NEW MEXICO OIL CONSERVATION COMMISSION

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

Form C-122
Revised 9-1-65

Type Test: [x] Initial [ ] Annual [ ] Special		Test Date: 9-12-66	
Company: Gulf Oil Corporation	Connection: None		
Pool: Osudo	Formation: Morrow Gas		Unit
Completion Date: 8-30-66	Total Depth: 11658'	Plug Back TD: 11530'	Elevation: 3663' KB	Farm or Lease Name: No. Wilson Deep Unit

Csg. Size	Wt.	d	Set At	Perforations: From	To	Well No.
4 1/2	13.5	3.920	11596	11266	11510	3

Tbg. Size	Wt.	d	Set At	Perforations: From	To	Unit	Sec.	Twp.	Rge.
2 3/8	4.7	1.995	11225	Open	Ended	I	6	21	35

Type Well – Single – Bradenhead – G.G. or G.O. Multiple	Packer Set At	County
Single	11225	Lea

Producing Thru	Reservoir Temp. °F	Mean Annual Temp. °F	Baro. Press. – P_a	State
Tubing	156 @ 11164	–	13.2	New Mexico

L	H	Gg	% CO_2	% N_2	% H_2S	Prover	Meter Run	Taps
–	–	0.666	0.34	0.60	0.00	–	4.026	Flange

FLOW DATA / TUBING DATA / CASING DATA

NO.	Prover Line Size X Orifice Size	Press. p.s.i.g.	Diff. h_w	Temp. °F	Tubing Press. p.s.i.g.	Tubing Temp. °F	Casing Press. p.s.i.g.	Casing Temp. °F	Duration of Flow
SI					4760	72	PKR	–	69.0
1.	4 x 1.5 18/64	645	17.0	92	1117	79	–	–	1.0
2.	4 x 1.5 16/64	645	15.0	88	1322	79	–	–	1.0
3.	4 x 1.5 14/64	645	14.0	84	[illegible]	78	–	–	1.0
4.	4 x 1.5 12/64	645	12.0	82	[illegible]	78	–	–	1.0
5.									

RATE OF FLOW CALCULATIONS

NO.	Coefficient (24 Hour)	$\sqrt{h_w P_m}$	Pressure P_m	Flow Temp. Factor Ft.	Gravity Factor Fg	Super Compress. Factor, Fpv	Rate of Flow Q, Mcfd
1	10.84	105.78	658.2	0.97[illegible]	1.225	1.055	~~1473.6~~ [illegible]
2.	10.84	99.36	658.2	0.97[illegible]	1.225	1.056	1357.2
3.	10.84	96.00	658.2	0.977[illegible]	1.225	1.059	1319.8
4.	10.84	58.87	658.2	[illegible]	1.225	1.059	122[illegible].1
5.							

NO.	P_r	Temp. °R	T_r	Z
1	0.98	552	1.48	0.890
2	0.98	548	1.47	0.89[illegible]
3.	0.98	544	1.45	[illegible]
4.	0.98	542	1.45	[illegible]
5.				

Gas Liquid Hydrocarbon Ratio 13,411 Mcf/bbl.

A.P.I. Gravity of Liquid Hydrocarbons 52.2 Deg.

Specific Gravity Separator Gas 0.666 XXXXXXXXXX

Specific Gravity Flowing Fluid XXXXX

Critical Pressure [illegible] P.S.I.A. – P.S.I.A.

Critical Temperature [illegible] R – R

P_c 6675.2 P_c^2 44558.3*

NO	P_t^2	P_w	P_w^2 *	$P_c^2 - P_w^2$
1	–	2061.2	4248.5	[illegible]
2	–	2330.2	5429.[illegible]	391[illegible]
3	–	2744.2	7530.[illegible]	[illegible]
4	–	31[illegible].2	9955.[illegible]	[illegible]
5				

(1) $\frac{P_c^2}{P_c^2 - P_w^2}$ = 1.203

(2) $\left[\frac{P_c^2}{P_c^2 - P_w^2}\right]^n$ = 1.1736

AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2}\right]^n$ = 1548

Absolute Open Flow 1540 Mcfd @ 15.025 | Angle of Slope θ ______ | Slope, n 0.865

Remarks: * BHP @ (-7712) 11375'

Approved By Commission:	Conducted By:	Calculated By:	Checked By:
	Coleman Petro. Eng.	Joe A. Coleman	Joe A. Coleman

