

KANSAS CORPORATION COMMISSION  
OIL & GAS CONSERVATION DIVISION

Form ACO-4  
Form must be typed  
March 2009

**APPLICATION FOR COMMINGLING OF PRODUCTION (K.A.R. 82-3-123) OR FLUIDS (K.A.R. 82-3-123a)**      *Commingling ID #* \_\_\_\_\_

OPERATOR: License # \_\_\_\_\_ API No. 15 - \_\_\_\_\_  
Name: \_\_\_\_\_ Spot Description: \_\_\_\_\_  
Address 1: \_\_\_\_\_ - - - - - Sec. \_\_\_\_\_ Twp. \_\_\_\_\_ S. R. \_\_\_\_\_  East  West  
Address 2: \_\_\_\_\_ Feet from  North /  South Line of Section  
City: \_\_\_\_\_ State: \_\_\_\_\_ Zip: \_\_\_\_\_ + \_\_\_\_\_ Feet from  East /  West Line of Section  
Contact Person: \_\_\_\_\_ County: \_\_\_\_\_  
Phone: ( \_\_\_\_\_ ) \_\_\_\_\_ Lease Name: \_\_\_\_\_ Well #: \_\_\_\_\_

1. Name and upper and lower limit of each production interval to be commingled:  
Formation: \_\_\_\_\_ (Perfs): \_\_\_\_\_  
Formation: \_\_\_\_\_ (Perfs): \_\_\_\_\_  
Formation: \_\_\_\_\_ (Perfs): \_\_\_\_\_  
Formation: \_\_\_\_\_ (Perfs): \_\_\_\_\_  
Formation: \_\_\_\_\_ (Perfs): \_\_\_\_\_

2. Estimated amount of fluid production to be commingled from each interval:  
Formation: \_\_\_\_\_ BOPD: \_\_\_\_\_ MCFPD: \_\_\_\_\_ BWPD: \_\_\_\_\_  
Formation: \_\_\_\_\_ BOPD: \_\_\_\_\_ MCFPD: \_\_\_\_\_ BWPD: \_\_\_\_\_  
Formation: \_\_\_\_\_ BOPD: \_\_\_\_\_ MCFPD: \_\_\_\_\_ BWPD: \_\_\_\_\_  
Formation: \_\_\_\_\_ BOPD: \_\_\_\_\_ MCFPD: \_\_\_\_\_ BWPD: \_\_\_\_\_  
Formation: \_\_\_\_\_ BOPD: \_\_\_\_\_ MCFPD: \_\_\_\_\_ BWPD: \_\_\_\_\_

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.

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:**

- 5. Wireline log of subject well. Previously Filed with ACO-1:  Yes  No
- 6. Complete Form ACO-1 (*Well Completion form*) for the subject well.

**For Commingling of FLUIDS ONLY, include the following:**

- 7. Well construction diagram of subject well.
- 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.

