

DRILLING SCHEDULE - SCHWERDTFEGER #1R

Location: 1450' FSL & 990' FWL, Section 8, T27N, R11W, San Juan County, New Mexico

Field: West Kutz Pictured Cliffs

Elevation: 6139' GR

Geology:

Formation Tops:	Ojo Alamo	832'
	Fruitland	1538'
	Pictured Cliffs	1864'
	Total depth	2044'

Logging Program: IES & GR-Density at total depth

Coring Program: None

Natural Gauges: None

Drilling:

Contractor: Aztec Well Service (rig #50) Tool Pusher: Bob Young

SRC Representative: Max Larson SRC Answering Service: 325-1841

Mud Program: Fresh water mud from surface to total depth.

Materials:

Casing Program:	Hole Size	Depth	Casing Size	Wt. & Grade
	12-1/4"	120'	8-5/8"	24# K-55
	6-3/4"	2044'	2-7/8"	6.5# J-55, EUE

Float Equipment

8-5/8" surface casing: Pathfinder Econoline Guide Shoe

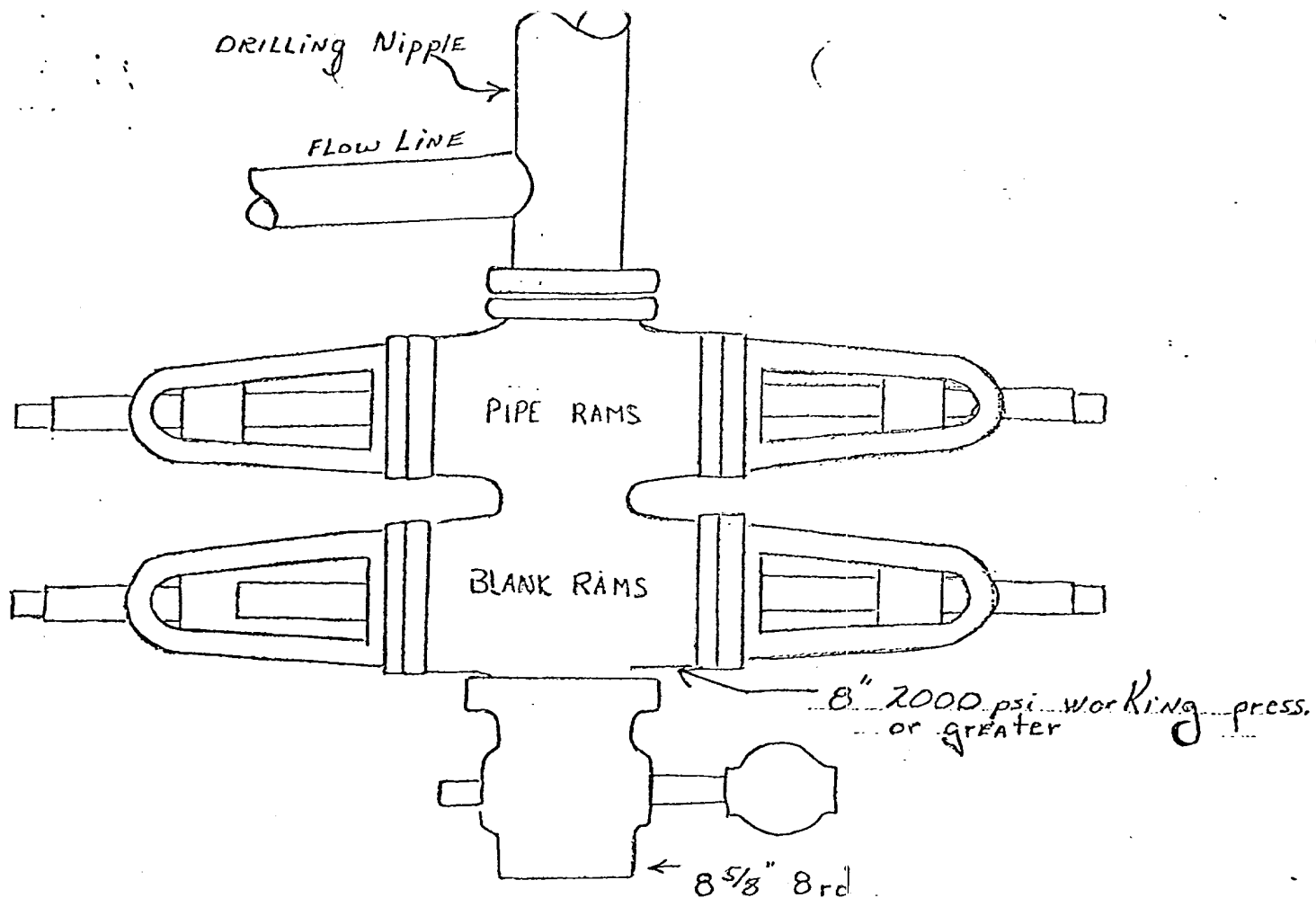
2-7/8" production casing: Notched collar guide shoe, Howco 2-7/8" Latch down baffle (Pr. ref. 60). Two 3-1/16" rubber balls and 1 2-7/8" Howco Omega plug (Pr. ref. 59). Use 3-1/4" ID plug container head. Run one B & W stabilizer each on bottom 6 jts.