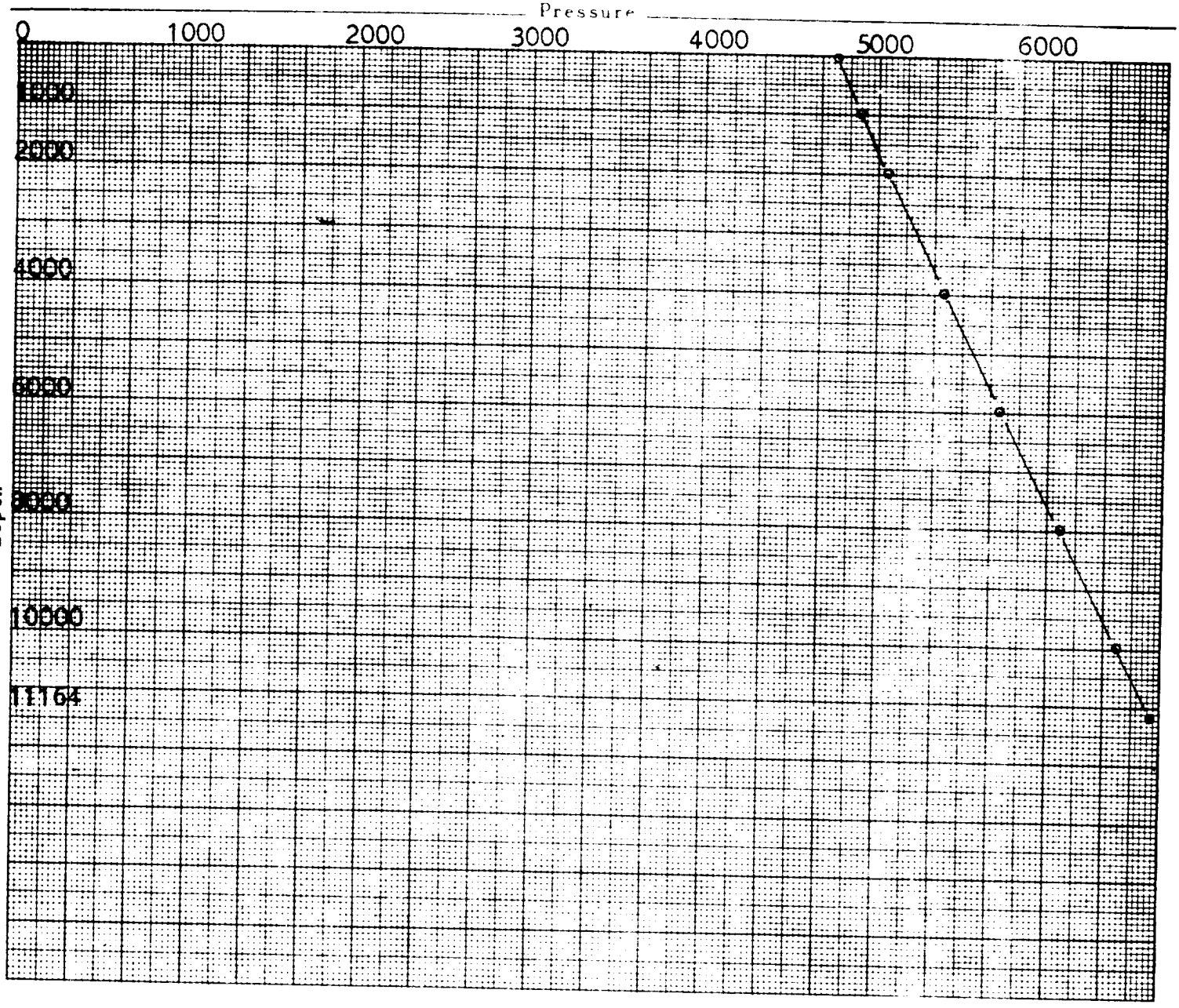
COLEMAN PETROLEUM ENGINEERING COMPANY
PHONE EXPRESS 3-3813
611 GRIMES
P. O. BOX 1829
HOBBS, NEW MEXICO

BOTTOM HOLE PRESSURE RECORD

OPERATOR Gulf Oil Corporation
FIELD Osuda FORMATION Morrow Gas
LEASE No. Wilson Deep Unit WELL No. 3
COUNTY Lea STATE New Mexico
DATE 9-12-66 TIME 6:30 AM
Status Shut In Test depth 11150'GL
Time S. I. 69.0 Hrs Last test date Initial
Tub Pres. 4760DWT BHP last test -
Cas. Pres. Pkr BHP change -
Elev. 3663'KB-14' Fluid top None
Datum (-7712) Water top -
Temp. @ 158°F Run by Allman
Cal. No. A3076N Chart No. 1

Depth	Pressure	Gradient
0	4760	-
1000	4892	.132
2000	5052	.160
4000	5390	.169
6000	5728	.169
8000	6073	.173
10000	6423	.175
11164	6625	.176
11375(-7712)	6662*	(.176)