**Submitted Electronically**

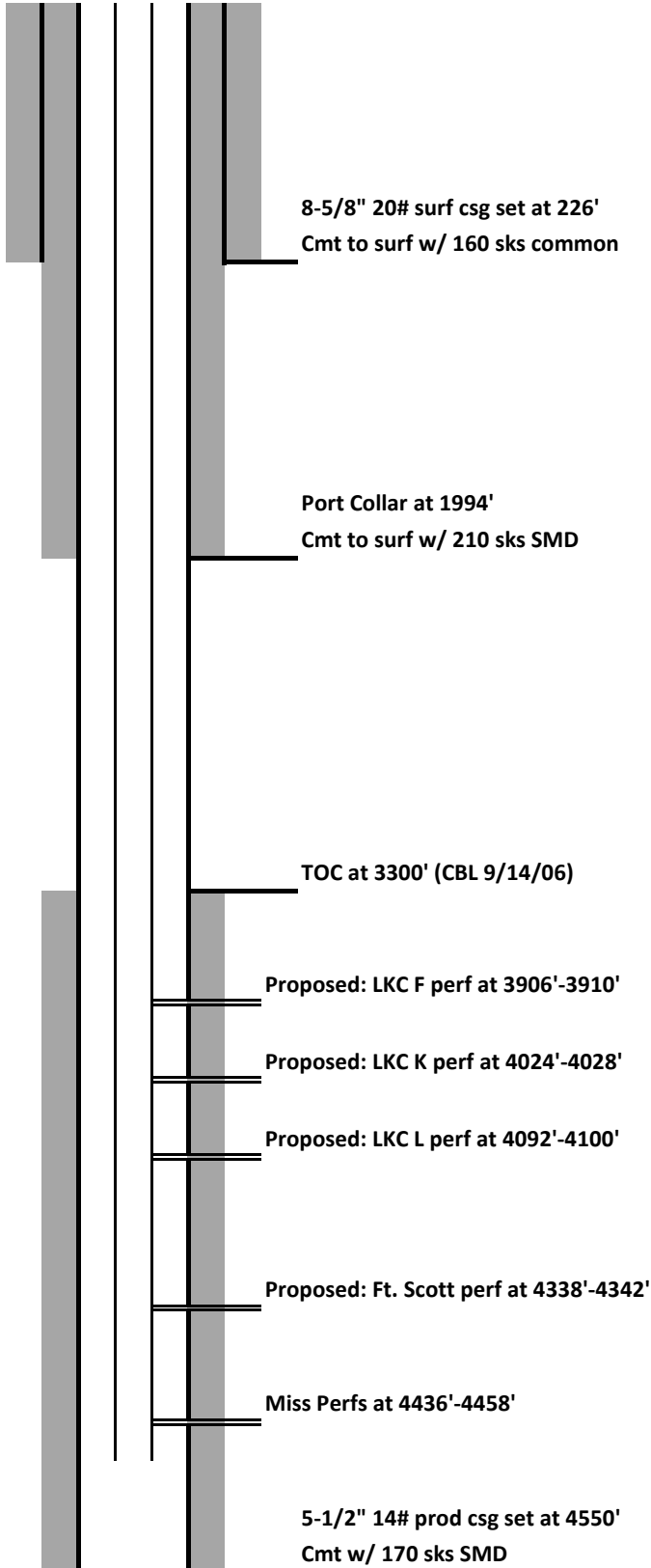
**KCC Office Use Only**  
 Denied  Approved  
15-Day Periods Ends: \_\_\_\_\_  
Approved By: \_\_\_\_\_ Date: \_\_\_\_\_

*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 within 15 days of publication of the notice of application.*



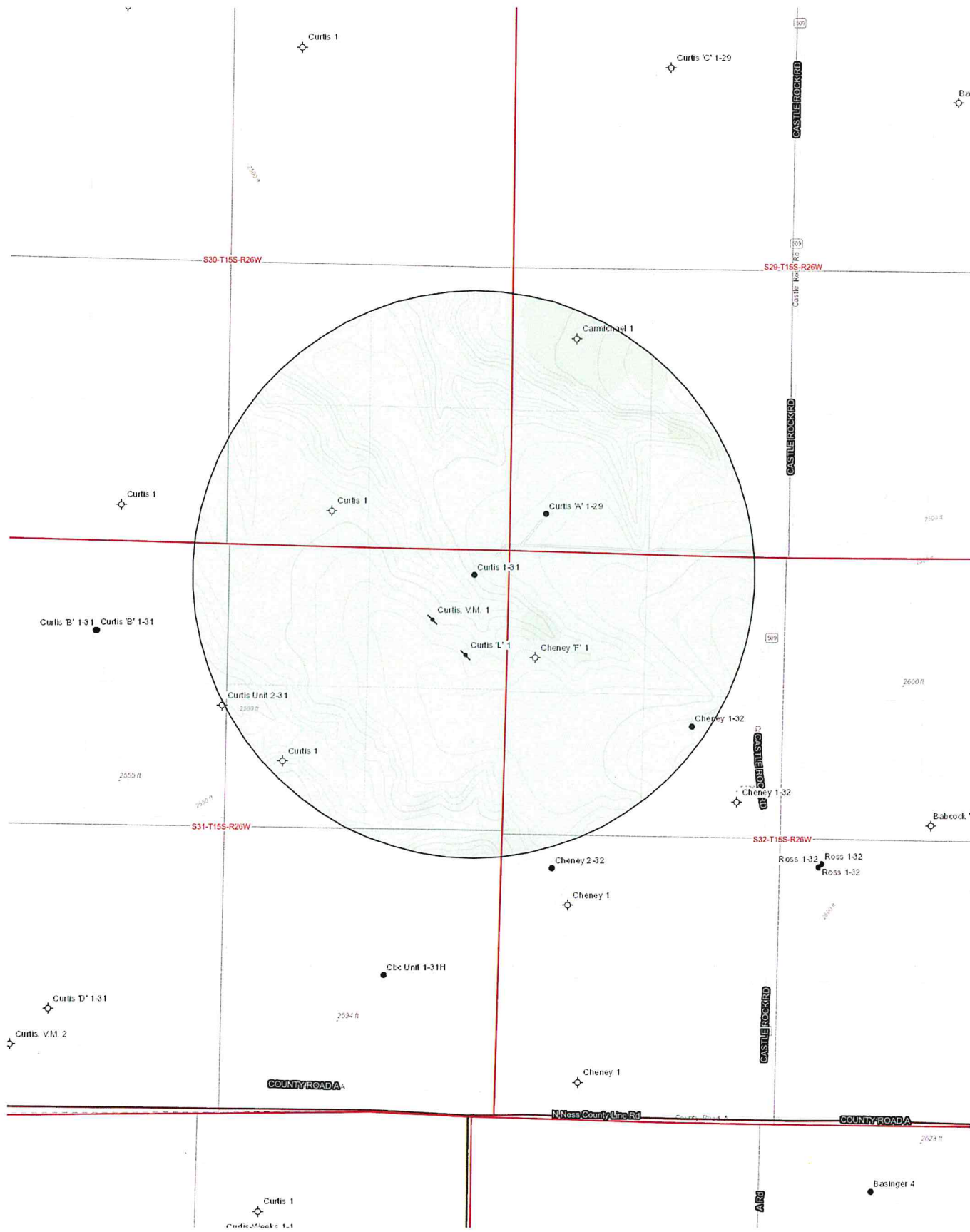
**DRILLING COMPANY, INC.**  
**WICHITA, KANSAS**

