

SIDE ONE

STATE CORPORATION COMMISSION OF KANSAS
OIL & GAS CONSERVATION DIVISION
WELL COMPLETION FORM
ACO-1 WELL HISTORY
DESCRIPTION OF WELL AND LEASE

API NO. 15- 065-22,528-00-00

County Graham

Approx. C NE SW Sec. 36 Twp. 10S Rge. 24 East X West

1820 Ft. North from Southeast Corner of Section

3250 Ft. West from Southeast Corner of Section
(NOTE: Locate well in section plat below.)

Lease Name Ruder Well # 1

Field Name Geyer East

Producing Formation Kansas City "I" Zone

Elevation: Ground 2312' KB 2317'

Total Depth 4020' X PBDT 3860.00'

Operator: License # 4964

Name: DCF Exploration

Address 940 Wadsworth Boulevard

Suite 100

City/State/Zip Lakewood, CO 80215

Purchaser: KOCH Oil Company - Lease #: 79026

Operator Contact Person: Douglas C. Frickey

Phone (303) -232-5011

Contractor: Name: Emphasis Oil Operations

License: 8241

Wellsite Geologist: James E. Gribi

Designate Type of Completion

New Well Re-Entry Workover

Oil SWD Temp. Abd.

Gas Inj Delayed Comp.

Dry Other (Core, Water Supply, etc.)

If OWMO: old well info as follows:

Operator: _____

Well Name: _____

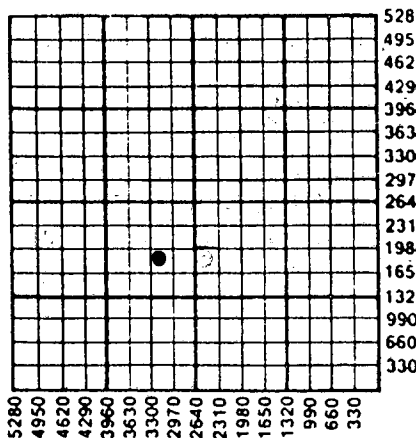
Comp. Date _____ Old Total Depth _____

Drilling Method:

Mud Rotary Air Rotary Cable

7/22/89 7/31/89 8/22/89

Spud Date Date Reached TD Completion Date



9-27-89

Amount of Surface Pipe Set and Cemented at 224 Feet

Multiple Stage Cementing Collar Used? Yes No

If yes, show depth set 1886 (D.V. tool) Feet

If Alternate II completion, cement circulated from 1886'

feet depth to surface w/ 225 sx cmt.

INSTRUCTIONS: This form shall be completed in triplicate and filed with the Kansas Corporation Commission, 200 Colorado Derby Building, Wichita, Kansas 67202, within 120 days of the spud date of any well. Rule 82-3-130, 82-3-107 and 82-3-106 apply. Information on side two of this form will be held confidential for a period of 12 months if requested in writing and submitted with the form. See rule 82-3-107 for confidentiality in excess of 12 months. One copy of all wireline logs and drillers time log shall be attached with this form. ALL CEMENTING TICKETS MUST BE ATTACHED. Submit CP-4 form with all plugged wells. Submit CP-111 form with all temporarily abandoned wells. Any recompletion, workover or conversion of a well requires filing of ACO-2 within 120 days from commencement date of such work.

All requirements of the statutes, rules and regulations promulgated to regulate the oil and gas industry have been fully complied with and the statements herein are complete and correct to the best of my knowledge.

Signature Douglas C. Frickey
Title President Date 9/07/89

Subscribed and sworn to before me this 7th day of September,
19 89

Notary Public Darcel L. Hartley
Date Commission Expires 10/02/90

K.C.C. OFFICE USE ONLY
F Letter of Confidentiality Attached
C Wireline Log Received
C Drillers TimeLog Received

Distribution
 KCC SWD/Rep NGPA
 KGS Plug Other
(Specify)

SEP 11 1989
9-11-89
CONSERVATION DIVISION
Wichita, Kansas

Form ACO-1 (7-89)

SIDE TWO

Operator Name DCF Exploration Lease Name Ruder Well # 1
 Sec. 36 Twp. 10S Rge. 24 East County Graham
 West

INSTRUCTIONS: Show important tops and base of formations penetrated. Detail all cores. Report all drill stem tests giving interval tested, time tool open and closed, flowing and shut-in pressures, whether shut-in pressure reached static level, hydrostatic pressures, bottom hole temperature, fluid recovery, and flow rates if gas to surface during test. Attach extra sheet if more space is needed. Attach copy of log.

