

321001

TPR
RS3/86
OR-324



Tilana-1 DST Analysis

March, 1986

TPR
OR-324

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321005

TILANA NO. 1
DST ANALYSIS

March 13, 1986

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Petroleum Engineer S.G.

INTRODUCTION

The Tilana-1 was drillstem tested in three intervals between November 7, 1985 and November 22, 1985. Based on two drillstem tests, the well has limited productivity. This report documents the results of the drillstem tests, analyzes the well data and recommends procedures to streamline and prevent loss time on similar drillstem tests performed in the future.

SUMMARY

The Tilana-1 was spud on September 5, 1985 and completed as a plug and abandoned well on November 25, 1985. After the well reached a total depth of 12,796 ft (3900 meters) 9-5/8" casing was set to 10,865 feet (3312 meters). The well was plugged back to 10,618 feet (3236 meters) to conduct two drillstem tests. Flow to surface was not achieved during either test.

The flow test and pressure data obtained were compared with core and log data. The data indicates the presence of hydrocarbons with limited capability to flow in the zones tested.

CONCLUSIONS

1. The pressure gradient for the zones tested is .458 psi/ft or 8.81 lb/gal.
2. Based on production tests, current log analysis is not conclusive in defining net pay.
3. The zones tested indicate the presence of hydrocarbons with limited capability to flow.
4. The determination of reservoir parameters of Kh, skin, boundaries and changes of these parameters within the radius of investigation of the tests is not possible due to the lack of flow during all drillstem tests.
5. Determination of R_w and the fluid composition of the reservoir is not possible due to the lack of representative reservoir fluid samples.

DISCUSSION

GENERAL

The Tilana-1 well is located offshore in the Bass Strait approximately 90 miles north of Burnie, Tasmania (Attachment 1). The well was spudded on September 5, 1985 on exploration permit T/14P in 270 feet (82 meters) of water (Attachment 2). After the well reached a total depth of 12,796 ft (3900 meters) 9-5/8" casing was set to 10,865 feet (3312 meters). The well was plugged back to 10,618 feet (3236 meters) to conduct two drillstem tests. Attachment 3 is a drilling time curve for the Tilana-1. Amoco is the operator with a 50% working interest in the well.

Tilana-1 was the second well drilled on exploration permit T/14P. Its primary objective was to evaluate the Eocene portion of the Eastern View Coal Measures (EVCN). Yolla-1, the first well drilled on permit T/14P, encountered significant quantities of hydrocarbons in the upper EVCN.

The Eocene portion of the Eastern View Coal Measures was encountered higher than predicted, but no significant indication of hydrocarbon was observed in this interval. The total depth of the well was ultimately deepened to 12,796 feet (3900 meters) to fully evaluate the stratigraphy and hydrocarbon potential of the lower sections.

A number of hydrocarbon shows were recorded over the interval 9840 feet (3000 meters) to 10,500 feet (3200 meters). Three zones within this section were subsequently drillstem tested. However, all three drillstem tests were unable to establish flow of formation fluid to the surface.

OPEN HOLE LOGS

A full suite of open hole logs were run by Schlumberger from surface to TD (Attachment 4). The interval from 5430 feet (1655 meters) to 12,790 feet (3898 meters) was evaluated using Amoco's Simcom computer processed interpretation. Appendix 1 details the Simcom interpretation over the drillstem test intervals. Attachment 5 lists the Simcom trace descriptions as they are presented on the composite logs. Attachments 6,7 and 8 show the Simcom composite log over the drillstem test (DST) intervals. Based on log analysis, the average porosity and water saturation for each of the test intervals are listed below:

Interval (feet)	Interval (meters)	Average Porosity	Average SW
9,980-10,000	3042-3048	10.9	72.4
10,075-10,088	3071-3075	10.5	70.0
10,430-10,449	3179-3185	9.5	78.6

Appendix 2 includes the values calculated to determine the average porosity and water saturation presented above.

RFT DATA

The Schlumberger Repeat Formation Tester was run prior to sidewall coring in order to establish a reservoir pressure gradient. Twenty formation tests were attempted. The tests were unsuccessful due to hole size in all but one test at 10,079 feet (3072 meters).

The formation test at 10,079 feet (3072 meters) recovered 4900cc of mud filtrate, containing 140ppm nitrates. An initial pressure of 4866 psia was recorded indicating a pressure gradient of .483psi/ft or 9.3 lb/gal. The pressure after 30 minutes had dropped to 4412 psia indicating a pressure gradient of .438 psi/ft or 8.4 lb/gal.

Pressure data from DST#1A and DST#1C of the interval 10,430 feet - 10,449 feet (3179-3185 meters) indicated gradients of .458 psi/ft and .433 psi/ft respectively.

CORE DATA

Three conventional cores were cut in Tilana-1 for stratigraphic considerations only. Core No. 1 was cut in the uppermost Eastern View Coal Measures 5463-5518 feet (1665-1682 meters). Core No. 2 was cut in reservoir sands within the Upper L. balmei of the Eastern View Coal Measures 9150-9213 feet (2789-2808 meters). Core No. 3 recovered mostly basalt within an uppermost Cretaceous volcanogenic sequence 12,292-12,310 feet (3747-3752 meters). Although no hydrocarbons were observed in any of the cores, and none of the cores covered the DST intervals, a brief description is provided for completeness.

Porosity-permeability core analyses were conducted on Core Nos. 1 and 2. No core analysis was conducted on Core No. 3. Core No. 1 average helium porosity was 25.5% with a range from 5.6% to 32.0%. Core No. 2 average porosity was 16.7% with a range from 5.6% to 23.6%.

Core No. 1 average air permeability was 192 md with a range from 1.2 md to 1430 md. Core No. 2 average permeability was 166 md with a range from .01 md to 1480 md.

A total of 85 sidewall cores were extracted from 5548-12,736 feet (1691-3882 meters). Selected sidewall cores over the DST intervals and over other possible hydrocarbon-bearing sands were submitted for geochemical analysis. The sidewall cores from 10,118 feet (3084 meters), 10,150 feet (3094 meters), and 10,490 (3197.5 meters) were the only samples submitted that had C12+ gas chromatograms which resembled reservoir hydrocarbon. This work supports wellsite observations that these three sidewall cores had the best hydrocarbon shows.

Wellsite observations indicate that the hydrocarbon present in the sands above approximately 10,105 feet (3080 meters) is most likely dead oil. Sidewall core descriptions of samples taken over the DST intervals are summarized below.

<u>DEPTH</u> <u>(ft)</u>	<u>DEPTH</u> <u>(M)</u>	<u>REC'D</u> <u>(CM)</u>	<u>CONDITION</u> <u>(STATE)</u>	<u>ROCK</u> <u>TYPE</u>	<u>VIS</u> <u>POR</u>	<u>STAIN</u>	<u>OIL</u> <u>FLOUR</u>
9987	3044	3	Good	SDST/CLST	10-20	Even	-
9997	3047	2	Good	SDST	15-25	Patchy	-
10080	3072.5	3	Good	SDST	20-25	Patchy	Trace
10085	3074	3	Good	SDST/Coal	20-25	Trace	Trace
10443	3183	3	Good	SDST	15-25	-	-

A description of all the sidewall cores is presented in Appendix 3.

TEST PROCEDURE AND EQUIPMENT

The test procedure and sequence of events for each drillstem test was similar. Through-tubing perforating with 2.125" Enerjet guns was utilized for all perforations. First, all test tools were rabbited and internal diameters checked. Then the drillstem test string was run in the hole. A typical DST assembly is shown in Attachment 9.

The DST string consisted of a tailpipe section, a packer, a safety joint to back off the packer if necessary, an hydraulic circulating valve, a bundle carrier with mechanical gauges, an hydraulic jar, a LPR-N tester valve, an APR-M2 circulating safety valve and reversing valve, an APR-A reversing valve, slip joints, a safety valve, and a surface readout nipple. Drill collars and 5.5" drill pipe completed the assembly.

The DST assembly was run in the hole and filled with enough water to provide an underbalance while perforating of between 1000 psia and 1750 psia. After pressure testing the fluid filled portion of the DST string and attaching the landing string the packer was set. At this time all surface equipment was pressure tested and hooked up.

The LPR-N tester valve was opened and a 2.125" gauge cutter was run on slick line to ensure the tester valve was properly open. At this time, Schlumberger BOP's and lubricator with 2.125" Enerjet guns were rigged up and pressure tested. The guns were then run to depth and correlated and fired with the well on a 1/4" choke.

The following observations are made in order to streamline and prevent lost time on similar DST procedures performed in the future.

To reduce the chances of sticking tools in the test string inspect and drift all drill collars, drill pipe, and crossovers, that will be used in the drillstem test string and ensure that they are clean and free of any scale or corrosion.