**Proposed Wellbore Configuration**



Date:	<u>3/30/2022</u>
Well Name:	<u>Curtis #1-31</u>
Location:	<u>256' FSL &amp; 330' FEL</u> <u>Section 31-T15S-R26W</u>
County:	<u>Gove</u>
State:	<u>Kansas</u>
API:	<u>15-063-21629</u>
KB:	<u>2563'</u>
GL:	<u>2554'</u>
Spud Date:	<u>8/26/2006</u>

PBTD: 4503'  
RTD: 4550'





**DRILLING COMPANY, INC.**  
WICHITA, KANSAS

ATTACHMENT TO ACO-4  
APPLICATION FOR COMMINGLING OF PRODUCTION

Signed Certificate of Notice to Offset Operators and Unleased Mineral Holders

Mull Drilling Company, Inc.

Curtis #1-31

NE/4 NE/4 Section 31-15S-26W

Gove County, Kansas

API No. 15-063-21629-00-00

Names and addresses of each operator or lessee of record and each unleased mineral owner within one half mile of the subject well:

Section 29: SW/4

Mull Drilling Company, Inc.  
1700 N Waterfront Pkwy, Bldg. 1200  
Wichita, KS 67206

Section 30: SE/4

Section 31: N/2 & SE/4

Section 32: W/2

Section 30: SW/4

Robert & Karilyn Kay Curtis  
228 S Kansas Avenue  
Ransom, KS 67572

Lisa M. & Randy L. Jacobs  
108 Inca Lane  
Scott City, KS 67871

Steffens Family 2013 Trust  
555 W Belford Road  
Imperial, CA 92251

Copy of the ACO-4 was mailed to the above listed companies/individuals on April 25, 2022.

Signed this 25th day of April, 2022.

MULL DRILLING COMPANY, INC.

Risa O'Bryhim

Production Technician

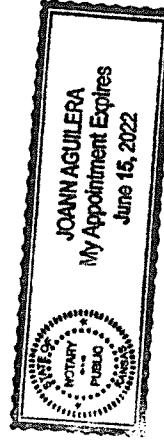
STATE OF KANSAS

COUNTY OF SEDGWICK

ACKNOWLEDGEMENT FOR INDIVIDUAL

Before me, the undersigned, a Notary Public, within and for said county and state, on this 25th day of April, 2022, personally appeared Risa O'Bryhim, Production Technician of Mull Drilling Company, Inc., to me personally known to be the identical person who executed the within and foregoing Certificate of Service Form and acknowledged to me that she executed the same as her free and voluntary act and deed for the uses and purposes therein set forth.

IN WITNESS WHEREOF, I have hereunto set my hand and official seal the day and year last above written.