Drill Stem Tests Taken Yes No
 (Attach Additional Sheets.)
 Samples Sent to Geological Survey Yes No
 Cores Taken Yes No
 Electric Log Run Yes No
 (Submit Copy.)

(SEE ATTACHED PAGES 1 & 2)

Formation Description

Log Sample

(SEE ATTACHED PAGE 1)

CASING RECORD

New Used

Report all strings set-conductor, surface, intermediate, production, etc.

Purpose of String	Size Hole Drilled	Size Casing Set (In O.D.)	Weight Lbs./Ft.	Setting Depth	Type of Cement	# Sacks Used	Type and Percent Additives
SURFACE	12 1/4"	8 5/8"	23#	224'	60/40 Poz	140	3% cc, 2% gel
PRODUCTION	7 7/8"	4 1/2"	10.5#	4019'	EA-2	140	
TWO-STAGE	7 7/8"	4 1/2"	10.5#	1886'	Hays Dist.	225	
				D.V. Tool	Lite		

PERFORATION RECORD

Acid, Fracture, Shot, Cement Squeeze Record
 (Amount and Kind of Material Used) Depth

Shots Per Foot	Specify Footage of Each Interval Perforated	Acid, Fracture, Shot, Cement Squeeze Record (Amount and Kind of Material Used) Depth
(4)	3833' - 3840' K.C. "I" Zone	500 gal. 15% MCA HCl Acid
(4)	3833' - 3840' K.C. "I" Zone	2000 gal. 20% SGA HCl Acid

TUBING RECORD

Size 2 3/8" Set At 3852.97' Packer At _____

Liner Run Yes No

Date of First Production _____ Producing Method Flowing Pumping Gas Lift Other (Explain) _____

Estimated Production Per 24 Hours
 Oil 58.45 Bbls. Gas 13.36 Mcf Water 13.36 Bbls. Gas-Oil Ratio _____ Gravity 35

Disposition of Gas:

METHOD OF COMPLETION

Vented Sold Used on Lease
 (If vented, submit ACO-18.)

Open Hole Perforation Dually Completed Commingled
 Other (Specify) _____

Production Interval

3833' - 3840'
 K.C. "I" Zone

HALLIBURTON SERVICES
Duncan, Oklahoma 73536

A Division of Halliburton Company

15-065-22588-00-00

TICKET

NO. 724138-8

FORM 1906 R-11

WELL NO. - FARM OR LEASE NAME 1 Ruder		COUNTY Graham	STATE KS	CITY / OFFSHORE LOCATION	DATE 07/30/89
CHARGE TO DCF Exploration		OWNER DCF Exploration		TICKET TYPE (CHECK ONE) SERVICE <input checked="" type="checkbox"/> SALES <input type="checkbox"/>	
ADDRESS 940 Wadsworth Blvd.		CONTRACTOR Emphasis Drlg.		LOCATION 1 Oberlin, KS	
CITY, STATE, ZIP Lakewood, CO 80215		SHIPPED VIA 3579/50181		LOCATION 2	
WELL TYPE 01		WELL PERMIT NO. B- 835373		LOCATION 3	
TYPE AND PURPOSE OF JOB 035		ORDER NO.		REFERRAL LOCATION	

As consideration, the above-named Customer agrees to pay Halliburton in accord with the rates and terms stated in Halliburton's current price lists. Invoices payable NET by the 20th of the following month after date of invoice. Upon Customer's default in payment of Customer's account by the last day of the month following the month in which the invoice is dated, Customer agrees to pay interest thereon after default at the highest lawful contract rate applicable, but never to exceed 18% per annum. In the event it becomes necessary to employ an attorney to enforce collection of said account, Customer agrees to pay all collection costs and attorney fees in the amount of 20% of the amount of the unpaid account. These terms and conditions shall be governed by the law of the state where services are performed or equipment or materials are furnished.

