Form 3160-5 (August 1999)

# **UNITED STATES**

FORM APPROVED

	RIMENT OF THE INTER EAU OF LAND MANAGEME		4	· •	. 1004-0135 ember 20, 2000		
SUNDRY NO Do not use this fo	Expires: November 30, 2000  5. Lease Serial No. NM - 013686						
abandoned well. U	6. If Indian, Allottee or Tribe Name						
SUBMIT IN TRIPLIC	7. If Unit or CA/Agreement Name and/or No.						
1. Type of Well Oil Well Gas Well Other INJEC				8. Well Name and No.			
Name of Operator     AMOCO PRODUCTION COMPANY				9. API Well No.			
3a. Address P.O. BOX 3092 HOUSTON, TX 770	3b. Phone No.(include area code) 281.366.4491		10. Field and Pool, or Exploratory Area				
4. Location of Well (Footage, Sec., T., R., M., or Survey Description)  1840FWL 615FNL (-34-31-9)				MORRISON BLUFF ENTRADA  11. County or Parish, and State			
1840FWL 615FNL		SAN JUAN NM					
12. CHECK APPROPRIATE BOX(ES) TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA							
TYPE OF SUBMISSION		TY	PE OF ACTION				
Notice of Intent  Subsequent Report Final Abandonment Notice	Acidize  Alter Casing  Casing Repair  Change Plans  Convert to Injection	Deepen Fracture Tre New Constru Plug and Ab Plug Back	Reclaration Reco	water Shut-Off mation mplete overarily Abandon r Disposal  Water Shut-Off Well Integrity Other			
13. Describe Proposed or Completed Operation (clearly state all pertinent details, including estimated starting date of any proposed work and approximate duration thereof. If the proposal is to deepen directionally or recomplete horizontally, give subsurface locations and measured and true vertical depths of all pertinent markers and zones. Attach the Bond under which the work will be performed or provide the Bond No. on file with BLM/BIA. Required subsequent reports shall be files within 30 days following completion of the involved operations. If the operation results in a multiple completion or recompletion in a new interval, a Form 3160-4 shall be filed once testing has been completed. Final Abandonment Notices shall be filed only after all requirements, including reclamation, have been completed, and the operator has determined that the site is ready for final inspection.)  Amoco Production Company respectively submits the attached step rate test procedure and supporting documents for the subject well for your review and approval. Results of this step rate test will be used to support a request to increase the maximum allowable surface injection pressure on this well. We would like to perform this step rate test as early in December as possible.							
Electronic Submission #2117 verified by Committed to AFMSS for processing			DUCTION COMPA	NY Sent to the Farmingt	on Field Office		
Name (Printed/Typed) MAR	Y CORLEY	Title	SUBM	IITTING CONTACT			
Signature		Date	12/06/	2000			
THIS SPACE FOR FEDERAL OR STATE OFFICE USE							
Approved By			le		) 2/6/00 Date		

Office

Conditions of approval, if any, are attached. Approval of this notice does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease

which would entitle the applicant to conduct operations thereon.

## Pritchard SWD #1 - Step Ratões

#### Entrada Formation

### Step Rate Test Procedure

Prior to performing the step rate test the building setting over the wellhead must be removed by a roustabout crew. Ensure that water storage tanks are completely full before initiating the step rate test. Water storage capacity on location is 2000 BBLS. Available capacity for test is 1000 BBLS. Must contact NMOCD prior to the step rate test so that they can have a representative witness the test.

- 1. Shut-in well for 24 hours prior to running step rate test.
- 2 Rig up wireline unit and lubricator. Trip in the hole with tandem pressure bombs capable of measuring pressure from 0 psig to 10,000 psig. Land bombs in 2.25" ID F seating nipple at approximately 8311' (KB+18'). Note the exact time the gauge was set. In the seating nipple.
  - \* The gauge should allow water to pass by
  - \* Program bombs to take readings every 5 seconds throughout the test
- 3. Rig up pump trucks (if required provide second pump truck to span range of injection rates for step rate test). The suction to disposal tanks and discharge to tubing. Pressure test lines and connections. Monitor casing and bradenhead pressures during the test.
- 4. Perform step rate test as foliows:

Sier	Tiffic	Injection Rete		Cum. Inj. Vol.	
		(BPW)	(BWPD)	8W	
Ĭ.	20 min	040	576	8	
2	20 min	0.80	1162	16	
3	20 min	1,20	1728	24	
4	20 min	1,60	2304	32	
5	20 min	2,00	2880	40	
6	20 min	2,40	3456	48	
7	20 min	3,80	4032	56	
8	20 min	3,20	4608	64	
9	20 min	3.60	5184	72	
10	20 min	4.00	5760	80	
11	20 min	4,40	6336	88	
12	20 min	4,80	6912	96	
13	20 min	5.20	7448	104	
14	20 min	5.60	8064	112	
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Total = 280 min or 4.7 hrs

Total = 842 BBL5

## Note: 1. Well disposal rates = 700 to 1200 BWPD

- 2. E. E. Elliott SWD #2 5/5/00 results. frac @ 600 BWPD & 1740 psi
  - Continuously monitor surface injection pressure and rate in a digital format. Use a computer van an equivalent if necessary.
  - The time step intervals are critical. Inconsistencies such as shorter or langer time steps are unacceptable.
  - Once an injection rate has been established at or near the requested rate every affort must be made to keep the rate constant
- 5. Shut down and record ISIP.
- 6. After performing the step rate test, trip out of the hole with pressure acuses.
- 7. Perform Mechanical Integrity Test following NMOCD guidelines (if required).
- 8. Return well to injection.