When running the 2.125" Enerjet strip carrier in reduced I.D. conditions-attach the sinker bars below the gun and file the bottom and top edges of each charge directly above the primer cord entry hole. Caliper the complete assembly to ensure proper clearance is maintained. These precautions will reduce the chances of sticking the perforating guns in the test string.

Place pup joints in the casing string through the zones of interest for use in correlation while perforating. This will eliminate the need of running a gamma ray to correlate before perforating.

DRILLSTEM TEST DATA SUMMARY

The pressure information recorded during DST No. 1A 10,430-10,449 feet (3179-3185 meters) indicates an initial reservoir pressure of 4783 psia at 10,440 feet (3182 meters). The pressure gradient corresponding to that pressure is .458 psia/ft or 8.8 lb/gal.

Representative formation water samples or formation fluid samples were not obtained due to the lack of flow in any of the DST's. Determination of R_w and the fluid composition of the reservoir is not possible.

Gas samples were retrieved during DST No. 2B 9980-10,089 feet (non-continuous). Analysis of these samples indicate a methane rich gas with a gravity of .74 and a gross heating value of approximately 1100 BTU per cubic foot of dry gas. These gas samples give us an indication of the quality of the gas present over the DST intervals but cannot be interpreted as representative of the reservoir fluid considering the lack of flow during the drillstem test.

The determination of reservoir parameters of K_h , skin, boundaries and changes of these parameters within the radius of investigation of the tests is not possible due to the lack of flow during all drillstem tests. Appendix 5 (Otis Well Test Reports) and Appendix 6 (Halliburton Test Reports) document the rate and pressure data collected during the tests.

Limited well productivity was evidenced by the total rise in the fluid level during DST No. 2B. The fluid level increased 2468 feet (752 meters) over a period of 36 hours. The volume of the fluid entering the wellbore was 43.8 barrels or 246 cubic feet. The average rate of influx was 1.2 barrels per hour.

DRILLSTEM TEST DATA

DST No. 1A - Perforated: 10,430-10,449 feet (3179-3185 meters)
Misrun due to loss of annulus pressure upon perforating.

Immediately upon perforating the test interval, the APR-M2 circulating valve opened establishing communication between the annulus and the test string above the LPR-N Tester Valve. The loss of annulus pressure caused the LPR-N tester valve to close, shutting in the test interval and allowing the pressure to build. Analysis of the pressure data after the LPR-N valve closed indicated a reservoir pressure of 4783 psia.

DST No. 1B - Open Perforations: 10,430-10,449 feet (3179-3185 meters)
Misrun due to LPR-N tester valve malfunction.

After rerunning the test string, 1550 psia pressure was applied to the annulus to open the LPR-N tester valve without success. The LPR-N was set to open at 1200 psia annulus pressure. Attempted to open LPR-N by rocking annulus pressure from 200-1800 psia with no success. Pressured slowly up to 2000 psia sheared APR-A tool and reversed out. The LPR-N tester valve was tested at the surface and worked properly. The cause of the failure was not evident from inspection of the LPR-N tester valve.

DST No. 1C - Reperforated: 10,430-10,449 feet (3179-3185 meters)
No indication of flow after reperforating.

After rerunning the test string, the LPR-N tester valve was opened. A very weak intermittent blow was observed. Reperforated 10,430-10,449 feet (3179-3185 meters) with no blow at surface. Ran pressure gradient survey and tandem bottomhole samplers and retrieved two bottomhole samples from 7500 feet (2286 meters). The DST string was pulled and an EZSV retainer was set at 10,420 feet (3176 meters) and the perforations were cement squeezed.

The sampling depth was the depth of least gradient where gas would most likely be sampled. However, upon opening one of the samples at the wellsite no gas was present. The second sample was sent to Core Laboratories for fluid analysis. The Core Lab results confirmed the wellsite observations that the completion fluid sampled contained no gas.

DST No. 2A - No perforations open
Perforating guns stuck in test string.

While tripping in to perforate, the perforating guns stuck at 9385 feet (2861 meters) and while trying to pull free the wireline pulled out of the rope socket. Fishing efforts were unsuccessful and the test string was pulled.

DST No. 2B - Perforated: 10,075-10,089 feet (3071-3075 meters)
Perforated: 9,980-10,000 feet (3042-3048 meters)
No flow to surface, minimal indication of flow downhole.

Perforated 10,075-10,089 feet (3071-3075 meters) with no immediate indication of flow at the surface. Ran Schlumberger Production Logging Tool with intermittent weak blow. Perforated 9,980-10,000 feet (3042-3048 meters) with no immediate indication of flow at the surface. Intermittent weak blow at the surface was later observed. Ran pressure gradient survey and bottomhole samplers and retrieved three bottomhole samples across the perforated intervals.

The following samples were obtained. Sample No. 280 was sampled at a depth of 9991 feet (3045 meters) and Sample No. 281 was sampled at a depth of 10,083 feet (3073 meters). Sample No. 279 was sampled at 10,080 feet (3072 meters) and analyzed at a wellsite. After bottomhole sampling was completed the test string was reversed out and returns were monitored and sampled.

Core Laboratories analyses of the gas in samples 280 and 281 are tabulated below and in Appendix 4.

DEPTH (M)	GAS GRAVITY	BTU CONTENT	METHANE MOL %	ETHANE MOL %	PROPANE MOL %	NIT MOL %
3045	.735	1045	80.04	4.81	2.71	1.43
3073	.741	1198	79.67	6.32	3.93	5.89

No oil or condensate was recovered from either sample.

The wellsite analysis of Sample No. 279 indicated a gas similar in composition to that of Sample No. 281.

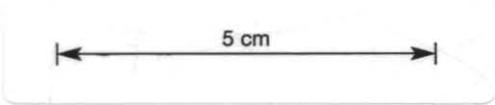
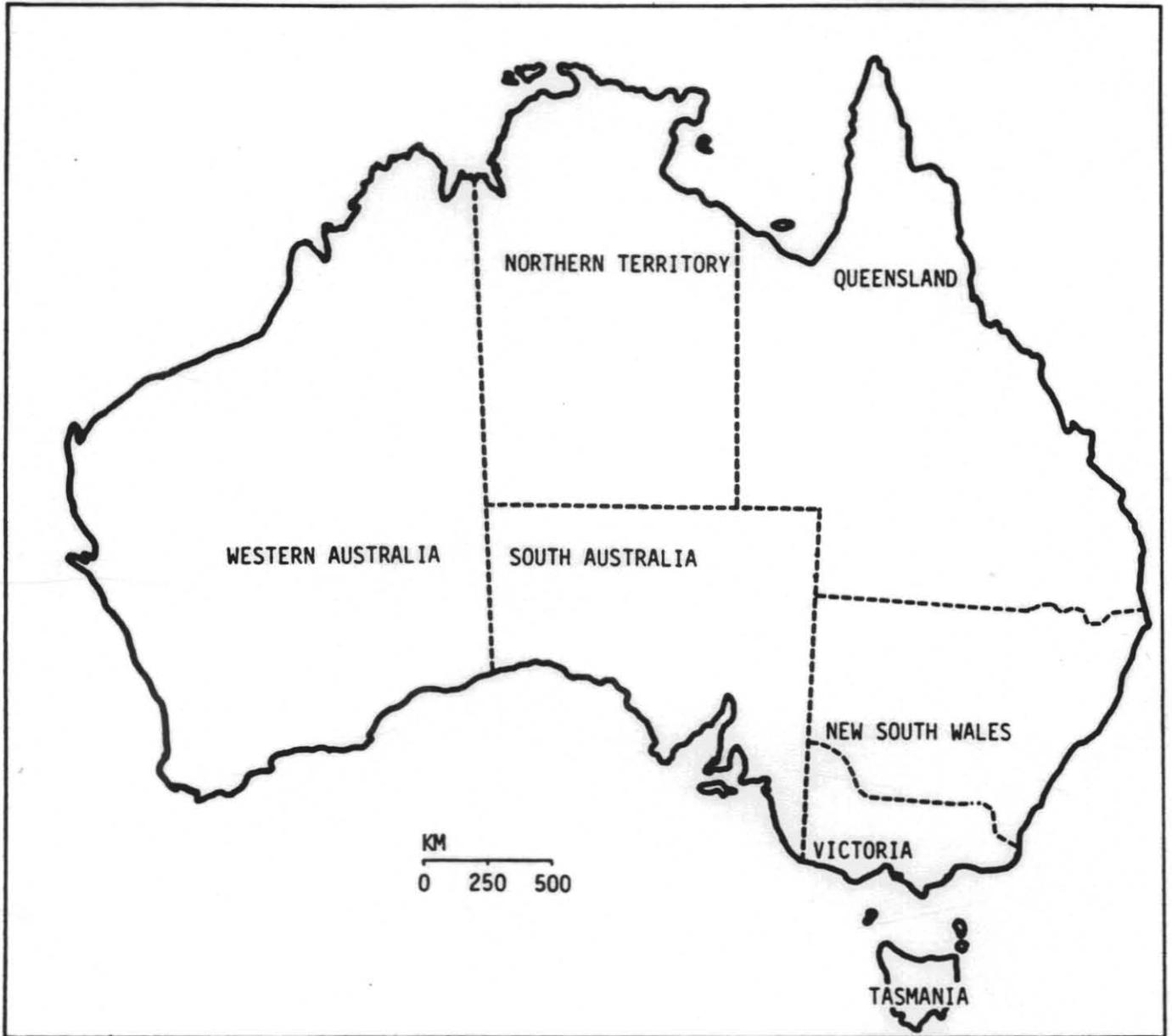
The recovery of gas during the Tilana-1 indicates there was communication with the formation through the perforations. The pressure information and rate of fluid influx during the drillstem tests indicates the formation has limited permeability within the radius of investigation of the test.