Halliburton warrants only title to the products, supplies and materials and that the same are free from defects in workmanship and materials. THERE ARE NO WARRANTIES, EXPRESS OR IMPLIED, OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE OR OTHERWISE WHICH EXTEND BEYOND THOSE STATED IN THE IMMEDIATELY PRECEDING SENTENCE. Halliburton's liability and customer's exclusive remedy in any cause of action (whether in contract, tort, product liability, breach of warranty or otherwise) arising out of the sale or use of any products, supplies or materials is expressly limited to the replacement of such products, supplies or materials on their return to Halliburton or, at Halliburton's option, to the allowance to the customer of credit for the cost of such items. In no event shall Halliburton be liable for special, incidental, indirect, punitive or consequential damages.

PRICE REFERENCE	SECONDARY REF OR PART NO.	L O C	ACCOUNT	DESCRIPTION	UNITS 1		UNITS 2		UNIT PRICE	AMOUNT
					QTY	MEAS	QTY	MEAS		
000-117		1		MILEAGE #3579	42	Mi.			2.20	92.40
001-016		1		Pump Charge 1 st STAGE	40	19 Ft.				1056.00
018-317		1		Superflush	7	sk			72.00	504.00
26	847.6316	1		Insert Valve Float Shoe	1	ea.	4-1/2	In.		216.00
27	815.19111	1		Auto Fill Assembly	1	ea.	1.000	In.		27.50
40	807.93004	1		S-4 Centralizers	8	ea.	4-1/2	In.	41.00	328.00
66	807.64021	1		Fas-Grip Limity Clamps	0	ea.	4-1/2	In.	9.60	0
73	813.10161	1		Multiple Stage Cementer	1	ea.	4-1/2	In.		2,350.00
75	812.0112	1		Two-Stage Free Fall Plug Set	1	Set	4-1/2	In.		330.00
320	800.8881	1		Cement Baskets	3	ea.	4-1/2	In.	85.00	255.00
350	890.10802	1		Halliburton Weld 'A'	1	lb.				11.00
035-161				2 nd STAGE						865.00

RECEIVED
STATE CORPORATION COMMISSION
SEP 11 1989
CONSERVATION DIVISION
Wichita, Kansas

AS PER ATTACHED BULK MATERIAL DELIVERY TICKET NO. **B- 835373** 4,208.72

WAS JOB SATISFACTORILY COMPLETED? _____
 WAS OPERATION OF EQUIPMENT SATISFACTORY? _____
 WAS PERFORMANCE OF PERSONNEL SATISFACTORY? _____
 X Douglas C. Frickey
 CUSTOMER OR HIS AGENT (PLEASE PRINT)
 X Douglas C. Frickey
 CUSTOMER OR HIS AGENT (SIGNATURE)

WE CERTIFY THAT THE FAIR LABOR STANDARDS ACT OF 1938, AS AMENDED HAS BEEN COMPLIED WITH IN THE PRODUCTION OF GOODS AND OR WITH RESPECT TO SERVICES FURNISHED UNDER THIS CONTRACT.

Darryl L. Hilde H.D. HOGG'S
 HALLIBURTON OPERATOR

HALLIBURTON APPROVAL
 CUSTOMER

SUB TOTAL
 APPLICABLE TAXES WILL BE ADDED ON INVOICE.



BULK MATERIALS DELIVERY AND TICKET CONTINUATION

FOR INVOICE AND
TICKET NO. 124138

DATE 7/30/89	CUSTOMER ORDER NO.	WELL NO. AND FARM 1 Ruder	COUNTY Graham	STATE KS
CHARGE TO: BCF Exploration		OWNER BCF Exploration	CONTRACTOR Emphasis Drlg.	No. B 835373
MAILING ADDRESS 940 Wadsworth Blvd.		DELIVERED FROM Oberlin, KS	LOCATION CODE 50329	PREPARED BY Lyle
CITY & STATE Lakewood, CO 80215		DELIVERED TO S/Hill City, KS	TRUCK NO. 50181	RECEIVED BY <i>Gary L. Waldo</i>

