



NEW MEXICO ENERGY, MINERALS
& NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION
2040 South Pacheco Street
Santa Fe, New Mexico 87505
(505) 827-7131

June 9, 1998

Robert L. Bayless
P.O. Box 168
Farmington, New Mexico 87499-0168

Attn: Mr. Kevin McCord

**RE: Injection Pressure Increase,
SWD Well No.3 (formerly New Mexico Federal "N" No.5E),
San Juan County, New Mexico**

Dear Mr. McCord:

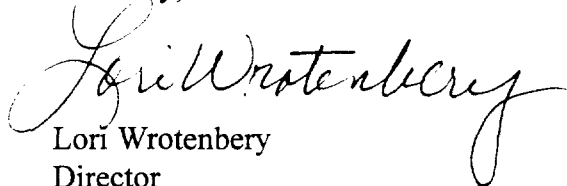
Reference is made to your request dated April 29, 1998 to increase the surface injection pressure on the above referenced well. This request is based on a step rate test conducted on April 23, 1998. The results of the test have been reviewed by my staff and we feel an increase in injection pressure on this well is justified at this time.

You are therefore authorized to increase the surface injection pressure on the following well:

<i>Well and Location</i>	<i>Maximum Surface Injection Pressure</i>
SWD Well No.3	940 PSIG
Located in Unit Letter 'P' of Section 7, Township 30 North, Range 12 West, NMPM, San Juan County, New Mexico.	

The Division Director may rescind this injection pressure increase if it becomes apparent that the injected water is not being confined to the injection zone or is endangering any fresh water aquifers.

Sincerely,


Lori Wrotenbery
Director

LW/BES/kv

cc: Oil Conservation Division - Aztec
Files: SWD-698; PSI-X 4th QTR98

ROBERT L. BAYLESS

P. O. BOX 168
FARMINGTON, NM 87499

FAX NO
(505) 326-6911

OFFICE NO
(505) 326-2659

June 25, 1998

RECEIVED
JUN 25 1998

Mr. Ben Stone
Oil Conservation Division
2040 Pacheco St.
Santa Fe, NM 87505

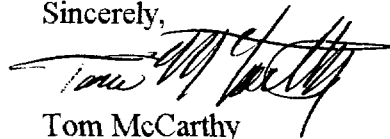
Re: Application for Authorization to Inject
SWD No. 3
SE SE, Section 7, T30N, R12W
San Juan County, NM

Dear Ben,

Please refer to our telephone conversation on June 16, 1998, when you gave us verbal approval to inject into the subject well. You requested that I send you workover reports from the Floyd operated New Mexico Federal N No. 3 when they became available. These reports are attached. They indicate good cement coverage over the Point Lookout injection zone was achieved by the cement squeeze.

If you have questions regarding this information please do not hesitate to call me.

Sincerely,



Tom McCarthy
Petroleum Engineer

Encl.

FLOYD OIL CO.

DAILY COMPLETION & WORKOVER REPORT				Lease & Well No NM Federal N-3		DATE 5-29-98	
Depth MD 6825		PSTD		Present Operations Pool w/ 2 7/8" Tbg		REPORT # 1	
Surf Csg Size 8 5/8		MD 356'		Contract Rig Triple P		Co. Rep Dale Hull	
Prod. Csg Size		MD		AFE No		Tool Pusher Billy	
Prod Liner Size		MD		TOP LINER		Daily Cost 3230	
Prod Tag Size 2 3/8		Wt 4.78		Grade T-55		Cum Cost 3230	
Size		T-55		Thread 8m EUE		Setting Depth 6547'	

PERFORATIONS Rising Dakota							
Perforations	From	To	Feetage	SPF	Total Load	Load Recovered	Load To Recover
	6564	6680					

OPERATIONS BREAKDOWN

MTBU, Triple P DD PU. / Rig up Pump Pit	
Kill well w/ pebbles 2 7/8 Kch. / Remove Tree &	
NU. 3 1/2" BOP.	
Prep To Pull Tbg	
SDON	
	Rig 1120
	Trucking 300
	Flow Tank 400
	Anchors 600
	Kch. 250
	Supv. 550
	Misc 510

Total 3230

Post-it® Fax Note 7671		Date 6/16	# of pages 10
To Tom McCarthy		From Greg Fox	
Co./Dept.		Co. Floyd Oil	
Phone #		Phone #	
Fax # 905/326-6911		Fax # 713-222-6418	

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PERFORATIONS Basin Dakota							
Perfs	From	To	Footage	S.P.F.	Total Load	Load Recovered	Load To Recover
	6564	- 1680					
	Squeeze Perfs						
	4505-06		6	4	130		

Ran 3 3/4" washover shoe / modified for Friction grab
Bore out. Drilling mud w/ show of gas.
Encased Fish @ 6580' washover & push Fish to 6680'
(Note: Fish Fell From 5769 To 6580' over night)
POOH To 6680' lost Fish
Attempted To cage Fish w/o success
POOH w/ 3 3/4" washover shoe
(Note: shoe indicated that we had 8" of Fish in shoe)
Ran 3 3/4" impression block no marks indicating Fish
SDON.

