUNE		
		Applicant of Duty Authorized Agent	2
	Subscri	fibed and sworn to before me this <u>15th</u> day of <u>JUNE</u>	, 2012
OFFICIAL SEAL	DENISE V. VENNEMAN MY COMMISSION EXPIRES July 1, 2012	Denuse Ullemenan	
	And the second s	My Commission Expires: $7 - 1 - 12$	
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	Α	B	c	D	E	F	G	н		J	<u> </u>
<u> </u>	Produced Fluids #		1	2	3	4	5		<b>.</b>		Click
	Parameters	Units	Input	Input	Input	Input	Input		Click her	re	
	Select the brines	Select fluid	<u>_</u>	<b></b>	<u> </u>	<u> </u>	<u> </u>	Mixed brine: Cell H28 is	to run SS	SP	Click
4	Sample ID	by checking the box(es),	3/19/2012	3/4/2012	3/14/2012	1/20/2012	1/20/2012	STP calc. pH.			
5 6	Date Operator	Row 3	PostRock	PostRock	PostRock	PostRock	PostRock	Cells H35-38			Click
7	Well Name		Ward Feed	Ward Feed	Clinesmith	Clinesmith	Clinesmith	are used in	Goal Seek		CHC.
8	Location		#34-1	#4-1	#5-4	#1	#2	mixed brines	doar ocer		Click
	Field		СВМ	СВМ	Bartles	Bartles	Bartles	calculations.			CIICK
10	Na <sup>+</sup>	(mg/l)*	19,433.00	27,381.00	26,534.00	25689.00	24220.00	24654.20	Initial(BH)	Final(WH)	SL/SR
11	K* (if not known =0)	(mg/l)					·	9.00	Saturation Index	values	(Final-Initial)
	Mg <sup>24</sup>	(mg/l)	1,096.00	872.00	1,200,00	953.00	858.00	995.91	P	lcite	11
	Ca <sup>2+</sup>	(mg/l)	1,836.00	2,452.00	2,044.00	1920.00	1948.00	2040.23	-0.73	-0.60	0.13
	Sr <sup>1+</sup>		1,0,0,00	2,432.00	2,044.00	1720.00	1748.00	0.00		rite	<b>••••</b> •
-	5r Ba <sup>1+</sup>	(mg/l)		·	<b></b> _					1100	
		(mg/l)		<u>.</u>				0.00			
<u> </u>	Fe <sup>2+</sup>	(mg/l)	40,90	21.00	18.00	82,00	90.00	50.21		lite	
	Zn <sup>1+</sup>	(mg/l)						0.00	-1.77	-1.80	-0.03
18	Pb <sup>1+</sup>	(mg/l)						6.00	Gy	sum	1
	CI.	(mg/l)	36,299.00	48,965.00	47,874.00	45632.00	43147.00		-3.19	-3.18	0.00
20	SO4 <sup>2</sup>	(mg/l)	1.00	1.00	8.00	1.00	1.00	2.40	Hemi	hydrate	
21	F	(mg/l)					I	0.00	-3.96	-3.90	0.06
22	Br	(mg/l)						0.00	Anb	ydrite	
23	SiO2	(mg/l) SiO2					[	0.00		-3.36	0.12
24	HCO3 Alkalinity**	(mg/1 as HCO3)	190.00	234.00	259.00	268.00	254.00	241.03	Cel	estite	
25	CO3 Alkalinity	(mg/1 as CO3)					1	<u> </u>	1		
26	Carboxylic acids**	(mg/l)				1	[	0.00	Iros	Sulfide	
27	Ammonia	(mg/L) NH3			·	1	t	0.00		-0.22	-0.06
	Borate	(mg/L) H3BO3			·	1	I	0.00		Sulfide	1
28 29	TDS (Measured)				·	I		72781			
-		(mg/l)		1.051	1.050	1,048	1.045	1.047	Calalas	n Nuoride	+
	Calc. Density (STP) CO <sub>2</sub> Gas Analysis	<u>(g/ml)</u> (%)	1.038	18.76	22,41	35.53	33.79	· · · · · · · · · · · · · · · · · · ·			