PRICE REFERENCE	SECONDARY REF. OR PART NO.	CODE		DESCRIPTION	UNITS 1		UNITS 2		UNIT PRICE	AMOUNT	
		L	D		QTY.	MEAS.	QTY.	MEAS.			
504-308		1	B	Standard Cement	140	sk			6.75	945.00 800	
508-127		1	B	Cal-Seal	6	sk			14.60	87.60	
509-968		1	B	Salt Granulated	1092	lb			.063	68.80	
507-775		1	B	Halad-322	52	lb			5.50	286.00	
507-970		1	B	D-Air-1	32	lb			2.50	80.00	
504-308		1	B	Standard Cement	146	sk			6.75	985.50	
506-105		1	B	Pozmix 'A'	79	sk			3.50	276.50	
506-121		1	B	(4) Halliburton Gel Allowed 2%						N/C	
507-277		1	B	(15) Halliburton Gel Added 8%	15	sk			13.00	195.00	
507-285		1	B	Econolite	391	lb			.80	312.80	
507-210		1	B	Flocele	56	lb			1.21	67.76	
					Returned Mileage Charge	TOTAL WEIGHT	LOADED MILES	TON MILES			
					RECEIVED STATE OF KANSAS SEP 11 1989			CU. FEET			
500-207		1	B	SERVICE CHARGE					381.95	361.95	
500-306		1	B	Mileage Charge	36,858	42			774.02	541.81	
					TOTAL WEIGHT	LOADED MILES	TON MILES				
No. B 835373		CARRY FORWARD TO INVOICE					SUB-TOTAL				4,208.72

CUSTOMER

**WORK ORDER CONTRACT
AND PRE-TREATMENT DATA**

FORM 1908 R-7

ATTACH TO INVOICE & TICKET NO. 7201138

DISTRICT 1445 KS DATE 7-30-89

TO: **HALLIBURTON SERVICES** YOU ARE HEREBY REQUESTED TO FURNISH EQUIPMENT AND SERVICEMEN TO DELIVER AND OPERATE

THE SAME AS AN INDEPENDENT CONTRACTOR TO: DCF EXPLORATION (CUSTOMER)
AND DELIVER AND SELL PRODUCTS, SUPPLIES, AND MATERIALS FOR THE PURPOSE OF SERVICING

WELL NO. #1 LEASE RUDER SEC 105 TWP. 24W RANGE 3E

FIELD SPIRIT CITY KS COUNTY GRAHAM STATE KS OWNED BY DCF EXPLORATION

THE FOLLOWING INFORMATION WAS FURNISHED BY THE CUSTOMER OR HIS AGENT

FORMATION NAME _____ TYPE _____
FORMATION THICKNESS _____ FROM _____ TO _____
PACKER: TYPE LDV @ 1886.69 SET AT _____
TOTAL DEPTH 4020 MUD WEIGHT _____
BORE HOLE 11 7/8
INITIAL PROD: OIL _____ BPD, H₂O _____ BPD, GAS _____ MCF
PRESENT PROD: OIL _____ BPD, H₂O _____ BPD, GAS _____ MCF

	NEW USED	WEIGHT	SIZE	FROM	TO	MAX. ALLOW. P.S.I.
CASING		10.5	11/2		4019	
LINER						
TUBING						
OPEN HOLE			11 7/8		4020	SHOTS/FT.
PERFORATIONS						
PERFORATIONS						
PERFORATIONS						

PREVIOUS TREATMENT: DATE _____ TYPE _____ MATERIALS _____

TREATMENT INSTRUCTIONS: TREAT THRU TUBING ANNULUS CASING TUBING/ANNULUS HYDRAULIC HORSEPOWER ORDERED _____

CEMENT 1/2 PRODUCTION CASING W/ 300 GAL SUPERFLUSH
140 SPS EA-D 500 GAL SEAL, 180% SMT 4 1/2 HALLAD 322, 25 D-AIR / SK
225 SPS HDL 1/4" ID-CLE 1SK AS DIRECTED

CUSTOMER OR HIS AGENT WARRANTS THE WELL IS IN PROPER CONDITION TO RECEIVE THE PRODUCTS, SUPPLIES, MATERIALS, AND SERVICES

As consideration, the above-named Customer agrees: **THIS CONTRACT MUST BE SIGNED BEFORE WORK IS COMMENCED**

a) To pay Halliburton in accordance with the rates and terms stated in Halliburton's current price list. Invoices are payable NET by the 20th of the following month after date of the well log. In the event of a default in payment of Customer's account by the last day of the month following the month in which the invoice is dated, Customer agrees to pay interest thereon after default at the highest lawful contract rate applicable, but never to exceed 18% per annum. In the event it becomes necessary to employ attorneys to enforce collection of said account, Customer agrees to pay all collection costs and all attorney fees in the amount of 20% of the amount of the unpaid account.