* Extrapolated Pressure



COLEMAN PETROLEUM ENGINEERING COMPANY

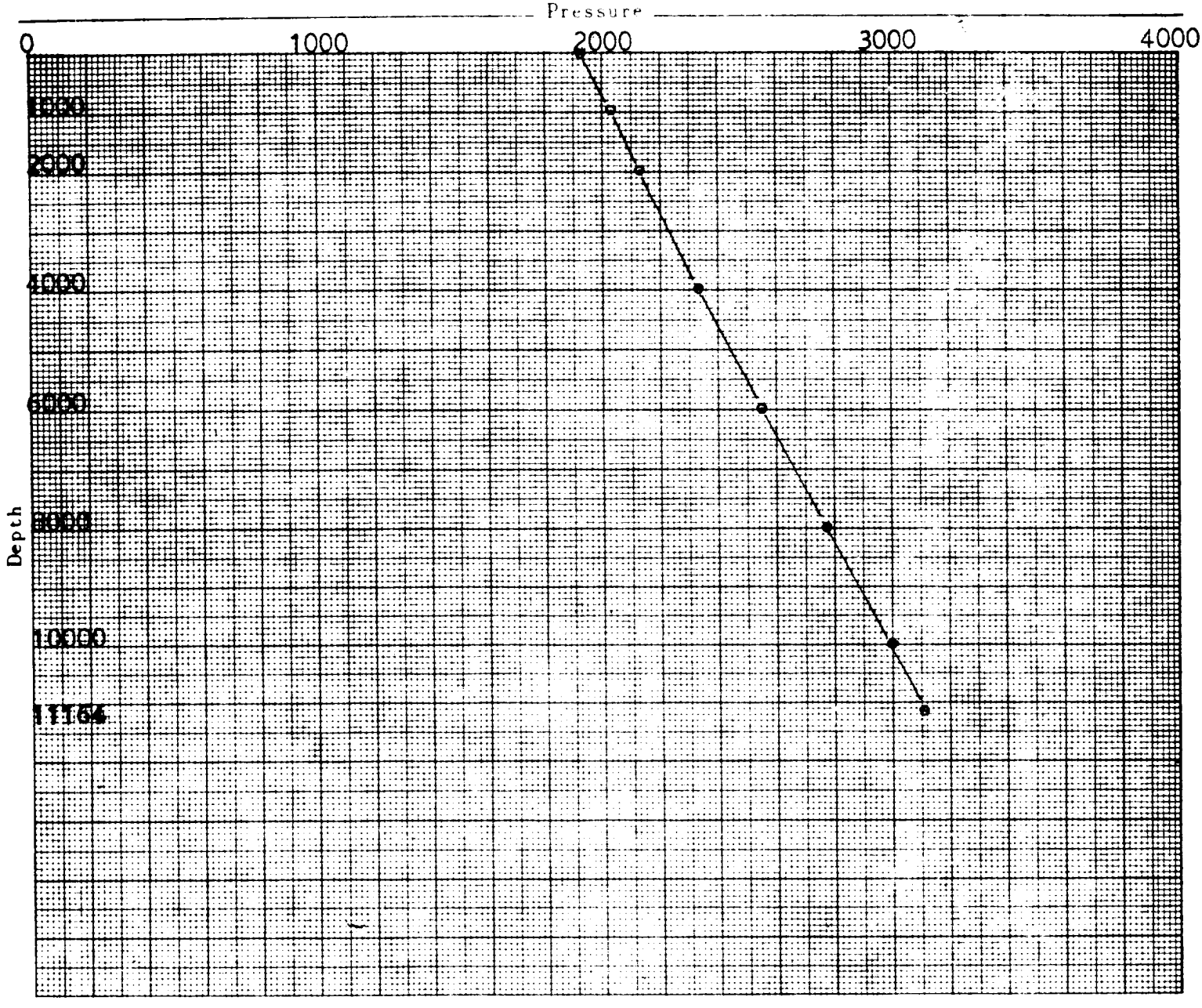
PHONE EXPRESS 3-3813
611 GRIMES
P O BOX 1829
HOBBS, NEW MEXICO

BOTTOM HOLE PRESSURE RECORD

OPERATOR GULF OIL CORPORATION
FIELD OSUDA FORMATION MORROW GAS
LEASE NO. WILSON DEEP UNIT WELL NO. 3
COUNTY LEA STATE NEW MEXICO
DATE 9-12-66 TIME 9:00 PM
Status FLOWING ON Test depth 11150'GL
~~XXXXX~~12/64"CH Last test date -
Tub Pres. 1937 BHP last test -
Cas. Pres. PKR BHP change -
Elev. 3663'KB-14' Fluid top SURFACE
Datum (-7712) Water top -
Temp. @ 158°F Run by ALLMAN
Cal. No. A3076N Chart No. 2