Joann Aguilera, Notary Public

My commission expires: \_\_\_\_\_



Beaufort Gazette  
 Belleville News-Democrat  
 Bellingham Herald  
 Bradenton Herald  
 Centre Daily Times  
 Charlotte Observer  
 Columbus Ledger-Enquirer  
 Fresno Bee

The Herald - Rock Hill  
 Herald Sun - Durham  
 Idaho Statesman  
 Island Packet  
 Kansas City Star  
 Lexington Herald-Leader  
 Merced Sun-Star  
 Miami Herald

el Nuevo Herald - Miami  
 Modesto Bee  
 Raleigh News & Observer  
 The Olympian  
 Sacramento Bee  
 Fort Worth Star-Telegram  
 The State - Columbia  
 Sun Herald - Biloxi

Sun News - Myrtle Beach  
 The News Tribune Tacoma  
 The Telegraph - Macon  
 San Luis Obispo Tribune  
 Tri-City Herald  
 Wichita Eagle

## AFFIDAVIT OF PUBLICATION

Account #	Order Number	Identification	Order PO	Amount	Cols	Depth
38629	253639	Print Legal Ad - IPL0070482		\$293.50	1	50 L

**Attention:** Risa O'Bryhim  
 MULL DRILLING COMPANY, INC.  
 1700 N. WATERFRONT PKWY, BUILDING 1200  
 WICHITA, KS 67206

**LEGAL PUBLICATION**  
**BEFORE THE STATE**  
**CORPORATION COMMISSION**  
**OF THE STATE OF KANSAS**  
**NOTICE OF FILING**  
**APPLICATION**

Re: Mull Drilling Company, Inc. - Application for order to permit commingling of production of the Curtis #1-31, located in Gove County, Kansas.

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

You, and each of you, are hereby notified that Mull Drilling Company, Inc. has filed an application to commingle production of the LKC, Ft. Scott, and Mississippi formations on the Curtis #1-31, located NE/4 NE/4 31-15S-26W, Gove County, Kansas.

Any persons who object to or protest this application shall be required to file their objections or protests with the Conservation Division of the State Corporation Commission of the State of Kansas within fifteen (15) days from the date of the publication. These protests shall be filed pursuant to Commission regulations and must state specific reasons why the grant of the application may cause waste, violate correlative rights or pollute the natural resources of the state of Kansas. If no protests are received, this application may be granted through a summary proceeding. If valid protests are received, this matter will be set for hearing.

All persons interested or concerned shall take notice of the foregoing and shall govern themselves accordingly.

Mull Drilling Company, Inc.  
 1700 N. Waterfront Parkway, Building 1200

Wichita, KS 67206  
 316-264-6366

IPL0070482  
 Apr 27 2022

In The STATE OF KANSAS  
 In and for the County of Sedgwick

No. of Insertions: 1  
 Beginning Issue of: 04/27/2022  
 Ending Issue of: 04/27/2022

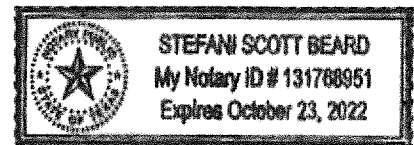
STATE OF KANSAS)  
 SS  
 County of Sedgwick)

Hayley Martin, 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 from 04/27/2022 to 04/27/2022.

I certify (or declare) under penalty of perjury that the foregoing is true and correct.

DATED: 04/27/2022

Notary Public in and for the state of Texas, residing in Dallas County



Extra charge for lost or duplicate affidavits.  
 Legal document please do not destroy!

**AFFIDAVIT OF PUBLICATION**

State of Kansas,  
Gove County, ss:

Frank Mercer

being first duly sworn, deposes and

says: That he is

Publisher of

**Gove County Advocate**, a weekly newspaper printed in the State of Kansas, and published in and of general circulation in Gove County, Kansas, with a general paid circulation on a weekly basis in Gove County, Kansas, and that said newspaper is not a trade, religious or fraternal publication.

Said newspaper is a weekly published at least 50 times a year; and has been so published continuously and uninterruptedly in said county and state for a period of more than five years prior to the first publication of said notice; and has been admitted at the post office in Quinter in said county as periodical class mail-matter.