b) To defend, indemnify, release and hold harmless Halliburton, its divisions, subsidiaries, parent and affiliated companies and the officers, directors, employees, agents and servants of all of them from and against any claims, liability, expenses, attorneys fees, and costs of defense to the extent permitted by law for:

1. Damage to property owned by, in the possession of, or leased by Customer, and/or the well owner (if different from Customer, including but not limited to surface and subsurface damage. The term "well owner" shall include working and royalty interest owners.
2. Reservoir, formation, or well loss or damage, subsurface trespass or any action in the nature thereof.
3. Personal injury or death or property damage (including, but not limited to, damage to the reservoir, formation or well), or any damages which occur, growing out of or in any way connected with or resulting from pollution, subsurface pressure, losing control of the well and/or a well blowout or the use of radioactive material.

The defense, indemnity, release and hold harmless obligations of Customer provided for in this Section b) and Section c) below shall apply to claims or liability even if caused or contributed to by Halliburton's negligence, strict liability, or the unseaworthiness of any vessel owned, operated, or furnished by Halliburton or any defect in the data, products, supplies, materials, or equipment of Halliburton which are used in the preparation, design, manufacture, distribution, or marketing thereof, or from a failure to warn any person of such defect. Such defense, indemnity, release and hold harmless obligations of Customer shall not apply where the claims or liability are caused by the gross negligence or willful misconduct of Halliburton. The term "Halliburton" as used in said Sections b) and c) shall mean Halliburton, its divisions, subsidiaries, parent and affiliated companies, and the officers, directors, employees, agents and servants of all of them.

c) That because of the uncertainty of variable well conditions and the necessity of relying on facts and supporting services furnished by others, Halliburton is unable to guarantee the effectiveness of the products, supplies or materials and the results of any treatment or service, nor the accuracy of any chart interpretation, research analysis, job recommendation or other data furnished by Halliburton personnel. Halliburton personnel will use their best efforts in gathering such information and their best judgment in interpreting it, but Customer agrees that Halliburton shall not be liable for and Customer shall indemnify Halliburton against any damages arising from the use of such information.

That Halliburton warrants only title to the products, supplies and materials and that the same are free from defects in workmanship and materials. THERE ARE NO WARRANTIES, EXPRESS OR IMPLIED, OF MERCHANTABILITY, FITNESS OR OTHERWISE WHICH EXTEND BEYOND THOSE STATED IN THE IMMEDIATELY PRECEDING SENTENCE. Halliburton's liability and Customer's exclusive remedy in any cause of action (whether in contract, tort, breach of warranty or otherwise) arising out of the sale or use of any products, supplies or materials is expressly limited to the replacement of such products, supplies or materials on their return to Halliburton or, at Halliburton's option, to the allowance to the Customer of credit for the cost of such items. In no event shall Halliburton be liable for special, incidental, direct, punitive or consequential damages.

That Customer shall, at its risk and expense, attempt to recover any Halliburton equipment, tools or instruments which are lost in the well and if such equipment, tools or instruments are not recovered, Customer shall pay Halliburton its replacement cost unless such loss is due to the sole negligence of Halliburton. If Halliburton equipment, tools or instruments are damaged in the well, Customer shall pay Halliburton the lesser of its replacement cost or the cost of repairs unless such damage is caused by the sole negligence of Halliburton. In the case of equipment, tools or instruments for marine operations, Customer shall, in addition to the foregoing, be fully responsible for loss of or damage to any of Halliburton's equipment, tools or instruments, which occurs at any time after delivery to Customer at the landing and returned to the landing, unless such loss or damage is caused by the sole negligence of Halliburton.

To waive the provisions of the Deceptive Trade Practices - Consumer Protection Act, to the extent permitted by law.

That this contract shall be governed by the law of the state where services are performed or materials are furnished.

That Halliburton shall not be bound by any changes or modifications in this contract, except where such change or modification is made in writing by a duly authorized executive officer of Halliburton.

RECEIVED
STATE CORPORATION COMMISSION

I HAVE READ AND UNDERSTAND THIS CONTRACT AND REPRESENT THAT I AM AUTHORIZED TO SIGN THE SAME AS CUSTOMER'S AGENT.