	H <sub>2</sub> S Gas Analysis***	(%)	0.0289	0.0292	0.0296	0.0306	0.0151	0.0269		arbonate	1
33	Total H2Sag	(mgH2S/I)	1,00	1.00	1.00	1,00	·			-0.51	0.23
34	pH, measured (STP)	pH	5.67	5.76	5.72	1	·	5.63	Inhibitor n	eeded (mg/L)	
<del>ان</del>		0-CO2%+Aik.				<u> </u>	1	Ì	Calcite	NTMP	-
	Choose one option										
35	to calculate S1?		0	0	0			<b>.</b>			-
36	Gas/day(thousand cf/day)	(Mcf/D)				I		6	0.00	0.00 BHPMP	4
37	Oil/Day Water/Day	(B/D) (B/D)	0	0	100	100	100	500	Barite 0.00	0.00	-
39	For mixed brines, enter va							(Enter H40-H43)		pH	-
40	Initial T	(F)	66.0	71.0	70.0	41.0	49.0	60.0	5.69	5.60	-1
41	Final T	(F)	66.0	71.0	70.0	41.0	49.0	89.0	Viscosity (	(CentiPoise)	
42	Initial P	(psia)	25.0	25.0	25.0	25.0	25.0	25.0	1.196	0.826	_ `
43	Final P	(psia)	25.0	25.0	25.0	25.0	25.0	120.0		ity (cal/ml/ <sup>*</sup> C)	_
44	Use TP on Calcite sheet?	1-Yes;0-No				Ļ		ļ	0.955	0.959	4
45	API Oll Grav.	API grav,				I	.i	30.00		eeded (mg/L)	-
	Gas Sp.Grav.	Sp.Grav.	0			<u> </u>		0.60		HDTMP 0.00	-1
	MeOH/Day MEG/Day	(B/D) (B/D)	0			<b>-</b>	·[		Anhydrite	HDTMP	1
	Conc. Multiplier	(202)				1	<u>†                                    </u>	† T	0.00	0.00	1
	H <sup>+</sup> (Strong acid)	(N)			<u> </u>		· · · · · · · · · · · · · · · · · · ·	1			_
	OH' (Strong base)	(N)						1			
	Quality Control Checks at								]		
53	H <sub>2</sub> S Gas	(%)									
	Total H2Saq (STP)	(mgH2S/I)									
	pH Calculated	(pH)		l	l	1	1	1	ł		
	PCO2 Calculated Alkalinity Caclulated	(%) (mg/l) as HCO3					1	1	1		
	ΣCations=	(equiv./l)					1	1	1		
59	∑Anions≖	(equiv./l)			1	1	I I	1	1		
	Calc TDS=	(mg/l)						<b>I</b>	1		
	Inhibitor Selection	Input	Unit	#	Inhibitor		er (From metric Value	to English) To Unit	Value		
	Protection Time	120	min	1 2	NTMP BHPMP	From Unit °C	Value 80	ro Unit "F	176		
	Have ScaleSoftPitzer		1 Varia M-	3		m <sup>3</sup>	100	n <sup>3</sup>	3,531		
64	pick inhibitor for you?		1-Yes;0-No	4	PAA DTPMP	m m <sup>3</sup>	100	bbl(42 US gal)	629		
65	If No, inhibitor # is: If you select Mixed,	- 4	*	4	PPCA	m MPa	1,000	psia	145,074		
67	I" inhibitor # is:	: 1	#	6	SPA	Bar	496	psia	7,194		
68	% of 1 <sup>™</sup> inhibitor is:		ų.	7	HEDP	Тотт	10,000	psia	193		
69	2 <sup>nd</sup> inhibitor # is:		Ĩ	. 8	HDTMP	Gal	10,000	bbl(42 US gal)	238		
1	Display act. coefs?	. 2	1-Yes:0-No	9	Average	Liters	10,000	bbl(42 US gal)	63		
71				10	Mixed			· - B·-/	l		
•	•	•	•	-	-	-			-		

