Pacific Oil & Gas Pty Limited

WELL: **Chanin 1**
CRAE No. RD93MB25

Status: Plugged and abandoned

Hole Size: 12¼" to 60.8m
8½" to 309.0m
6" to 1411m (TD)

Casing & Tubing Details:
13⅜" Surface Conductor to 8.8m
9⅝" Deep Conductor to 59.0m
7" Casing to 294.45m

Perforations: Nil

Plugs: Plug No. 1 1358-1298m (Class "A" cement)
Plug No. 2 252-324m (Class "A" cement)
Surface Plug 45m to cellar floor

Operator: Pacific Oil & Gas Pty. Limited

Participants: Pacific Oil & Gas Pty. Limited 90%
Omega Oil N.L. 10%

Tenement: EP18

Seismic Location: Line MD92-255; SP860

Location: Lat: 16°14'11.6" South
Long: 133°44'47.8" East
AMG: Zone 53, 366048E, 8204483N

Basin: Beetaloo Sub-Basin, McArthur Basin
Elevation: 244.9m AHD (KB), 240m AHD (GL)
Spudded: 0030hrs 26 June 1993
Rig Released: 0900hrs 20 July 1993
Rig: Rig 22
Drilling Contractor: Rockdril Contractors

STRATIGRAPHY: *(NB: Non-Contributory Interest)

AGE	UNIT AND SUB-UNIT	MBDF (Logger)	Metres AHD (Logger)	Thickness (m)
Cretaceous	Mullaman beds	Surface (4.9)	240.0	71.6
Cambrian	Tindall Limestone	76.5	168.4	105.8
	Antrim Plateau Volcanics	182.3	62.6	440.1
Proterozoic	"Hayfield Mudstone"	622.4	-377.5	252.6
	"Jamison Sandstone"	875.0	-630.1	73.4
	McMinn Formation			
	- Kyalla Member	948.4	-703.5	379.6
	- Moroak Sandstone Member	1328.0	-1083.1	83.0+
Total Depth (Driller) (m)		1411.0	-1166.1	
Total Depth (Logger (m)		1411.0	-1166.1	

FORMATION TESTS: Nil CHOKE:

TEST	TIMES (min)				PRESSURES (psi)								RESULT
	PF	FSI	F	SSI	IHH	IPP	FPP	BP	IFP	FFP	FBP	FHH	

PF :	Preflow Period	IHH :	Initial Hydrostatic Head	IFP :	Initial Flow Pressure
FSI :	First Sheet In	IPP :	Initial Preflow Pressure	FFP :	Final Flow Pressure
F :	Flow Period	FPP :	Final Preflow Pressure	FBP :	Final Build Up Pressure
SSI :	Second Sheet In	BP :	Build Up Pressure	FHH :	Hydrostatic Head

LOGS: CORES: Nil

TYPE LOG	RUN NO	INTERVAL (m)	DATE	NO	INTERVAL (m)	RECOVERY	NO	INTERVAL (m)	RECOVERY
DLL-MSFL-AS	1	294.45-1411	17/7/93						
GR-CAL		GR to surface							
LDL-CNL-GR	2	294.45-1411	17/7/93						
DIL	3	294.45-1411	17/7;93						
WST	4	1328.0-44.9	17/7/93						

Chemical Analysis (water, oil, gas)

A sample of formation water 2956459 lifted by Air from the top of the Moroak Sandstone Member was submitted for standard water analysis (DPO No. 77758).

A sample of cuttings 2956449, recovered from the basal "Jamison Sandstone" which possessed weak fluorescence, was submitted for liquid chromatographic separation of extracted organic matter and gas chromatography of the saturate fraction (DPO77768)

Summary & Conclusions:

Chanin 1 was designed to test a seismically-inferred structural closure approximately 60km north of **Jamison 1**. The very poor hydrocarbon shows encountered in the well suggests that the structure may have developed after hydrocarbon generation and migration.

The Mullaman beds, from surface to 76.5m proved difficult to drill. The intention was to have the weathered claystones of this formation behind a surface conductor before drilling ahead into the underlying Tindall Limestone. The depth of the Tindall Limestone (and thus the depth at which to set the conductor) was determined from lost circulation zones encountered in the water bore drilling. This depth proved inadequate, as 17.5m of weathered claystone was open to the borehole whilst drilling the Tindall Limestone and top of the Antrim Plateau Volcanics, severely contaminating the samples of these formations and causing drilling difficulties.

Erroneous seismic interpretation (which was revised soon after spud) placed the prognosed top and base of the Antrim Plateau Volcanics lower than intersected in the well. The revised seismic depth prognosis was accurate.

Air and mist/foam drilling proved very successful with regard to ROP, bit life, and reducing well costs in general, but as a trade off sample quantity was at times low, and quality was generally poor. Detailed show description was impossible with the samples generated by air drilling. Lithological identification was however, quite good once the logger became accustomed to the samples. Lithological identification and show evaluation during air mist/foam drilling was significantly improved from purely air drilling.

The depth prognosis from seismic to the top of both the "Jamison Sandstone" and the Moroak Sandstone Member came in within several metres. This accuracy gives a great deal of confidence in the validity of the structure. It does not, however confirm the integrity of the interpreted four way dip closure, or suggest a structural reason for the lack of hydrocarbons.

Chanin 1 successfully tested all of the proposed targets; the "Jamison Sandstone", Moroak Sandstone Member, the sands within the lower "Hayfield Mudstone" and the Kyalla Member, in what is believed to be the first test of a four-way dip closure in the Beetaloo Sub-basin. The lack of hydrocarbons is a serious concern and at the time of writing this report, it was considered that the timing of structure development may have been too late at Chanin for the feature to have received and trapped migrating hydrocarbons.

Bottom Hole Temperature = 77.7°C

WELLSITE GEOLOGIST:	CARD PREPARED BY:	APPROVED BY:	DATE:
Shane Hibbird Sandy Menpes John Torkington	Shane Hibbird		29/7/93