Depth	Pressure	Gradient
0	1937	-
1000	2038	.101
2000	2137	.099
4000	2346	.105
6000	2564	.109
8000	2786	.111
10000	3000	.107
11164	3120	.104
11375(-7712)	3142*	(.104)

* EXTRAPOLATED PRESSURE



PANY GULF OIL CORPORATION

NORTH WILSON DEEP UNIT, NO. 3

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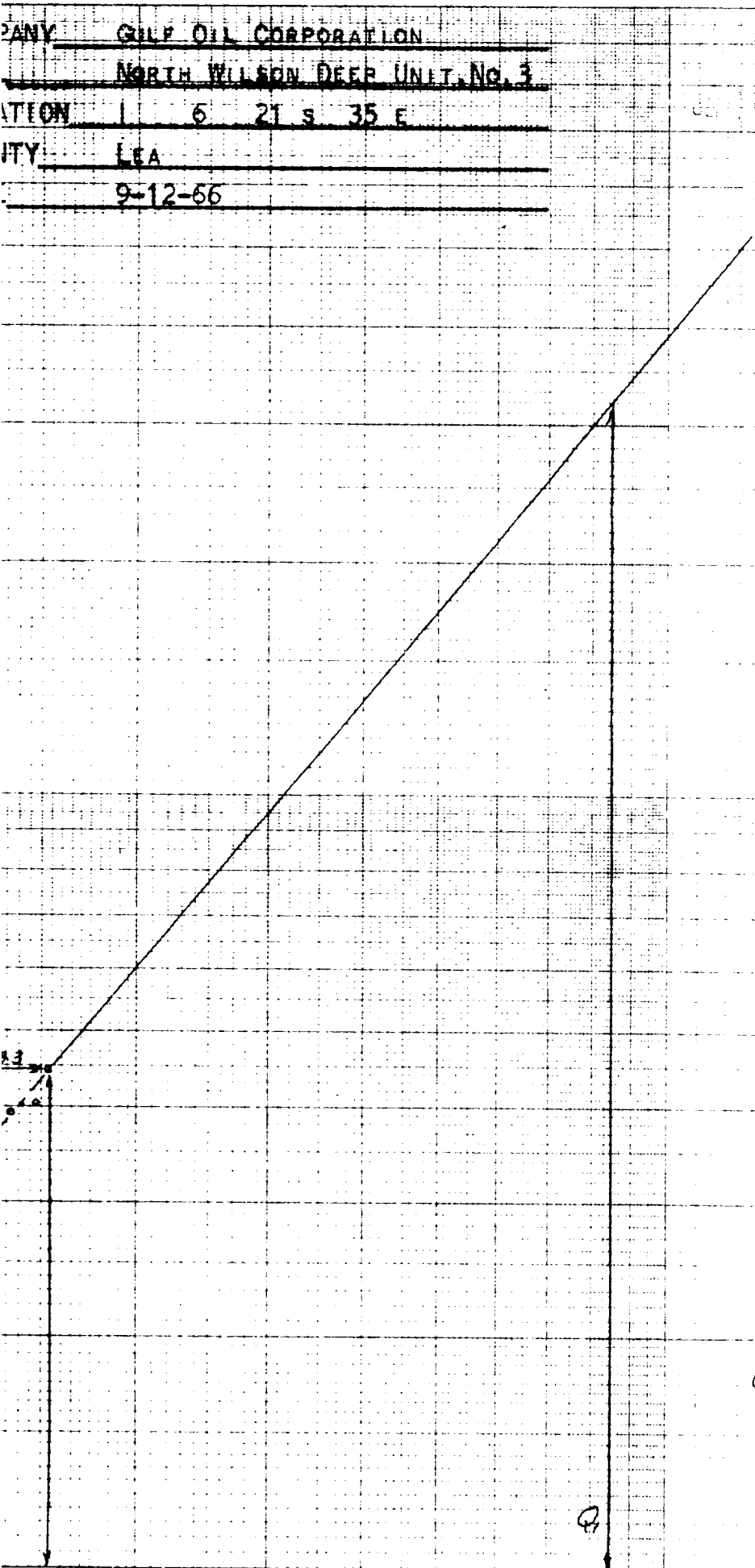
NTY LEA

9-12-66



ABSOLUTE OPEN FLOW = 1540

$Q_1 = 8450$ MCFD; LOG = 3.92686

$Q_2 = 1150$ MCFD; LOG = 3.06070

$n = 0.86616$

$= 0.866$