12

321015

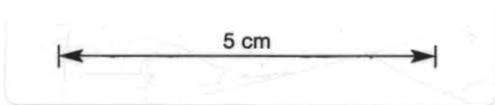
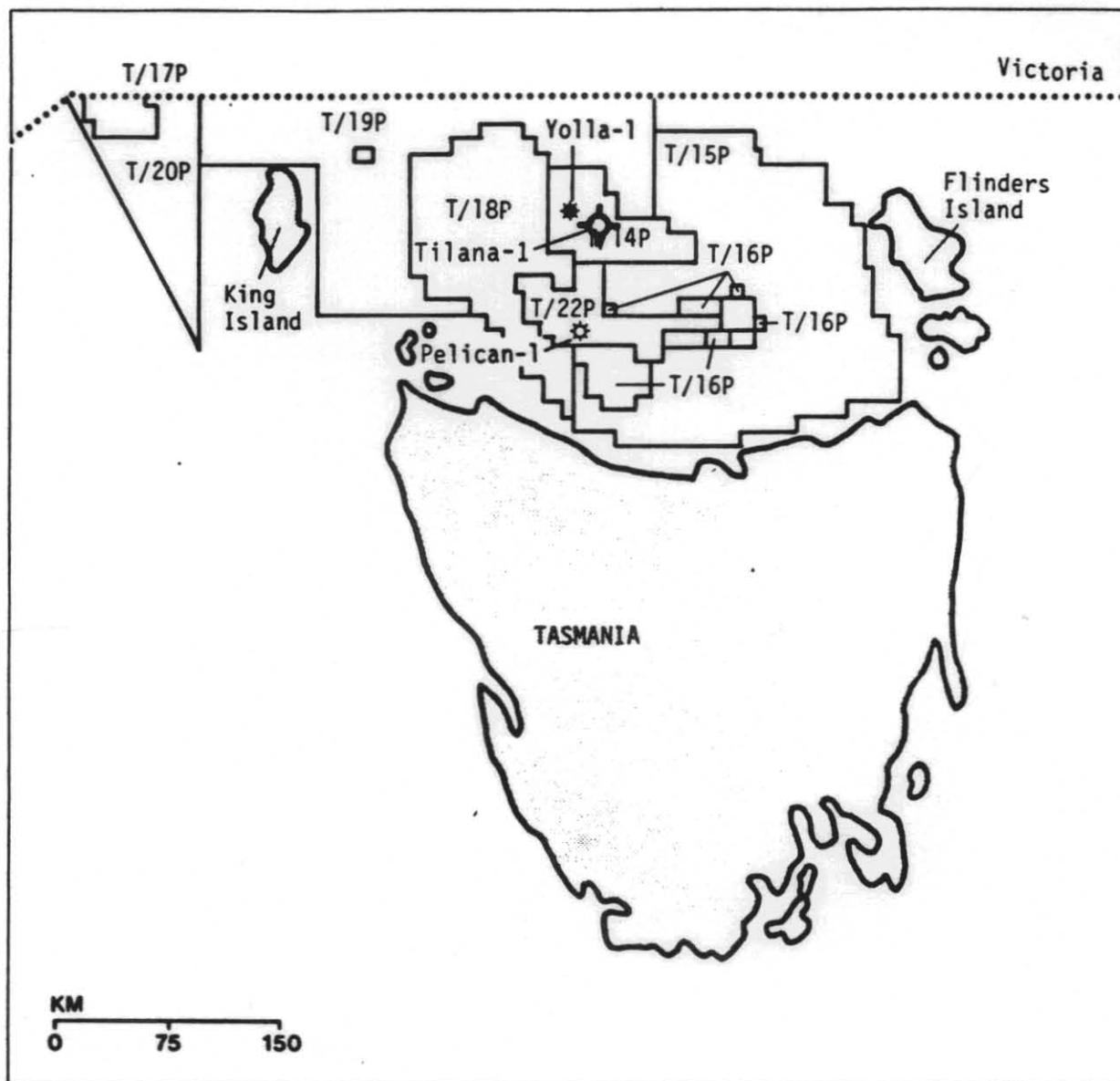
Australia

States

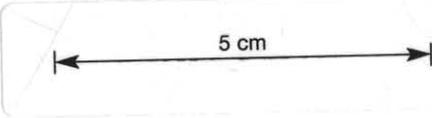
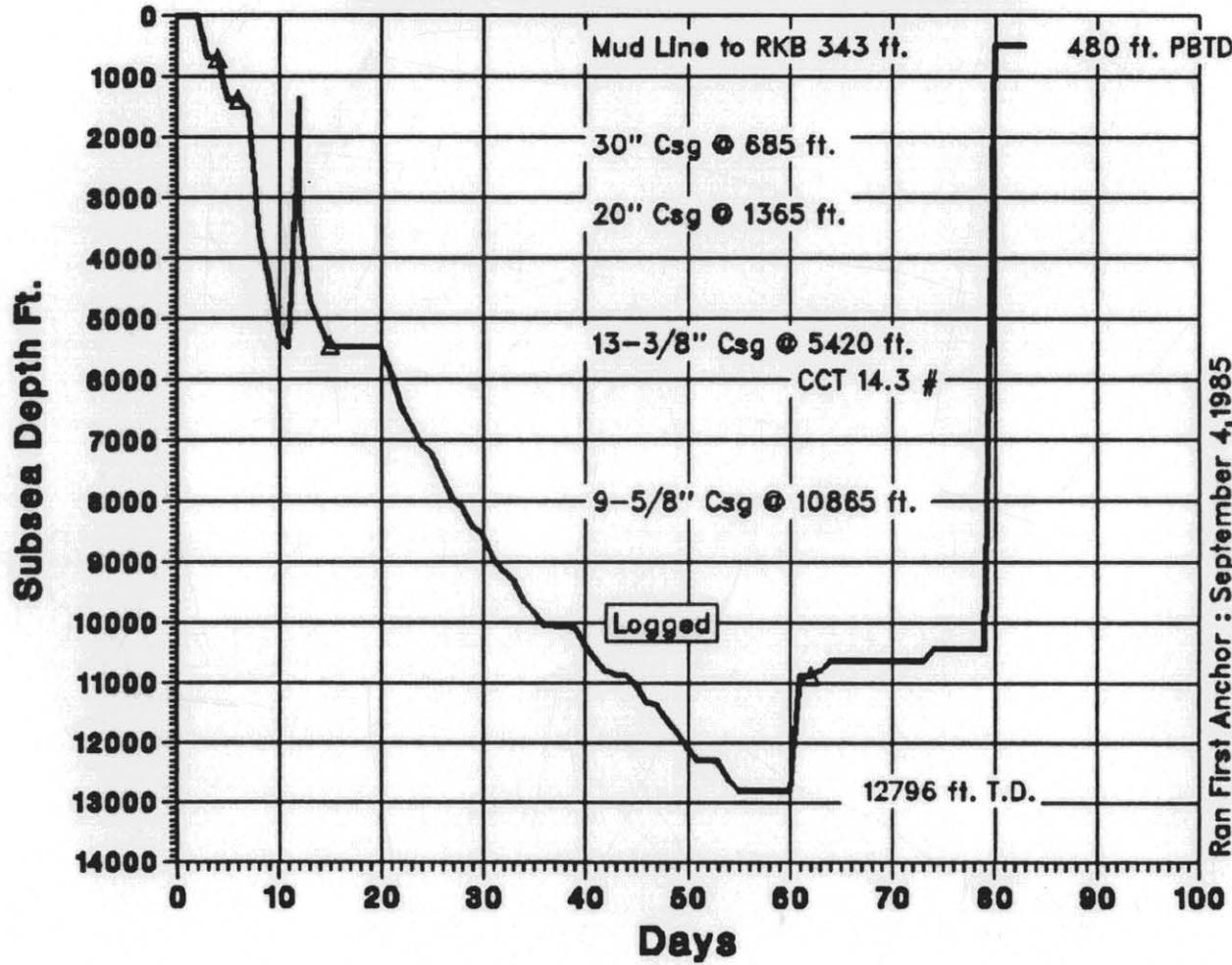