That the attached notice is a true copy thereof and was published in the regular and entire issue of said newspaper for 1 time consecutive week(s), the first publication thereof being made as aforesaid on the 27th day of April, 2022 with subsequent publications being made on the following dates:

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

Printer's Fee ..... \$ 39.60

Additional Copies ..... \$ \_\_\_\_\_

Affidavit Fees ..... \$ 225

Total Publication Fees \$ 41.85

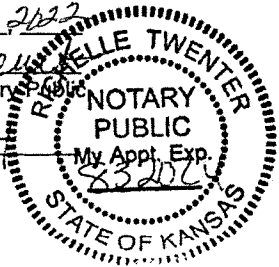
Subscribed and sworn to before me

this 27th day of

April, 2022

Rachelle M...  
Notary Public

My commission expires: Aug 3-2024



(Published in the Gove County Advocate, Quinter, KS, Wed., April 27, 2022 - 1t)

**Mull Drilling Company, Inc.**  
Wichita, KS

**BEFORE THE STATE CORPORATION COMMISSION OF THE STATE OF KANSAS NOTICE OF FILING APPLICATION**

Re: Mull Drilling Company, Inc. - Application for order to permit commingling of production of the Curtis #1-31, located in Gove County, Kansas.

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

You, and each of you, are hereby notified that Mull Drilling Company, Inc. has filed an application to commingle production of the LKC, Ft. Scott, and Mississippi formations on the Curtis #1-31, located NE/4 NE/4 31-15S-26W, Gove County, Kansas.

Any persons who object to or protest this application shall be required to file their objections or protests with the Conservation Division of the State Corporation Commission of the State of Kansas within fifteen (15) days from the date of the publication. These protests shall be filed pursuant to Commission regulations and must state specific reasons why the grant of the application may cause waste, violate correlative rights or pollute the natural resources of the state of Kansas. If no protests are received, this application may be granted through a summary proceeding. If valid protests are received, this matter will be set for hearing.

All persons interested or concerned shall take notice of the foregoing and shall govern themselves accordingly.

**Mull Drilling Company, Inc.**  
1700 N. Waterfront Parkway,  
Building 1200  
Wichita, KS 67206  
316-264-6366



# DownHole SAT(tm)

## FORMATION WATER CHEMISTRY INPUT

Mull Drilling  
Curtis 1-31  
Wellhead

Pro-Stim Chemicals  
Troy Pelton

Report Date: 06-07-2018      Sampled: 05-16-2018 at 1644  
Sample #: 4202                      Sample ID: WBaten

### CATIONS

Calcium (as Ca)	1680
Magnesium (as Mg)	267.00
Barium (as Ba)	0.00
Strontium (as Sr)	0.00
Sodium (as Na)	11888
Potassium (as K)	0.00
Lithium (as Li)	0.00
Ammonia (as NH <sub>3</sub> )	0.00
Aluminum (as Al)	0.00
Iron (as Fe)	35.00
Manganese (as Mn)	0.280
Zinc (as Zn)	0.00
Lead (as Pb)	0.00

### ANIONS

Chloride (as Cl)	20400
Sulfate (as SO <sub>4</sub> )	2600
Bromine (as Br)	0.00
Dissolved CO <sub>2</sub> (as CO <sub>2</sub> )	210.00
Bicarbonate (as HCO <sub>3</sub> )	420.00
Carbonate (as CO <sub>3</sub> )	0.00
Oxalic acid (as C <sub>2</sub> O <sub>4</sub> )	0.00
Silica (as SiO <sub>2</sub> )	0.00
Phosphate(as PO <sub>4</sub> )	0.00
H <sub>2</sub> S (as H <sub>2</sub> S)	50.00
Fluoride (as F)	0.00
Nitrate (as NO <sub>3</sub> )	0.00
Boron (as B)	0.00

### PARAMETERS

Calculated T.D.S.	37125
Molar Conductivity	47813
Resistivity	20.91
Sp.Gr.(g/mL)	1.02
Pressure(psia)	14.70
pCO <sub>2</sub> (psia)	0.0291
pH <sub>2</sub> S(atm)	0.00851
Temperature (°F)	70.00
pH	6.99

### CORROSION RATE PREDICTION

CO <sub>2</sub> - H <sub>2</sub> S Rate(mpy)	0.00568
--	---------

**COMMENTS** All anions & cations are in mg/l

**FRENCH CREEK SOFTWARE, INC.**  
**1220 VALLEY FORGE ROAD, SUITE 21, VALLEY FORGE, PA 19460**



**DownHole SAT(tm)**  
**FORMATION WATER**  
**DEPOSITION POTENTIAL INDICATORS**

Mull Drilling  
 Curtis 1-31  
 Wellhead

Pro-Stim Chemicals  
 Troy Pelton

Report Date: 06-07-2018      Sampled: 05-16-2018 at 1644  
 Sample #: 4202                      Sample ID: WBaten