# **Saturation Index Calculations**

Champion Technologies, Inc. (Based on the Tomson-Oddo Model)

Brine 1: Ward Feed Yard 34-1 Brine 2: Ward Feed Yard 4-1 Brine 3: Clinesmith 5-4 Brine 4: Clinesmith 1 Brine 5: Clinesmith 2

			Ratio			
	20%	20%	20%	20%	20	
Component (mg/L)	Brine 1	Brine 2	Brine 3	Brine 4	Brine 5	Mixed Brine
Calcium	1836	2452	2044	1920	1948	1952
Magnesium	1096	872	1200	953	858	865
Barium	0	0	0	0	0	0
Strontium	0	0	0	0	0	0
Bicarbonate	190	234	259	268	254	253
Sulfate	1	1	8	1	1	1
Chloride	36299	48965	47874	45632	43147	43206
CO₂ in Brine	246	220	264	422	405	401
Ionic Strength	1.12	1.48	1.46	1.38	1.31	1.31
Temperature (%F)	89	89	89	89	89	89
Pressure (psia)	50	50	120	120	120	119

# Saturation Index

Calcite	-1.71	-1.41	-1.48	-1.68	-1.69	-1.6 <del>9</del>
Gypsum	-3.71	-3.64	-2.82	-3.73	-3.72	-3.69
Hemihydrate	-3.70	-3.65	-2.83	-3.74	-3.71	-3.69
Anhydrite	-3.89	-3.79	-2.97	-3.89	-3.88	-3.85
Barite	N/A	N/A	N/A	N/A	N/A	N/A
Celestite	N/A	N/A	N/A	N/A	N/A	N/A

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Calcite	N/A	N/A	N/A	N/A	N/A	N/A
Gypsum	N/A	N/A	N/A	N/A	N/A	N/A
Hemihydrate	N/A	N/A	N/A	N/A	N/A	N/A
Anhydrite	N/A	N/A	N/A	N/A	N/A	N/A
Barite	N/A	N/A	N/A	N/A	N/A	N/A
Celestite	N/A	N/A	N/A	N/A	N/A	N/A





Hainline, Terry G 23-1 23-30S-15E 1" = 1,000'

# HAINLINE, TERRY G 23-1 - APPLICATION FOR COMMINGLING OF PRODUCTION OR FLUIDS

Offset Operators, Unleased Mineral Owners and Landowners acreage (Attach additional sheets if necessary) Name: Dart Cherokee Basin Operating Co., LLC	Logal Description of Leasehold: NWNWNW S26-T30S-R15E
Dart Cherokee Basin Operating Co., LLC	S2SENW S23-T30S-R15E
Dart Cherokee Basin Operating Co., LLC	SWSENW S23-T30S-R15E
Dart Cherokee Basin Operating Co., LLC	NWNWSE S23-T30S-R15E
Dart Cherokee Basin Operating Co., LLC	NENWSE S23-T30S-R15E
Dart Cherokee Basin Operating Co., LLC	NWSESE S23-T30S-R15E
Dart Cherokee Basin Operating Co., LLC	NESWNWNE S26-T30S-R15E
Dart Cherokee Basin Operating Co., LLC	NWSENW S26-T30S-R15E
SEE ATTACHED	

I hereby certify that the statements made herein are true and correct to the best of my knowledge and belief.

B Bial Applicant or Duly Authorized Agent 2012

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Subscribed and sworn before me this 15TH \_ day of JUNE Penneman, Notary Public 71 7-1-12

My Commission Expires:

### HAINLINE, TERRY G 23-1 - APPLICATION FOR COMMINGLING OF PRODUCTION OR FLUIDS Offset Operators, Unleased Mineral Owners and Landowners acreage