321016

Tasmania



Amoco Australia Petroleum Company Bass Basin Drilling Time Curve - Tilana #1



321018

WELL SUMMARY SHEET

COMPANY:	AMOCO AUSTRALIA PETROLEUM COMPANY	WELL:	TILANA-1	ISSUED:	NOVEMBER, 1985
SPOODED:	5 SEPTEMBER 1985	Basin:	BASS BASIN	REVISED:	
DATE T.D.:	18 OCTOBER 1985	PERMIT:	T/14P	BY:	BFW
RIG RELEASED:	25 NOVEMBER 1985	LATITUDE:	39° 53' 36.73" SOUTH		
TOTAL OPERATING TIME:	84 DAYS	LONGITUDE:	145° 58' 41.97" EAST		
DRILLING CONTRACTOR/RIG:	DIAMOND M. EXPLORATION CO. 7 DIAMOND M EPOCH	S.P.:	5199		
TOTAL DEPTH:	3900.2m	LINE:	B71A-50		
WATER DEPTH:	82.3m	STATUS:	PLUGGED AND ABANDONED		
KELLY BUSHING:	22.2m				

FORMATION	RKB(m)	SUBSEA(m)	T.W.T.(msec)	LITHOLOGIC SUMMARY	REMARKS/SHOWS
TORQUAY GROUP	104.5	82.3		BIOCLASTIC LIMESTONE BECOMING CLAYEY AND SILTY WITH DEPTH	NO SHOWS
ANGAHOOK FORMATION	1137	1114.8	1023	INTERBEDDED SANDSTONES, CLAYSTONES, SILTSTONES, COALS AND OCCASIONAL DOLOMITE. VOLCANIC FLOW IN MIDDLE OF UNIT	NO SHOWS
DEMONS BLUFF FORMATION	1528	1505.8	1305	ANOXIC, PYRITIC SILTY CLAYSTONES WITH THIN SANDSTONES.	NO SHOWS
EASTERN VIEW COAL MEASURES	1646	1623.8	1405	INTERBEDDED SANDSTONES, SILTSTONES, SHALES AND COAL WITH OCCASIONAL DOLOMITE STRINGERS.	MINOR OIL FLUORESCENCE WITH ASSOCIATED GAS PEAKS.
- top dolerite sill	2021	1998.8	1643		
- base dolerite sill	2266	2243.8	1745	FINE TO COARSE CRYSTALLINE DOLERITE CUM GABBRO	NO SHOWS.
TOTAL DEPTH	3900.2	3878	2600		

NO.	DEPTH (m)	CUT (m)	REC (m)	LITHOLOGY	REMARKS/SHOWS	
C O R E S	1	1665.6-1682.2	17.23	10.8	v f gr SST w/ var amounts of cly mtx and minor clyst laminae. 20-30% vis porosity	No Shows
	2	1664.97-1682.2	18.85	18.85	v f to f gr SST w/ carb mat, coaly frag and var amounts of cly. 8-15% vis por. 1m? c xtn ign at top	v tenuous pale yel cut fluor at 2801m and 2802m.
	3	2788.6-2807.45	5.44	5.44	Altered amygdaloidal basalt w/ calcite veins.	No shows.

DITCH CUTTINGS	From (m)	To (m)	SIDEWALL CORES:	SUITE NO.	RUN NO.	FROM (m)	TO (m)	SHOT	RECOVERED
	418	3900		2	1	3065	1691	51	51
				3	2°	3882	3870	4	4
				3	3	3822	2994	30	28

L O G S	SUITE 1: (1662-412m; GR to sea bed) 14 September ISF-BHC-GR-SP-Cal (Run 1)	SUITE 2: (3070-1652m) 10 to 12 October ISF-DDBHC-MSFL-GR-SP-Cal (Run 2) LDT-CNL-GR (Run 1) MDT (Run 1) WST (Run 1) CST (Run 1)	SUITE 3: (3902-2905m) 29 to 31 October ISF-BHC-MSFL-GR-SP-Cal (Run 3) LDL-CNL-GR (Run 2) HDT (Run 2) CST (Run 2 - 4 shots then failure) WST (Run 2 - 5 levels then failure) RFT (Run 1 - 19 attempts, 2 seats) CST (Run 3 - Rec 28 of 30)
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C A S I N G	SIZE (inches x lb/ft)	30x	20 x 94	13 3/8x 68	9 5/8 x 47
	LANDED AT (m)	203	412	1652	3311.6
	CEMENT (Sacks)	2000	2000	2102	2130

DRILLSTEM TESTS

DST NO. 1: Perf 3178.7 - 3184.9
Pressure went from 1420 psi to 1800-1900 psi then to Opsi. No Flow.
Reperforate 3179.1 - 3185.1m.
No flow, no pressure increase.
Reversed out - no visible gas or oil observed.

DST NO. 2: Perf 3071 - 3075m
No indication of gas influx; weak blow in bubble bucket.

DST NO. 3: Perf 3042 - 3048m
Weak blow in bubble bucket;
Fluid level in well rose 417m in 15 hours.

PLUGS:

REMARKS:

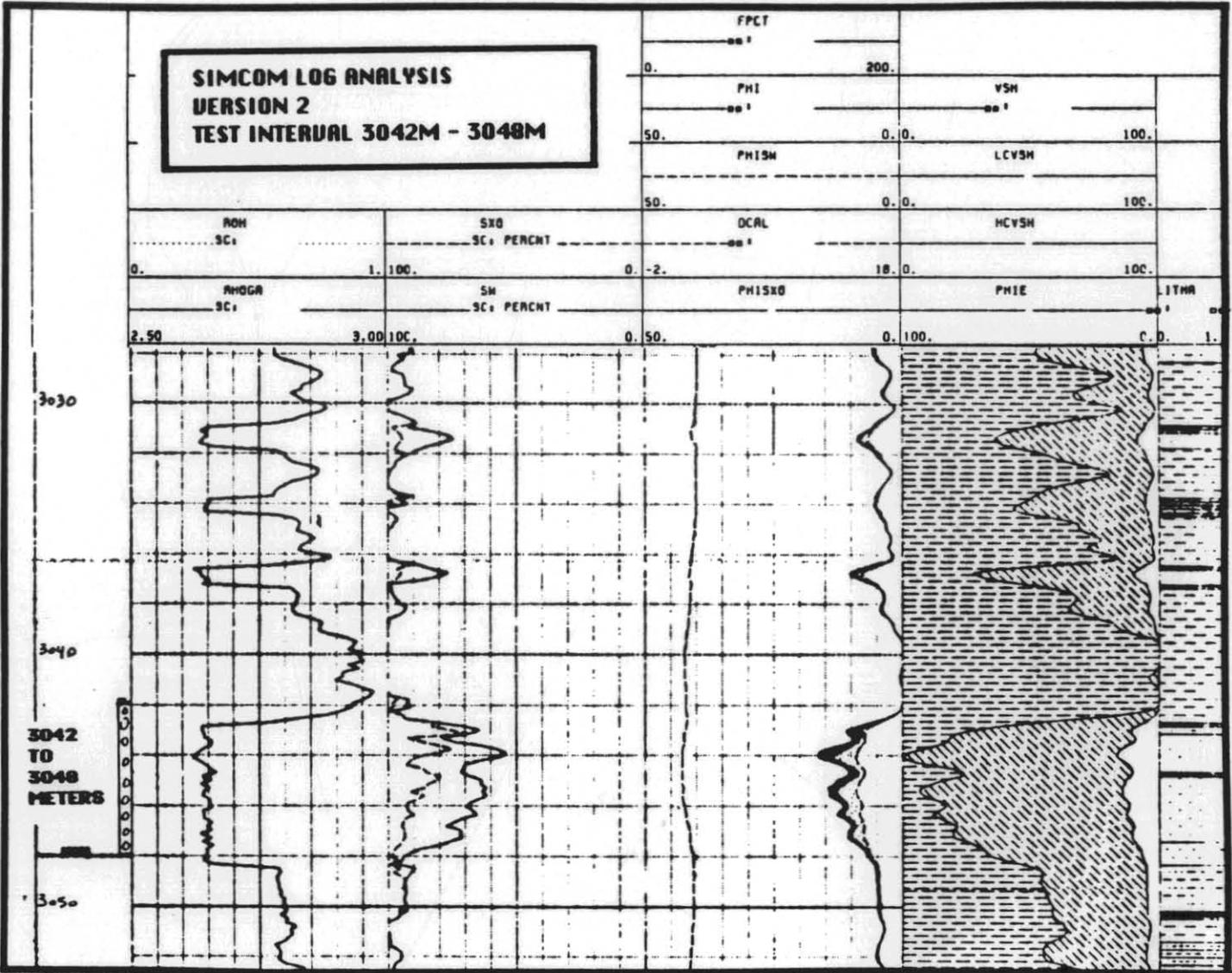
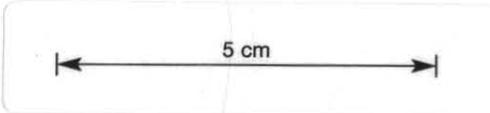
Tool failed after first 4 SMC's of Run 2.