Wellhead Equipment: 8-5/8" X 2-7/8" screwed head

Cementing:

8-5/8" surface casing: 85 sxs Class B with 1/4# gel flake per sx and 3% CaCl₂ WOC 12 hrs. Test to 600# prior to drilling out.

2-7/8" production casing: 210 sxs 50/50 Class B Poz with 6% gel mixed with 7.2 gals water per sx followed by 50 sxs Class B with 2% CaCl₂. (370 cu. ft.) Run temp. survey 12 hrs after plug down. Bump plug with 50 gals 7-1/2% MSA.



Preventers and spools are to have
 through bore of 8" - 2000# or larger.



Southland Royalty Company

July 17, 1978

United States Geological Survey
P. O. Box 959
Farmington, New Mexico

Attention: Mr. P. T. McGrath

Re: Blowout Preventer Plan

Dear Sir:

All drilling and completion rigs will be equipped with 8" or larger double gate hydraulic blowout preventers and a hydraulic operated closing unit with steel lines.

The preventer is 3000# working pressure and 6000# test.

All crews will be thoroughly trained in the operation of this preventer. The preventer will be tested frequently enough to insure proper operation.

Yours truly,

L. O. Van Ryan
District Production Manager

LOVR/dg



Southland Royalty Company

July 17, 1978

United States Geological Survey
P. O. Box 959
Farmington, New Mexico

Attention: Mr. P. T. McGrath

Dear Sir:

Enclosed please find map showing existing roads and planned access roads to Southland Royalty Company's Schwerdtfeger #1R well. The locations of tank batteries and flow lines will be on location with well. A burn pit will be provided for disposal of trash. Cuttings, drilling fluid and produced fluids will be put into the reserve pit and properly disposed of depending on amount and type of fluids.

Contractor will furnish restroom facilities on location.

There will be no air strips or camps.

Also, enclosed is a location layout showing approximate location of rig, pits and pipe racks and cut required to build this location.

Water supply will be the San Juan River. All water will be transported by truck and stored on location.

The location will be restored according to Bureau of Land Management standards. This work will begin when all related construction is finished.

Mr. Max Larson will be Southland Royalty Company's field representative supervising these operations.

Yours truly,

L. O. Van Ryan
District Production Manager

IOVR/dg



Southland Royalty Company

United States Geological Survey
P. O. Box 959
Farmington, New Mexico 87401

Attention: Mr. P. T. McGrath

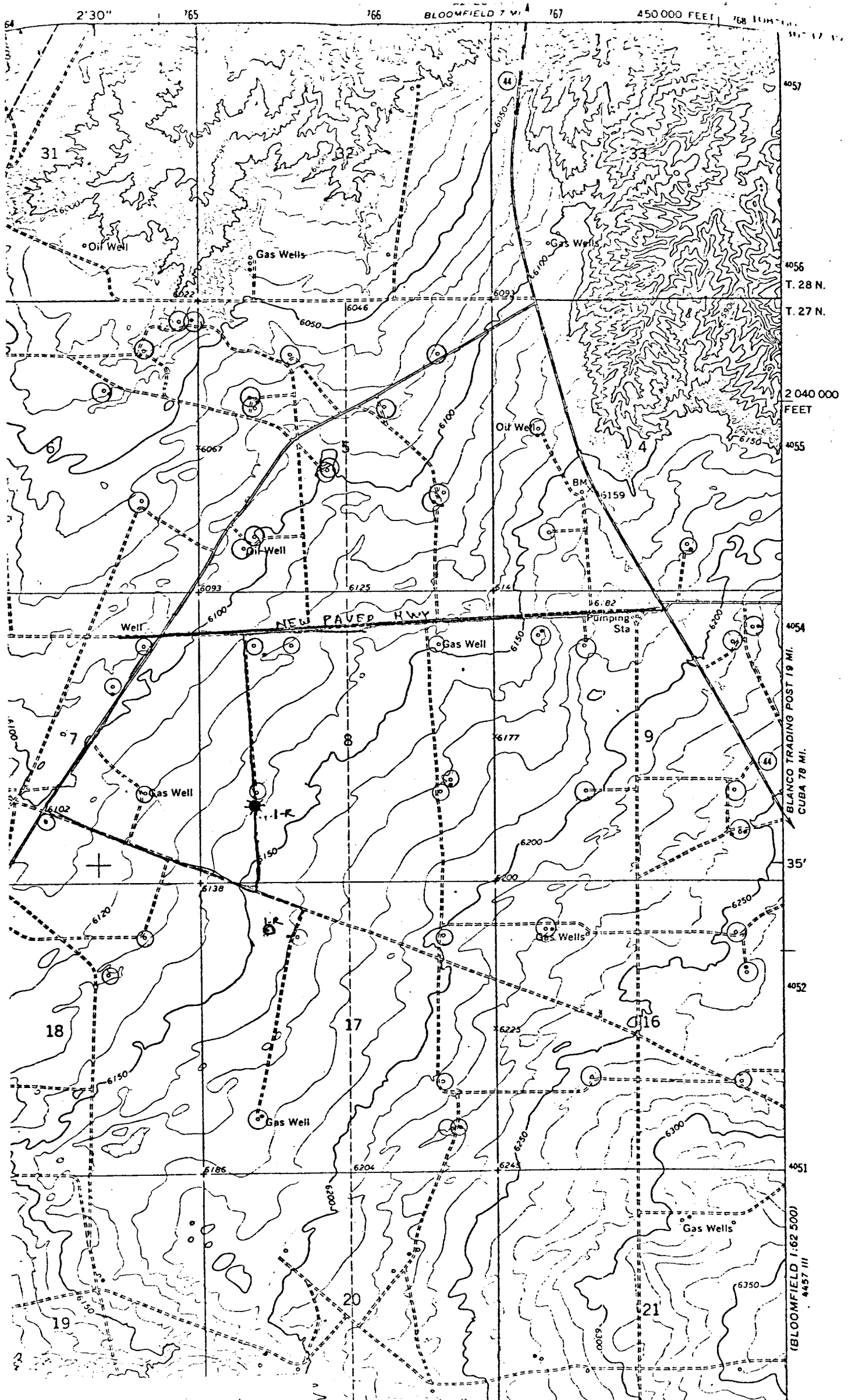
Dear Sir:





I hereby certify that I, or persons under my direct supervision, have inspected the proposed drillsite and access route; that I am familiar with the conditions which presently exist; that the statements made in this plan are, to the best of my knowledge, true and correct; and, that the work associated with the operations proposed herein be performed by Southland Royalty Company and its contractors and subcontractors in conformity with this plan and the terms and conditions under which it is approved.

Date: July 17, 1978

Name: C. C. Pearson

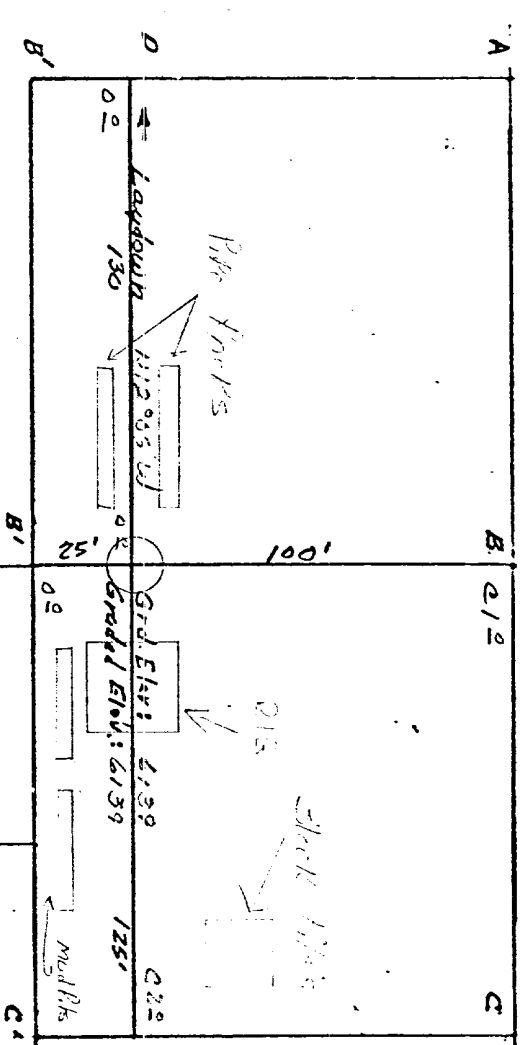
Title: District Engineer



PROPOSED LOCATION 
 EXISTING LOCATIONS 
 PROPOSED ROADS 
 EXISTING ROADS 

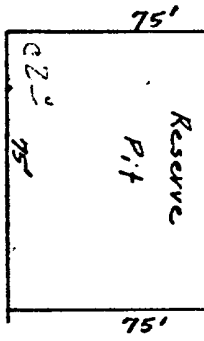
Vicinity Map for
 SOUTHLAND ROYALTY CO. #1-R SCHWERTDFEGER
 1450' FSL 990' FWL. Sec 8-T27N-R11W
 SAN JUAN COUNTY. NEW MEXICO

Location Profile for
 SOUTHLAND ROYALTY CO. #1-R SCHWENDEFEGER
 1150' FSL 990' FWL Sec 8-T27N-R11W, SAN JUAN COUNTY, NEW MEXICO



SCALE: 1" = 50'

Vert: 1"=40'	A-A'	Horiz: 1"=100'



Vert: 1"=40'	B-B'	Horiz: 1"=100'

Vert: 1"=40'	C-C'	Horiz: 1"=100'

Vert: 1"=40'	D-D'	Horiz: 1"=100'