## S/2 N/2 NW/4 SE/4 of Section 23-30S-15E Douglas & Deidka Arnold JT 108 Pikes Peak Lane Florissant, CO 80816

### S/2 SE/4 of Section 23-30S-15E

JD Clegg Trust 13856 300 Rd Neodesha, KS 66757

## (A portion of) NW/4 of Section 26-305-15E Robert James (tract in NW NW) 2912 Marion Rd Neodesha, KS 66757

#### NW/4 less tract

John Floyd (1/2 interest) PO 724 Whitewright, TX 7491

Betty June Bruce Almond, Trustee of the Almond Family Irrev. Trust B (1/2 interest) 4000 W. Washington Sherman, TX 75092

(A portion of) NE/4 of Section 26-30S-15E Charles & Kaye Herder 13615 300 Rd Neodesha, KS 66757

(A portion of) NE/4 of Section 27-30S-15E Charles James (tract in NE NE) 11455 300 RD Neodesha, KS 66757

William P. Wertz (N2 NE less tract) 6240 CR 4100 Neodesha, KS 66757



POSTROCK



LEGEND

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PostRock<sup>®</sup>



# STATE OF KANSAS Wilson County - SS

JOSEPH S. and RITA M. RELPH, of lawful age, being duly sworn upon oath that they are the Owners and Publishers of the WILSON COUNTY CITIZEN:

THAT said newspaper has been published at least weekly fifty (50) times a year and has been so published for at least five years prior to the first publication of the attached notice:

THAT said newspaper is a general circulation on a daily, or weekly, or monthly, or yearly basis in;

WILSON COUNTY, KANSAS and is NOT a trade, religious or fraternal publication and has been PRINTED and PUBLISHED in Wilson County, Kansas.

THE ATTACHED was published on the following dates in a regular issue of said newspaper:

in a regular issue of said newspaper:	
Ist publication was made on the	day of
2nd publication was made on the	_, 20 <u>/</u>
3rd publication was made on the	day of
4th publication was made on the	day of
5th publication was made on the	day of
6th publication was made on the	. 20 day of
TOTAL PUBLICATION FEE: $\frac{38}{38}$	50
(Signed)	nday of
Arta M. Reephon	
My commission expires $4.14$	<u> 1017</u>

(Published in the Wilson County Citizen on Thursday, June 21, 2012.)

BEFORE THE STATE CORPORATION COMMISSION OF THE STATE OF KANSAS

NOTICE OF FILING APPLICATION

RE: In the Matter of Postrock Midowntinent Production, LLC Application for Commingling of Production in the Hainline, Turry G 23-1 located in Wilson County, Kansus

TO: All Oil & Gas Producers, Unleased Mineral Interest Owners, Landowners, and all persons whomever concerned.

You, and each of you, are hereby notified that Fustrock Midcontinent Production, LLC has filed an application to commingle the Bartlesville, Weir, Fleming, Croweburg, Bevier, Mulky and Summit producing formations at the Hainline, Terry G 23-1, located in the SE SW, S23-T30S-R15B, Approximately 510 FNL & 1980 FWL, Wilson County, Kansas.

Any persons who object to or protest this application shall be required to file their objections or protest with the Conservation Division of the State Corporation Commission of the State of Kansas within fifteen (16) days from the date of this publication. These protests shall be filed pursuant to Commission regulations and must state epacific reasons why granting the application may cause waste, violate correlative rights or pollute the natural resources of the State of Kansas.

All persons interested or concerned shall take notice of the foregoing and shall govern themselves accordingly. All person and/or companies wishing to protest this application are required to file a written protest with the Conservation Division of the Kansas Oil and Gas Commission.

Upon the receipt of any protest, the Commission will convens a hearing and protestants will be expected to enter an appearance either through proper legal counsel or as individuals, appearing on their own behalf.

Postrock Midcontinent Production, LLC 210 Park Avanue, Suite 2760 Oklahorna City, Oklahorna 78102 (405) 660-7704 38 1 cpy.