**SIMCOM LOG ANALYSIS
VERSION 2
TRACE DESCRIPTIONS**

CODE	DEFINITION
PHI	= SHALE CORRECTED POROSITY
PHIE	= SHALE CORRECTED POROSITY
PHISX0	= MUD FILTRATE POROSITY
PHISW	= WATER FILLED POROSITY
FPCT	= % SECONDARY POROSITY
ROH	= HYDROCARBON DENSITY
SX0	= MUD FILTRATE SATURATION
SW	= WATER SATURATION
VSH	= SHALE PERCENT
DCAL	= CALIPER-BIT SIZE
(DATA MAY BE UNRELIABLE IN DCAL SHADED ZONES)	
RHOGA	= APPARENT GRAIN DENSITY
LITHA	= GENERAL ESTIMATE OF LITHOLOGY
HCVSH	= COAL ESTIMATE SHADE BOUNDARY
LCVSH	= COAL ESTIMATE SHADE BOUNDARY

DEPTH SCALE:

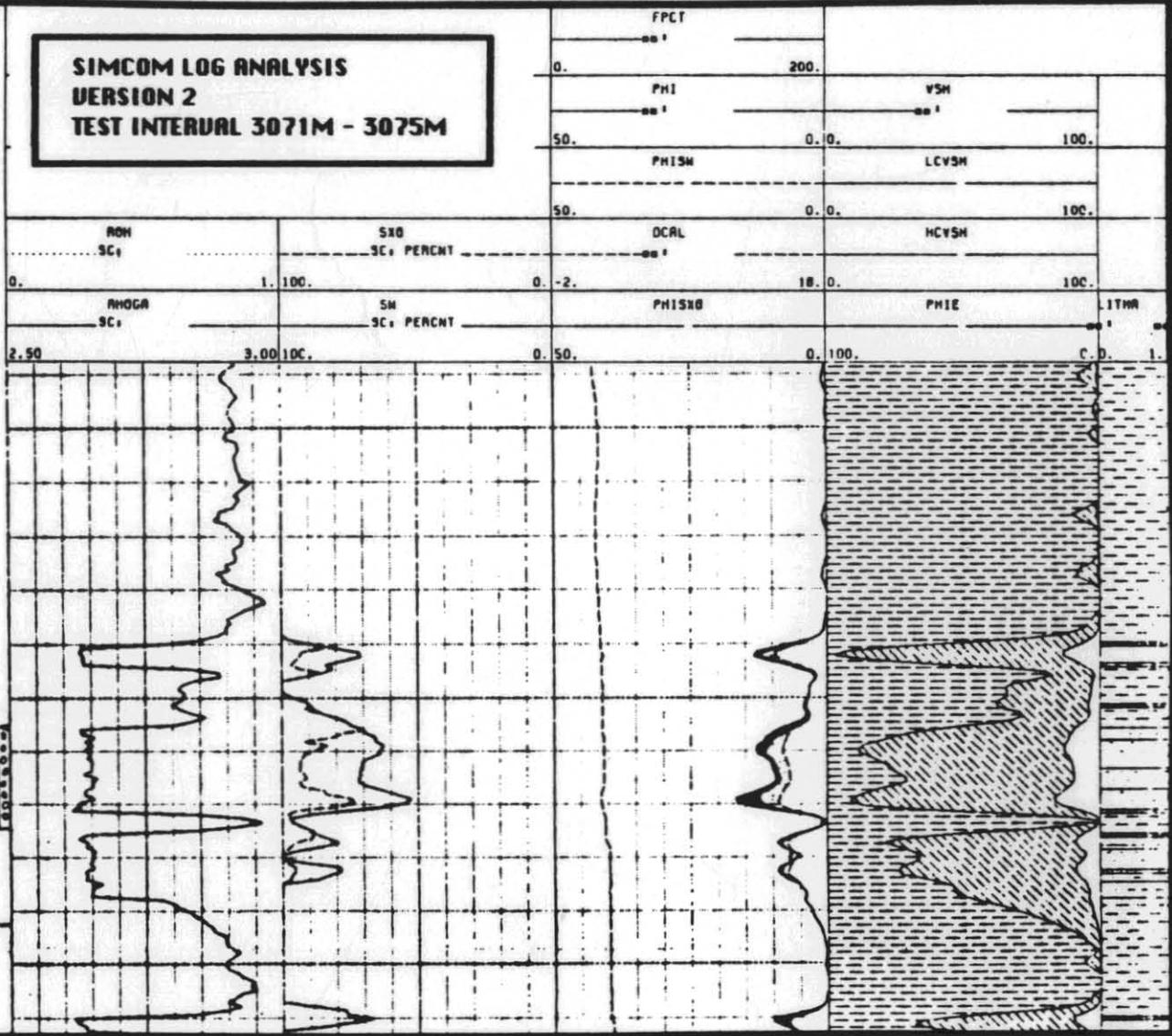
METERS=LARGE CHARACTERS: FEET=SMALL CHARACTERS



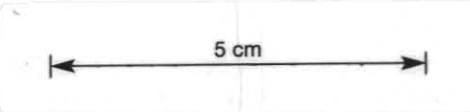
321020

5 cm

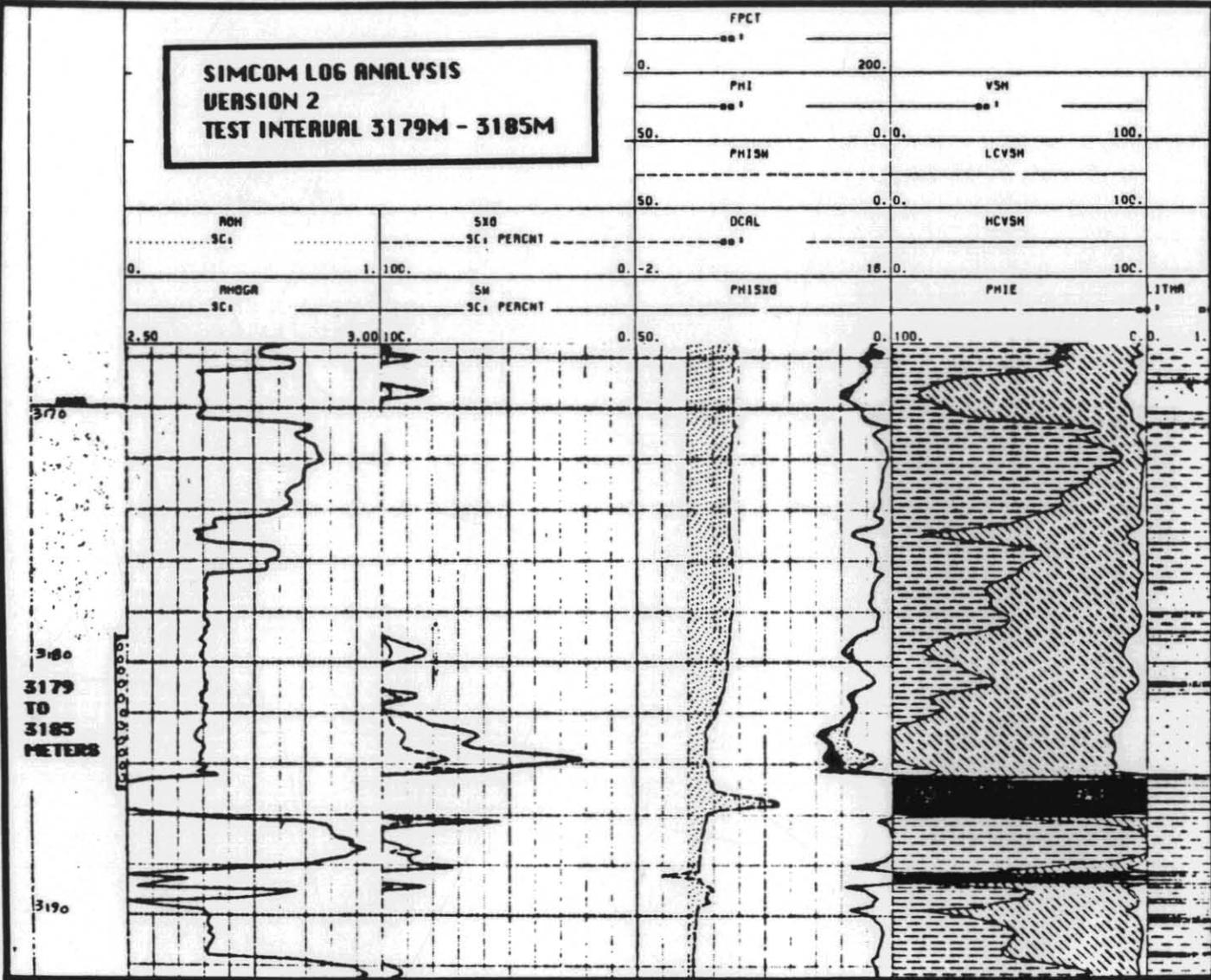
**SIMCOM LOG ANALYSIS
VERSION 2
TEST INTERVAL 3071M - 3075M**



3071
TO
3075
METERS



**SIMCOM LOG ANALYSIS
VERSION 2
TEST INTERVAL 3179M - 3185M**



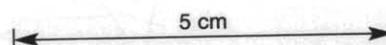
3179
TO
3185
METERS

321023

TYPICAL DST ASSEMBLY

	O.D.	I.D.
 DRILL PIPE.....	5.000	4.276
 CROSSOVER.....	6.500	2.880
 SUB-SEA TEST TREE.....	10.750	2.880
 CROSSOVER.....	6.500	2.880
 DRILL PIPE.....	5.000	4.276
 CROSSOVER.....	6.250	2.750
 SURFACE READOUT (NON-HALLIBURTON)	4.625	2.280
 CROSSOVER.....	6.250	2.875
 CROSSOVER.....	6.375	2.438
 FUL-FLO SAFETY VALVE.....	5.000	2.250
 CROSSOVER.....	6.125	2.875
 DRILL COLLARS.....	6.438	2.875
 CROSSOVER.....	6.125	2.313
 SLIP JOINT.....	5.000	2.250
 SLIP JOINT.....	5.000	2.250
 SLIP JOINT.....	5.000	2.250
 CROSSOVER.....	6.125	2.875
 DRILL COLLARS.....	6.438	2.875
 CROSSOVER.....	6.125	2.313
 APR-TYPE "A" CIRCULATING VALVE..	5.000	2.250
 APR-M2 SAFETY CIRCULATING VALVE.	5.000	2.250
 LPR-M TESTER VALVE.....	5.000	2.250
 BUNDLE CARRIER.....	5.375	2.250
 JAR.....	4.625	2.250
 FUL-FLO HYDRAULIC BYPASS.....	4.625	2.250
 CROSSOVER.....	4.750	2.438
 VR SAFETY JOINT.....	4.825	2.250
 CASING PACKER.....	7.800	3.000
 DRILL PIPE.....	5.000	4.276