SEP 11 1989

SIGNED [Signature] CUSTOMER

CONSERVATION DIVISION DATE 7-30-89

That the Fair Labor Standards Act of 1938, as amended, has been complied with in the sale of goods and/or with respect to services furnished under this contract.

TIME 2000 A.M. (P.M.)

CUSTOMER

WELL DATA
 FIELD 15/HILL CITY KS SEC. 105 TWP. 24W RNG. 36 COUNTY BRADSHAW STATE KS

FORMATION NAME _____ TYPE _____
 FORMATION THICKNESS _____ FROM _____ TO _____
 INITIAL PROD: OIL _____ BPD. WATER _____ BPD. GAS _____ MCFD _____
 PRESENT PROD: OIL _____ BPD. WATER _____ BPD. GAS _____ MCFD _____
 COMPLETION DATE _____ MUD TYPE _____ MUD WT. _____
 PACKER TYPE DV @ 1856.69 SET AT _____
 BOTTOM HOLE TEMP. _____ PRESSURE _____
 MISC. DATA _____ TOTAL DEPTH 4020

	NEW USED	WEIGHT	SIZE	FROM	TO	MAXIMUM PSI ALLOWABLE
CASING						
LINER						
TUBING			<u>SEE</u>			
OPEN HOLE						SHOTS/FT.
PERFORATIONS				<u>W. C.</u>		
PERFORATIONS						
PERFORATIONS						

TOOLS AND ACCESSORIES

TYPE AND SIZE	QTY.	MAKE
FLOAT COLLAR <u>4 1/2 - 6 1/2</u>	<u>1</u>	<u>FA</u>
FLOAT SHOE <u>INSERT</u>	<u>1</u>	<u>FA</u>
GUIDE SHOES <u>SMALL WHEEL #</u>	<u>1</u>	<u>FA</u>
CENTRALIZERS <u>2-4</u>	<u>2</u>	<u>FA</u>
ROTTEN-PLUG <u>2-4</u>	<u>2</u>	<u>FA</u>
PACKER <u>MS. COVER</u>	<u>1</u>	<u>FA</u>
OTHER <u>PLUG SET 2-5</u>	<u>1</u>	<u>FA</u>

JOB DATA

CALLED OUT	ON LOCATION	JOB STARTED	JOB COMPLETED
DATE <u>7-30-89</u>	DATE <u>7-30-89</u>	DATE <u>7-31-89</u>	DATE <u>7-31-89</u>
TIME <u>1530</u>	TIME <u>2000</u>	TIME <u>0915</u>	TIME <u>1240</u>

PERSONNEL AND SERVICE UNITS

NAME	UNIT NO. & TYPE	LOCATION
<u>W.D. BERRY</u>	<u>3547</u>	<u>MT 4020 Hill City, KS</u>
<u>CL. WALDO</u>	<u>5047</u>	<u>660 BT</u>
<u>W.D. HUGHES</u>	<u>36075</u>	<u>"</u>

MATERIALS

TREAT. FLUID _____ DENSITY _____ LB./GAL. API _____
 DISPL. FLUID _____ DENSITY _____ LB./GAL. API _____
 PROP. TYPE _____ SIZE _____ LB. _____
 ACID TYPE _____ GAL. _____ % _____
 SURFACTANT TYPE _____ GAL. _____ IN _____
 NE AGENT TYPE _____ GAL. _____ IN _____
 FLUID LOSS ADD. TYPE _____ GAL.-LB. _____ IN _____
 GELLING AGENT TYPE _____ GAL.-LB. _____ IN _____
 FRIC. RED. AGENT TYPE _____ GAL.-LB. _____ IN _____
 BREAKER TYPE _____ GAL.-LB. _____ IN _____
 BLOCKING AGENT TYPE _____ GAL.-LB. _____
 PERFPAC BALLS TYPE _____ QTY. _____
 OTHER 300 GAL SUPERFLUSH.