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### AFFIDAVIT

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STATE OF KANSAS

County of Sedgwick

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Mark Fletchall, of lawful age, being first duly sworn, deposeth and saith: That he is Record Clerk of The Wichita Eagle, a daily newspaper published in the City of Wichita, County of Sedgwick, State of Kansas, and having a general paid circulation on a daily basis in said County, which said newspaper has been continuously and uninterruptedly published in said County for more than one year prior to the first publication of the notice hereinafter mentioned, and which said newspaper has been entered as second class mail matter at the United States Post Office in Wichita, Kansas, and which said newspaper is not a trade, religious or fraternal publication and that a notice of a true copy is hereto attached was published in the regular and entire Morning issue of said The Wichita Eagle for \_1\_ issues, that the first publication of said notice was

made as aforesaid on the **21st** of

### June A.D. 2012, with

subsequent publications being made on the following dates:

And affiant further says that he has personal knowledge of the statements above set forth and that they are true.

Park Fletchall

Subscribed and sworn to before me this

#### 21st day of June, 2012

PENNY L. CASE 回回 Notary Public -State My Appl. Expires p

Notary Public Sedgwick County, Kansas

Notary Public Sengwick County, Kansas

Printer's Fee : \$132.40

LEGAL PUBLICATION
PUBLISHED IN THE WICHITA EAGLE
JUNE 21, 2012 (3191786) BEFORE THE STATE CORPORATION
COMMISSION OF THE STATE OF KANSAS
RE: In the Matter of Postrock Midcontinent
Production, LEC Application for Contrainging of Production in the
Hamilina, Terry G 23-1 localed in Wilson
County, Kansas TO: All Oll & Gas Producers, Unlessed
Mineral Interest Owners, Landowners, and all persons whomever concerned.
You, and each of you, are hereby notified
Inal Postrock Midcontinent Roduction, LLC has filed an application to committige
the Bartlesville, Web, Fleming, Croweburg,
Bevier, Mulky and Summit producing formations at the Mainline, Terry G 23-
1. localed in the SE SW, S21-T205-R15E, Approximately 510 FNL & 1980 FWL, Wason
County, Kansas
Any persons who object to or projest inis application shall be required to file their
objections or protest with the Conservation Division of the State Corporation Commission
of the State of Kansas within fifteen (15)
days from the date of this publication. These protests shall be filed pursuant to
Commission regulations and must state.
Specific reasons why granting the application. May cause waste, violate correlative rights.
or pollute the natural resources of the State of Kansas
All persons interested on concerned shall
take notice of the forepoing and shall govern themselves accordingly. All person and/or
companies wishing to protest this application are required to file a written protest with the
Conservation Division of the Kansas Oll and .
Gas commission. Upon the receipt of any protest, the
Commission will convene a hearing and protestants will be expected to entersian
appearance - sither : through : proper liegal
counsel or as individuals, appearing on their own behalf control of the second
own behalf
210 Park Avenue, Sulta 2750 Oklahoma City, Oklahoma 73102
(405) 668-7704

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Conservation Division Finney State Office Building 130 S. Market, Rm. 2078 Wichita, KS 67202-3802

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Mark Sievers, Chairman Thomas E. Wright, Commissioner



Phone: 316-337-6200 Fax: 316-337-6211 http://kcc.ks.gov/

Sam Brownback, Governor

July 13, 2012

Clark Edwards PostRock Midcontinent Production LLC Oklahoma Tower 210 Park Ave, Ste 2750 Oklahoma City, OK 73102

#### RE: Approved Commingling CO071229 Hainline, Terry G. 23-1, Sec.23-T30S-R15E, Wilson County API No. 15-205-25935-00-01

Dear Mr. Edwards:

Your Application for Commingling (ACO-4) for the above described well, received by the KCC on July 13, 2012, has been reviewed and approved by the Kansas Corporation Commission (KCC) per K.A.R. 82-3-123. Notice was examined and found to be proper per K.A.R. 82-3-135a. No protest had been filed within the 15-day protest period.

Based upon the depth of the Bartlesville formation perforations, total oil production shall not exceed 100 BOPD and total gas production shall not exceed 50% of the absolute open flow (AOF).

Commingling ID number CO071229 has been assigned to this approved application. Use this number for well completion reports (ACO-1) and other correspondence that may concern this approved commingling.

Sincerely,

Rick Hestermann Production Department