5 cm



321024

APPENDIX 1
SIMCOM LOG ANALYSIS

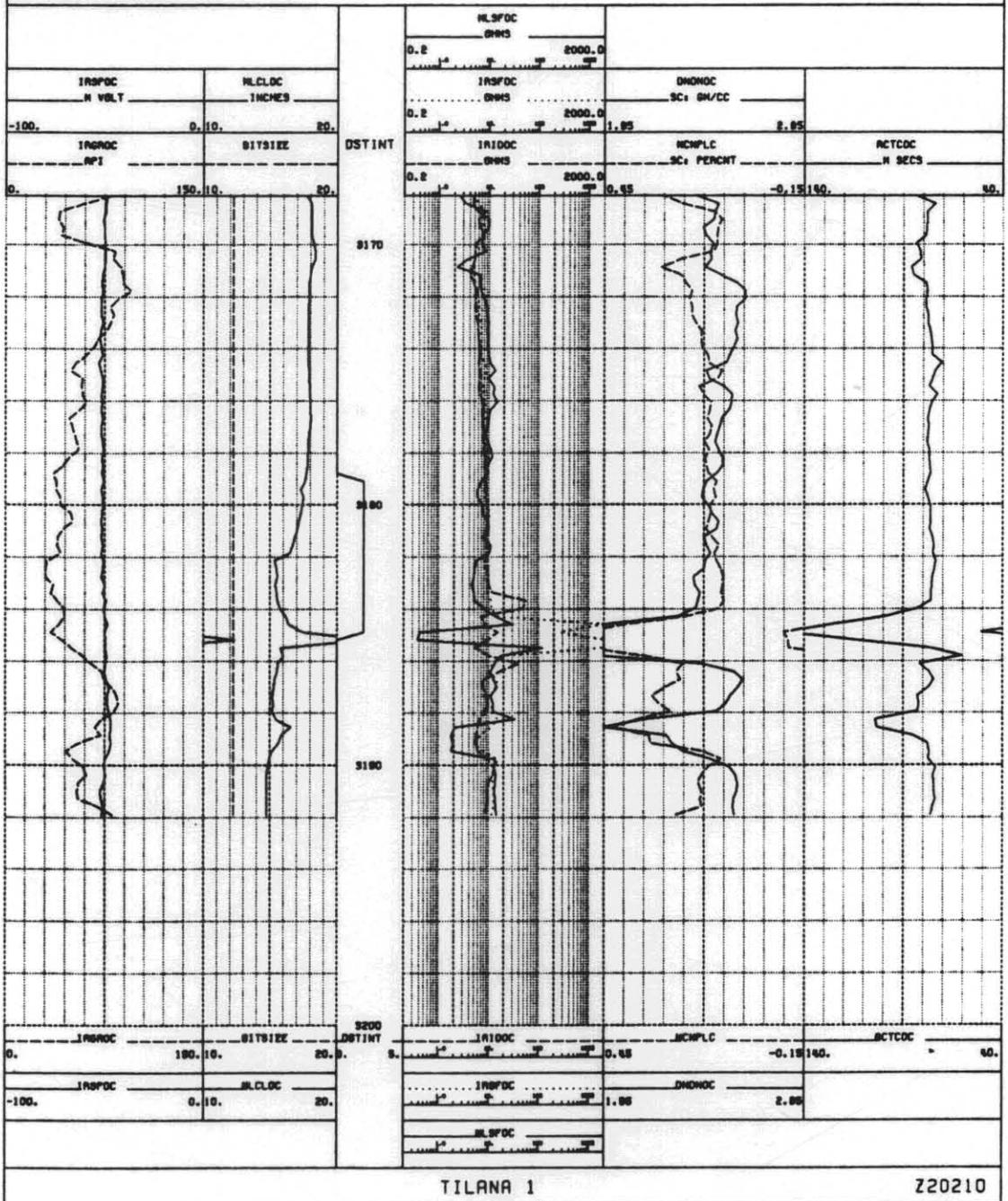


AMOCO PRODUCTION COMPANY

TILANA 1

Z20210

TILANA-1 COMPOSITE LOG
 VERTICAL SCALE= 1:200
 DATE=03/13/86



TILANA 1

Z20210

5 cm

```

*****
*
* AUSTRALIA WELL TILANA NO. 1 RUN 2
* ***** JOB CONTROL PARAMETERS *****
*
* SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS
* *****
* *****TOP OF COMPUTATION INTERVAL = 543#.
* *****BOTTOM OF COMPUTATION INTERVAL = 935#.
* *****COMPUTATION INCREMENT = 0.5000#
* *****INTERPRETATION PROCEDURE = 5.
* *****PLOT PRESENTATION = 2.
* *****INPUT TAPEFILE = 33702.
* *****COMPUTED RESULTS STORED ON TAPEFILE = 32703.
*
*****

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*****
*
* AUSTRALIA WELL TILANA NO. 1 RUN 2
* HOLE CONSTANTS AT TIME OF LOGGING
* *****
* SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS
* *****
* SURVEY NUMBER = 2.
* SURVEY TOP = 543#.
* SURVEY BOTTOM = 935#.
*
* BIT SIZE = 12.2500#
* MUD WEIGHT = 9.3000#
* MUD RESISTIVITY, MEASURED = 0.8200#
* MUD TEMPERATURE = 11#.
* MUD FILTRATE RESISTIVITY(RMF) = 0.921#
* MUD FILTRATE TEMPERATURE = 7#.
* MAXIMUM RECORDED TEMPERATURE = 219.
*
*****

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321028

AUSTRALIA WELL TILANA NO. 1 RUN 2
 POROSITY AND WATER SATURATION PARAMETERS

SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS

ZONE NUMBER	=	1.	
ZONE TOP	=	5431.	
ZONE BOTTOM	=	6600.	
SW			
EQUATION NO.	=	6.	
FORMATION FACTOR -A-	=	1.	
CEMENTATION EXPONENT -M-	=	9.	
WATER SATURATION EXPONENT -N-	=	2.	
FORMATION WATER RESISTIVITY -RW-	=	0.1000	
TEMP. OF FORM. WATER RESISTIVITY	=	200.	
SXO=SW**X WHERE X	=	0.2000	
SWB=VSH**Y WHERE Y	=	0.6000	
AVG. MEAN SURFACE TEMP.	=	50.	
*** FORMATION TEMPERATURE	=	150.7293	
*** TEMPERATURE GRADIENT DEG/100 FT.	=	1.8075	
*** RW AT FORMATION TEMPERATURE	=	0.1249	
*** RMF AT FORMATION TEMPERATURE	=	0.4279	
POROSITY			
MODEL	=	2.	
MAXIMUM POROSITY	=	0.3500	
COMPUTE SECONDARY POROSITY?	=	0.	
MINERAL 1----- MATRIX DENSITY	=	2.6500	
MINERAL 1-----HYDROGEN INDEX	=	0.	
MINERAL 1-----TRANSIT TIME	=	55.7000	
MINERAL 2-----MATRIX DENSITY	=	2.9800	
MINERAL 2-----HYDROGEN INDEX	=	0.	
MINERAL 2-----TRANSIT TIME	=	51.	
MUD FILTRATE DENSITY	=	1.	
*** MUD FILTRATE SALINITY	=	6510.7227	
*** MUD FILTRATE DENSITY	=	1.0046	
*** MUD FILTRATE HYDROGEN INDEX	=	0.9980	
HYDROCARBON DENSITY	=	1.	
*** HYDROCARBON HYDROGEN INDEX	=	1.	
FLUID TRANSIT TIME	=	189.	
BAD HOLE CONSTANTS			
MAXIMUM HOLESIZE	=	14.5000	
MAXIMUM DENSITY CORR.	=	0.2500	
SONIC LIMIT?(1=YES)	=	1.	
DELTA T AT 0 POROSITY	=	0.	
DELTA T AT 20% POROSITY	=	0.	
DELTA T MATRIX	=	55.7000	
DELTA T FLUID	=	189.	

AUSTRALIA WELL TILANA NO. 1 RUN 2

*****SHALE PARAMETERS*****

* SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS *

* ZONE NUMBER	=	1.	
* ZONE TOP	=	5431.	
* ZONE BOTTOM	=	6688.	
* SHALE PARAMETERS			
	RESISTIVITY	=	2.
	BOUND WATER-RWB	=	8.2888
	DENSITY	=	2.3588
	NEUTRON POROSITY	=	8.2188
	TRANSIT TIME	=	85.
* SHALE INDICATORS			
USE	GAMMA RAY(1=YES)	=	8.
	GAMMA RAY-SHALE	=	8.
	GAMMA RAY-CLEAN	=	8.
USE	SP(1=YES)	=	8.
	SP -CLEAN	=	8.
	SP-SHALE	=	8.
USE	NEUTRON-DENSITY(1=YES)	=	1.
	NEUTRON PHI AT 2.78	=	-8.8788
	NEUTRON PHI AT 2.28	=	8.2388
USE	SONIC-DENSITY(1=YES)	=	8.
	TRANSIT TIME AT 2.78	=	8.
	TRANSIT TIME AT 2.28	=	8.
USE	NEUTRON-SONIC(1=YES)	=	8.
	TRANSIT TIME AT PHI=8	=	8.
	TRANSIT TIME AT PHI=28	=	8.
USE	NEUTRON PHI (1=YES)	=	8.
	CLEAN FORMATION PHI	=	8.
USE	RT (1=YES)	=	8.
	MAXIMUM RT,CLEAN	=	8.
USE	M-N CROSS-PLOT (1=YES)	=	8.
	POINT 1- M	=	8.8588
	- N	=	8.6688
	POINT 2- M	=	8.7988
	- N	=	8.5858

 * AUSTRALIA WELL TILANA NO. 1 RUN 2 *
 * LISTING OPTIONS, NET PAY CUTOFFS AND RECALIBRATION *

* SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS *

* ZONE NUMBER	=	1.	
* ZONE TOP	=	5431.	
* ZONE BOTTOM	=	6600.	
* LISTINGS(1=YES)	LIST INPUT DATA	=	0.
	LIST SHALE INDICATORS	=	0.
	LIST ACTUAL CALCULATIONS	=	0.
	LIST NET PAY	=	0.
* PAY SUBJECT TO	POROSITY GREATER THAN	=	0.1000
	SW LESS THAN OR EQUAL TO	=	0.5000
	VSHALE LESS THAN	=	0.5000
	SW/SXO RATIO LESS THAN	=	0.7000
	TOP OF PAY INTERVAL	=	5431.
	BOTTOM OF PAY INTERVAL	=	6600.
* LOG ADJUSTMENTS	DI FACTOR CNL TO DENSITY	=	1.
	OLD DENSITY-POINT 1	=	0.
	NEW DENSITY-POINT 1	=	0.
	OLD DENSITY-POINT 2	=	0.
	NEW DENSITY-POINT 2	=	0.
	OLD NEUTRON PHI-POINT 1	=	0.
	NEW NEUTRON PHI-POINT 1	=	0.
	OLD NEUTRON PHI-POINT 2	=	0.
	NEW NEUTRON PHI-POINT 2	=	0.
	OLD TRANSIT TIME-POINT 1	=	0.
	NEW TRANSIT TIME-POINT 1	=	0.
	OLD TRANSIT TIME-POINT 2	=	0.
	NEW TRANSIT TIME-POINT 2	=	0.

AUSTRALIA WELL TILANA NO. 1 RUN 2
 POROSITY AND WATER SATURATION PARAMETERS

SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS

	ZONE NUMBER	=	2.	
	ZONE TOP	=	6681.	
	ZONE BOTTOM	=	7588.	
SW	EQUATION NO.	=	6.	
	FORMATION FACTOR -A-	=	1.	
	CEMENTATION EXPONENT -M-	=	9.	
	WATER SATURATION EXPONENT -N-	=	2.	
	FORMATION WATER RESISTIVITY -RW--	=	8.1888	
	TEMP. OF FORM. WATER RESISTIVITY-	=	112.	
	SXO=SW**X WHERE X	=	1.	
	SWB=VSH**Y WHERE Y	=	8.2888	
	AVG. MEAN SURFACE TEMP.	=	58.	
***	FORMATION TEMPERATURE	=	177.4368	
***	TEMPERATURE GRADIENT DEG/100 FT.	=	1.8875	
***	RV AT FORMATION TEMPERATURE	=	8.8645	
***	RMF AT FORMATION TEMPERATURE	=	8.3845	
POROSITY	MODEL	=	2.	
	MAXIMUM POROSITY	=	8.3588	
	COMPUTE SECONDARY POROSITY?	=	8.	
	MINERAL 1-----MATRIX DENSITY	=	2.6588	
	MINERAL 1-----HYDROGEN INDEX	=	8.	
	MINERAL 1-----TRANSIT TIME	=	55.7888	
	MINERAL 2-----MATRIX DENSITY	=	2.9888	
	MINERAL 2-----HYDROGEN INDEX	=	8.	
	MINERAL 2-----TRANSIT TIME	=	51.	
	MUD FILTRATE DENSITY	=	1.	
***	MUD FILTRATE SALINITY	=	6518.7227	
***	MUD FILTRATE DENSITY	=	1.8846	
***	MUD FILTRATE HYDROGEN INDEX	=	8.9988	
	HYDROCARBON DENSITY	=	1.	
***	HYDROCARBON HYDROGEN INDEX	=	1.	
	FLUID TRANSIT TIME	=	189.	
BAD HOLE CONSTANTS	MAXIMUM HOLESIZE	=	14.5888	
	MAXIMUM DENSITY CORR.	=	8.1888	
	SONIC LIMIT?(1=YES)	=	1.	
	DELTA T AT 8 POROSITY	=	8.	
	DELTA T AT 28% POROSITY-	=	8.	
	DELTA T MATRIX	=	55.7888	
	DELTA T FLUID	=	189.	

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AUSTRALIA WELL TILANA NO. 1 RUN 2

*****SHALE PARAMETERS*****

*****SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS*****

ZONE NUMBER	=	2.	
ZONE TOP	=	6681.	
ZONE BOTTOM	=	7588.	
SHALE PARAMETERS	RESISTIVITY	=	18.
	BOUND WATER-RWB	=	1.
	DENSITY	=	2.7288
	NEUTRON POROSITY	=	8.2588
	TRANSIT TIME	=	58.
SHALE INDICATORS	USE GAMMA RAY(1=YES)	=	8.
	GAMMA RAY-SHALE	=	8.
	GAMMA RAY-CLEAN	=	8.
	USE SP(1=YES)	=	8.
	SP -CLEAN	=	8.
	SP-SHALE	=	8.
	USE NEUTRON-DENSITY(1=YES)	=	1.
	NEUTRON PHI AT 2.78	=	-8.8788
	NEUTRON PHI AT 2.28	=	8.2388
	USE SONIC-DENSITY(1=YES)	=	8.
	TRANSIT TIME AT 2.78	=	8.
	TRANSIT TIME AT 2.28	=	8.
	USE NEUTRON-SONIC(1=YES)	=	8.
	TRANSIT TIME AT PHI=8	=	8.
	TRANSIT TIME AT PHI=28	=	8.
	USE NEUTRON PHI (1=YES)	=	8.
	CLEAN FORMATION PHI	=	8.
	USE RT (1=YES)	=	8.
	MAXIMUM RT,CLEAN	=	8.
	USE M-N CROSS-PLOT (1=YES)	=	1.
	POINT 1- M	=	8.6988
	- N	=	8.6588
	POINT 2- M	=	8.4588
	- N	=	8.7888

 * AUSTRALIA WELL TILANA NO. 1 RUN 2
 * LISTING OPTIONS, NET PAY CUTOFFS AND RECALIBRATION
 * *****

* SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS *

* ZONE NUMBER	=	2.	
* ZONE TOP	=	66#1.	
* ZONE BOTTOM	=	75##.	
* LISTINGS(I=YES)	LIST INPUT DATA	=	#.
	LIST SHALE INDICATORS	=	#.
	LIST ACTUAL CALCULATIONS	=	#.
	LIST NET PAY	=	#.
* PAY SUBJECT TO	POROSITY GREATER THAN	=	#.1###
	SW LESS THAN OR EQUAL TO	=	#.5###