DEPARTMENT CEMENT - Bulk
 DESCRIPTION OF JOB 4 1/2" DV L.S.
 JOB DONE THRU: TUBING CASING ANNULUS TBC./ANN.
 CUSTOMER REPRESENTATIVE X J. C. Filer
 HALLIBURTON OPERATOR W.D. Berry COPIES REQUESTED _____

CEMENT DATA

STAGE	NUMBER OF SACKS	CEMENT	BRAND	BULK SACKED	ADDITIVES	YIELD CU.FT./SK.	MIXED LBS./GAL.
<u>1</u>	<u>140</u>	<u>EA 2</u>		<u>B</u>	<u>50% CAL-SEAL - 18% SACT, 4% H 372, 7% DAIR</u>	<u>1.36</u>	<u>15.5</u>
<u>2</u>	<u>235</u>	<u>HD</u>		<u>B</u>	<u>1/4" # FLO-23CE 1SK</u>	<u>3.62</u>	<u>10.68</u>

PRESSURES IN PSI

SUMMARY

VOLUMES

CIRCULATING _____ DISPLACEMENT _____ PRESLUSH: BBL.-GAL. 4 BBL 300 GAL TYPE SUPER FLUSH
 BREAKDOWN _____ MAXIMUM _____ LOAD & BKN: BBL.-GAL. 15 H₂O SPA. 2R PAD: BBL.-GAL. _____
 AVERAGE _____ FRACTURE GRADIENT _____ TREATMENT: BBL.-GAL. _____ DISPL: BBL.-GAL. 64 / 30
 SHUT-IN: INSTANT _____ 5-MIN. _____ 15-MIN. _____ CEMENT SLURRY: BBL.-GAL. 34 / 145
 HYDRAULIC HORSEPOWER _____ TOTAL VOLUME: BBL.-GAL. 270
 ORDERED _____ AVAILABLE _____ USED _____ REMARKS _____
 AVERAGE RATES IN BPM _____ STATE CORPORATION _____
 TREATING _____ DISPL. _____ OVERALL _____
 CEMENT LEFT IN PIPE _____ REASON S.T.
 FEET 15.86

RECEIVED

SEP 11 1989

CONSERVATION DIVISION
 Wichita, Kansas

CUSTOMER

CUSTOMER NAME: EXPLORATION
 LEASE: BOONE
 WELL NO.: 41
 JOB TYPE: 4 1/2" DV L.S.
 DATE: 7-30-89

JOB LOG

WELL NO. 1 LEASE KUDER TICKET NO. 1124138-
 CUSTOMER D.C.F. EXP. PAGE NO. 1 of 1
 JOB TYPE Prod CSG-2 STAGE DATE 7-30-89

FORM 2013 R-2

CHART NO.	TIME	RATE (BPM)	VOLUME (BBL) (GAL)	PUMPS		PRESSURE (PSI)		DESCRIPTION OF OPERATION AND MATERIALS
				T	C	TUBING	CASING	
7-30-89	1500							Called out Ready 2000HR
	2000							ON LOC. Rig 1/2 Note D.P.
	2130							CIRC & ST LAY DOWN
	2205							CASING ON HOLOCATION
	0050							RESUME LAYING DOWN DRILL PIPE
			7-31-89					DRILL PIPE LAYED DOWN - RIG UP TO
								RUN CSG.
	0215							START 4 1/2 CSG W/ INSERT FLT SHOE
								AND AUTO CILL ON BOTTOM OF 1ST ST.
								L.D. BAFFLE IN TOP OF 1ST, 5-4 CENT.
								ON 1, 4, 6, 8, 9, 11, 13, 54, CMT
								BASKETS ON BTM OF 10, 55, 70
								DV IN TOP OF 55 @ 1866.69
								DROP BALL 10 TTS OFF BOTTOM
	0425							BREAK CIRC W/RIG PUMP.
1		5	5					H2O SPACER
			12					300 GAL SUPERFLUSH (M)
			17					H2O SPACER
								MIX 140 SK EA-2 (34)
			51					FINISH CMT - WASH PUMP LINES
								DROP PLUG.
								ST. DISPL. W/ H2O
			115					1400 FINISH DISPL. W/MUD, PLUG LANDS
								RELEASE BACK - GOOD.
	0535							DROP OPENING DEVICE
								1600 OPEN DV. W/PT. - RIG CIRC.
2		4						MIX 285 SK HDL - PLUG RUNNER,
		5	145					FINISH CMT. RELEASE PLUG.
		6						100 ST. DISPL. - FRESH H2O
								500 LIFT.
	0700	6	175					2000 FINISH DISPL. (30) PLUG LANDS.
								RELEASE BACK - GOOD.
			290					1600 PRESSURE UP - GOOD - RELEASE
								JOB COMPLETE
								Thank you!
								Gary, Harold & Harold.