**SATURATION LEVEL**

Calcite (CaCO <sub>3</sub> )	3.00
Aragonite (CaCO <sub>3</sub> )	2.82
Witherite (BaCO <sub>3</sub> )	0.00
Strontianite (SrCO <sub>3</sub> )	0.00
Calcium oxalate (CaC <sub>2</sub> O <sub>4</sub> )	0.00
Magnesite (MgCO <sub>3</sub> )	0.392
Anhydrite (CaSO <sub>4</sub> )	0.645
Gypsum (CaSO <sub>4</sub> *2H <sub>2</sub> O)	1.06
Barite (BaSO <sub>4</sub> )	0.00
Celestite (SrSO <sub>4</sub> )	0.00
Fluorite (CaF <sub>2</sub> )	0.00
Calcium phosphate	0.00
Hydroxyapatite	0.00
Silica (SiO <sub>2</sub> )	0.00
Brucite (Mg(OH) <sub>2</sub> )	< 0.001
Magnesium silicate	0.00
Iron hydroxide (Fe(OH) <sub>3</sub> )	< 0.001
Strengite (FePO <sub>4</sub> *2H <sub>2</sub> O)	0.00
Siderite (FeCO <sub>3</sub> )	96.47
Halite (NaCl)	0.00355
Thenardite (Na <sub>2</sub> SO <sub>4</sub> )	< 0.001
Iron sulfide (FeS)	498.03

**FREE ION MOMENTARY EXCESS (ppm)**

Calcite (CaCO <sub>3</sub> )	0.477
Aragonite (CaCO <sub>3</sub> )	0.462
Witherite (BaCO <sub>3</sub> )	-49.46
Strontianite (SrCO <sub>3</sub> )	-15.98
Calcium oxalate (CaC <sub>2</sub> O <sub>4</sub> )	-0.113
Magnesite (MgCO <sub>3</sub> )	-0.935
Anhydrite (CaSO <sub>4</sub> )	-787.80
Gypsum (CaSO <sub>4</sub> *2H <sub>2</sub> O)	103.59
Barite (BaSO <sub>4</sub> )	-0.0344
Celestite (SrSO <sub>4</sub> )	-65.73
Fluorite (CaF <sub>2</sub> )	-19.40
Calcium phosphate	>-0.001
Hydroxyapatite	-926.02
Silica (SiO <sub>2</sub> )	-103.56
Brucite (Mg(OH) <sub>2</sub> )	0.00623
Magnesium silicate	-286.62
Iron hydroxide (Fe(OH) <sub>3</sub> )	< 0.001
Strengite (FePO <sub>4</sub> *2H <sub>2</sub> O)	>-0.001
Siderite (FeCO <sub>3</sub> )	0.820
Halite (NaCl)	-498426
Thenardite (Na <sub>2</sub> SO <sub>4</sub> )	-186537
Iron sulfide (FeS)	11.32

**SIMPLE INDICES**

Langelier	0.661
Ryznar	5.67
Puckorius	4.43
Larson-Skold Index	92.98
Stiff Davis Index	0.109
Oddo-Tomson	-0.0168

**BOUND IONS**

Calcium	1680
Barium	0.00
Carbonate	3.14
Phosphate	0.00
Sulfate	2600

**TOTAL**

**FREE**

**OPERATING CONDITIONS**

Temperature (°F)	70.00
Time(mins)	3.00



Conservation Division  
266 N. Main St., Ste. 220  
Wichita, KS 67202-1513



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

Dwight D. Keen, Chair  
Susan K. Duffy, Commissioner  
Andrew J. French, Commissioner

Laura Kelly, Governor

June 1, 2022

Mark Shreve  
Mull Drilling Co., Inc.  
1700 N Waterfront Pkwy, Bldg 1200  
Wichita, KS 67206

RE: Approved Commingling CO052203  
Curtis 1-31  
API No. 15-063-21629-00-00

Dear Mr. Shreve:

Your Application for Commingling (ACO-4) for the above described well 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 Mississippi formation perforations, total oil production shall not exceed 200 BOPD and total gas production shall not exceed 50% of the absolute open flow (AOF).

Sincerely,

Production Department Supervisor