Rig	2453
Fish Tools	2500
Supp	550
Towing	450
Misc.	200
Total	6153

P. 07

10:00 00/00 00.

FROM

FLOYD OIL CO.

DAILY COMPLETION & WORKOVER REPORT				I Entered & Well No. NM Federal N3		DATE 6-3-98	
Depth 6875 PBD 6660 F.H				Present Operations Prep Squeeze Job		REPORT # 6	
Surf. Csg. 8 3/8 M.D.				Contract Rig Triple P Well Service		Co. Rep Dale Hull	
Size 4 1/2 M.D. 6875				A.P.E. No.		Tool pusher Billy Martin	
Prod. Csg.				TOP LINDER		Daily Cost \$365	
Size M.D.				LINDER		Curr. Cost 33,175	
Prod. Tbg.		WT. 4.78		Grade J-55		Thread API	
Size 3 3/8		4.78		J-55		API	
Setting Depth				Setting Depth			

PERFORATIONS <i>Basin Dakota</i>							
Part	From	To	Footage	S.P.F.	Total Lead	Lead Recovered	Lead To Recover
	6564	- 6680					
	Square Pegs						
	4505 - 46		1	4	± 40 mbk		

OPERATIONS BREAKDOWN

Ran 3 3/4" shoe To 6635' milled an Fish out approx 1 1/2'.
 PADD w/ shoe Recovered wireline barrel hole in center,
 indicating Fishing Neck
 Ran 3 3/4" overshot w/ 1 7/16" grapple & caught Fish @ 6635'
 Towed on Fish one Time @ 30 m³ over to me Fore
 PADD & recovered Per/Gun
 Prep for squeeze job
 SDON

Rig	2450
Fishing Tools	1290
Supp	550
Truck	325
Misc	150
Total	5365

WDM

FLOYD OIL CO.

DAILY COMPLETION & WORKOVER REPORT				Lease & Well No.		DATE	
Depth				N M Federal N 3		6-4-98	
M.D. 6825 P.B.T.O. 6660 E.N.				Present Operations		REPORT #	
Start Csg.				Prep To Drillout		2	
Size 8 5/8 M.D. 356'				Connect Rod		Co. Rep	
Prod. Csg.				Triple P Well Service		Dale Hull	
Size 4 1/2 M.D. 6825				A.F.E. No.		Tool pusher	
Prod. Liner				TOP		Bully Hunter	
Size M.D.				LINER		Cum. Cost	
Prod. Tbg.				WE		13607	
Size 3 7/8 4 1/2 E				Grade		46,622	
Size 3 7/8 4 1/2 E				Thread		Setting Depth	
Size 3 7/8 4 1/2 E				8-DEUTE			

PERFORATIONS <i>Bugis Dakota</i>						
Parts	From	To	Footage	S.P.F.	Total Load	Load Recovered / Load To Recover
	6564	6680				
	SQUEEZE PERFS.					
	4575-06		1	11	34062	

OPERATIONS BREAKDOWN

OPERATIONS BREAKDOWN

Ran $4\frac{1}{2}$ " Straddle Assembly on $23\frac{1}{8}$ " Tbg
Set $4\frac{1}{2}$ " RBP 6048' Test To 1000 psi OK.
Pulled $4\frac{1}{2}$ " PRR To 4574' / Set /
Test $4\frac{1}{2}$ " Csg 4574' - 6048' 1000 psi OK.
Released PRR & retrieved BP. / reset @ 4574'
Tested $4\frac{1}{2}$ " RBP To 1000 psi OK. / Spotted 35x
Sand on BP / TOS @ 4550'
Pulled $4\frac{1}{2}$ " PRR To 4170' / Set / Tested $2\frac{3}{8}$ " x $4\frac{1}{2}$ "
ann. To 1000 psi OK.
Est Rate thru squeeze Perfs 4605 - OK @
900 psi $2\frac{1}{2}$ bpm.
Squeeze $4\frac{1}{2}$ " x $2\frac{3}{8}$ " ann. w/ 1250 sx Class 'B'
w/ 13% H. 344 & 3% cc. @ 15 b PPg. @ Rate $2\frac{1}{2}$
To 14 bpm. / Displaced w/ 16.5 bbl.
Staged Displacement in $\frac{1}{4}$ bbl increments

Released Pressure no Flow back	
Released PKR @ 4170' & Reversed 330" Thgalean	
Reset PKR & Pressured To 100 psi	
ETOC 4330'	Rig 3300
SDON	PKR 1850
Prep To Drill out This AM.	Comest 8200
	Supv. 550
	Misc 200
	Total 13500

P.05

00:00 00/00 00'

FROM

Well Name: New Mexico Federal N No. 2E
Operator: Floyd Operating Company
Spot: 1110' Int & 850' Int
Sec.-T-R: 17 - 30N - 12W
Type: Dakota gas well.
Spud Date: 6/22/80
Completion Date: 9/14/80
Total Depth: 6860'
Surface Casing: 8 5/8" 24# K-55.
Set at: 363' in a 12 1/2" hole.
Cement: 250 sx. Class A. Circulated cement to surface.
Production Casing: 4 1/2" 9.5# with a DV tool at 3969'.
Set at: 6818' in a 7 7/8" hole.
Cement: 1st stage: 700 sx Howco light. Tail in with 100 sx. Class A.
2nd stage: 1800 sx 50:50 poz. Circulated cement to surface.
Perforations: 6636-42, 6600-20, 6548-54'. Frac with 57,500 gallons.
Potential: 988 MCFD & 8 BOPD.

Before

Well Name: New Mexico Federal N No. 3
Operator: Floyd Operating Company
Spot: 1190' Int & 1190' Int
Sec.-T-R: 18 - 30N - 12W
Type: Dakota gas well.
Spud Date: 4/15/60
Completion Date: 5/5/60
Total Depth: 6874'
Surface Casing: 8 5/8" 24# J-55
Set at: 356' in a 12 1/4" hole.
Cement: 325 sx neat with 2% CaCL₂. Circulated 40 sx.
Production Casing: 4 1/2" 9.5 & 11.6#
Set at: 6875' in a 7 7/8" hole.
Cement: 325 sx 50:50 poz 12 1/2# gilsonite/sx.
Top of cement at 5300' per temperature survey.
Perforations: 6564-72, 6578-82, 6600-06, 6624-30, 6642-56, 6674-80', 2 SPF.
Fraced with 80,000 gallons and 80,000# sand.
Potential: 2786 MCFD.

* Data taken from available sundry notices and completion reports filed with the state. Cement tops recorded therein were not confirmed using logs.

AFTER

DAILY COMPLETION & WORKOVER REPORT				Lease & Well No.		DATE	
Depth MD. 6875				NM Federal N3		7-6-98	
Surf. Csg. 8 7/8				Product Operations		REPORT # 9	
Prod. Csg. 4 1/4				Contract Rig		Co. Rep. Dale Hull	
Size MD. 6875				AFE No.		Tool pusher Billy Mauser	
Prod. Liner				TOP		Daily Cost	
Size MD				LINER		6810	
Prod. Tbg. 2 3/8				Thread		Swabbing Depth	
Size 4.7				Grade J-55		56.826	

PERFORATIONS Basin Dakota

Perforations	From	To	Footage	SPF	Total Load	Load Recovered	Load To Recover
	6564'	6680'					
Squeeze Pack							
4505-06			1	4	260 lbs		260 lbs

OPERATIONS BREAKDOWN

POOH w 3 3/4" bit & 4 1/2" csg scraper

Run Halliburton wk / Ran Band Log 4574' - 3400'

NOTE: Log showed 100% band across Lookout Point sand & cement top of 3660-70'

Pressure Test 4 1/2 csg & squeeze 1000 ps 30 min. OK.

RD wk & Ran retrieving head on 3 3/8" Tbg & Retrieved 4 1/2" RBP @ 4574'

Ran 2 3/8" notched collar & seat nipple on 2 3/8" Tbg

Clean out fill 6660'-6680'

SDON

Prep To Finish cleanout & swab in well This AM.

Rig	1760
Loggins	2152
PKB Plug	1615
Supv	550
Misc.	200
Truck King	533
Total	6810

FLOYD OIL CO.

DAILY COMPLETION & WORKOVER REPORT				Lease & Well No. N.M. Federal N3		DATE 6-7-98	
Depth MD 6875		PSTU 6803'		Present Operations Increase To Prod.		REPORT # 10	
Curt Csg 3 1/2" 85/8		MD. 356'		Contract Rig Triple P Well Service		Co Rep Dale Hull	
Prod. Csg. Size 4 1/2		MD. 6875		AFE No.		Tool pusher Billy Moxter	
Prod. Liner Size MD		TOP LNER		Daily Cost 316.00		Cura Cost 60.036	
Prod. Tbg. Size 2 3/8		WT 4.7		Grade J-66		Thread 80 EUE	
Sew				Warr		Setting Depth	

PERFORATIONS Basia Dakota

Perfs	From	To	Footage	S.P.F.	Total Lead	Lead Recovered	Lead To Recover
	6564	6680					
	Squeeze Perfs						
	6565-66		1	4	2900	140	100 hrs

OPERATIONS BREAKDOWN

R. U. Swivel & clean out 4 1/2" csg To 6803'	
recovered sand, shale, mud & pieces of well.	
Clear Clean	
Pull 2 3/8" Tbg To 6545' N.A. BOP & install x-mast	
Land 806 Tbg 6545' 2 3/8" 4.7" J-55 80 EUE Tbg	
@ 6555'	
Swab 140 bu in 11 hrs. FI @ 3200'	
Started swab small pieces of well.	
SD 1 Prep To move out Rig	
Man.	
	Rig 1900
	Tooling 360
	Suppl. 550
	Misc. 350
Tubing Detail	Total 3160
1 pc 2 3/8" Sealup & well matched collar	1.53
806 Tbg 2 3/8" 4.7" J-55 80 EUE Tbg	6544'
	Total 6595.53
	BKDB 10.0
	FHD 6555.53