	VSHALE LESS THAN	=	#.5###
	SW/SXO RATIO LESS THAN	=	#.7###
	TOP OF PAY INTERVAL	=	N.A.
	BOTTOM OF PAY INTERVAL	=	75##.
* LOG ADJUSTMENTS	DI FACTOR CNL TO DENSITY	=	1.
	OLD DENSITY-POINT 1	=	#.
	NEW DENSITY-POINT 1	=	#.
	OLD DENSITY-POINT 2	=	#.
	NEW DENSITY-POINT 2	=	#.
	OLD NEUTRON PHI-POINT 1	=	#.
	NEW NEUTRON PHI-POINT 1	=	#.
	OLD NEUTRON PHI-POINT 2	=	#.
	NEW NEUTRON PHI-POINT 2	=	#.
	OLD TRANSIT TIME-POINT 1	=	#.
	NEW TRANSIT TIME-POINT 1	=	#.
	OLD TRANSIT TIME-POINT 2	=	#.
	NEW TRANSIT TIME-POINT 2	=	#.

321035

 AUSTRALIA WELL TILANA NO. 1 RUN 2
 POROSITY AND WATER SATURATION PARAMETERS

SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS

ZONE NUMBER	=	3.	
ZONE TOP	=	7581.	
ZONE BOTTOM	=	9358.	
SW	EQUATION NO.	=	6.
	FORMATION FACTOR -A-	=	1.
	CEMENTATION EXPONENT -M-	=	9.
	WATER SATURATION EXPONENT -N-	=	2.
	FORMATION WATER RESISTIVITY -RW--	=	8.1888
	TEMP. OF FORM. WATER RESISTIVITY-	=	288.
	SXO=SW**X WHERE X	=	8.2888
	SWB=VSH**Y WHERE Y	=	8.6888
	AVG. MEAN SURFACE TEMP.	=	58.
***	FORMATION TEMPERATURE	=	282.2898
***	TEMPERATURE GRADIENT DEG/188 FT.	=	1.8875
***	RW AT FORMATION TEMPERATURE	=	8.8989
***	RMF AT FORMATION TEMPERATURE	=	8.3388
POROSITY	MODEL	=	2.
	MAXIMUM POROSITY	=	8.3588
	COMPUTE SECONDARY POROSITY?	=	8.
	MINERAL 1----- MATRIX DENSITY	=	2.6588
	MINERAL 1-----HYDROGEN INDEX	=	8.
	MINERAL 1-----TRANSIT TIME	=	55.7888
	MINERAL 2-----MATRIX DENSITY	=	2.9888
	MINERAL 2-----HYDROGEN INDEX	=	8.
	MINERAL 2-----TRANSIT TIME	=	51.
	MUD FILTRATE DENSITY	=	1.
***	MUD FILTRATE SALINITY	=	6518.7227
***	MUD FILTRATE DENSITY	=	1.8846
***	MUD FILTRATE HYDROGEN INDEX	=	8.9988
	HYDROCARBON DENSITY	=	1.
***	HYDROCARBON HYDROGEN INDEX	=	1.
	FLUID TRANSIT TIME	=	189.
BAD HOLE CONSTANTS	MAXIMUM HOLESIZE	=	14.5888
	MAXIMUM DENSITY CORR.	=	8.2588
	SONIC LIMIT?(1=YES)	=	1.
	DELTA T AT 8 POROSITY	=	8.
	DELTA T AT 28X POROSITY-	=	8.
	DELTA T MATRIX	=	55.7888
	DELTA T FLUID	=	189.

AUSTRALIA WELL TILANA NO. 1 RUN 2

*****SHALE PARAMETERS*****

SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS

ZONE NUMBER	=	3.	
ZONE TOP	=	7581.	
ZONE BOTTOM	=	9358.	
SHALE PARAMETERS			
	RESISTIVITY	=	6.
	BOUND WATER-RWB	=	8.2588
	DENSITY	=	2.5588
	NEUTRON POROSITY	=	8.2888
	TRANSIT TIME	=	85.
SHALE INDICATORS	USE GAMMA RAY(1=YES)	=	8.
	GAMMA RAY-SHALE	=	8.
	GAMMA RAY-CLEAN	=	8.
	USE SP(1=YES)	=	8.
	SP -CLEAN	=	8.
	SP-SHALE	=	8.
	USE NEUTRON-DENSITY(1=YES)	=	1.
	NEUTRON PHI AT 2.78	=	-8.8788
	NEUTRON PHI AT 2.28	=	8.2388
	USE SONIC-DENSITY(1=YES)	=	8.
	TRANSIT TIME AT 2.78	=	8.
	TRANSIT TIME AT 2.28	=	8.
	USE NEUTRON-SONIC(1=YES)	=	8.
	TRANSIT TIME AT PHI=8	=	8.
	TRANSIT TIME AT PHI=28	=	8.
	USE NEUTRON PHI (1=YES)	=	8.
	CLEAN FORMATION PHI	=	8.
	USE RT (1=YES)	=	8.
	MAXIMUM RT,CLEAN	=	8.
	USE M-N CROSS-PLOT (1=YES)	=	8.
	POINT 1- M	=	8.6988
	- N	=	8.6588
	POINT 2- M	=	8.4588
	- N	=	8.7888

321036

 * AUSTRALIA WELL TILANA NO. 1 RUN 2 *
 * LISTING OPTIONS, NET PAY CUTOFFS AND RECALIBRATION *

* SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS *

* ZONE NUMBER	=	3.	
* ZONE TOP	=	7501.	
* ZONE BOTTOM	=	9350.	
* LISTINGS(1=YES)	LIST INPUT DATA	=	B.
	LIST SHALE INDICATORS	=	B.
	LIST ACTUAL CALCULATIONS	=	B.
	LIST NET PAY	=	B.
* PAY SUBJECT TO	POROSITY GREATER THAN	=	B.1000
	SW LESS THAN OR EQUAL TO	=	B.5000
	VSHALE LESS THAN	=	B.5000
	SW/SXO RATIO LESS THAN	=	B.7000
	TOP OF PAY INTERVAL	=	N.A.
	BOTTOM OF PAY INTERVAL	=	9350.
* LOG ADJUSTMENTS	DI FACTOR CNL TO DENSITY	=	1.
	OLD DENSITY-POINT 1	=	B.
	NEW DENSITY-POINT 1	=	B.
	OLD DENSITY-POINT 2	=	B.
	NEW DENSITY-POINT 2	=	B.
	OLD NEUTRON PHI-POINT 1	=	B.
	NEW NEUTRON PHI-POINT 1	=	B.
	OLD NEUTRON PHI-POINT 2	=	B.
	NEW NEUTRON PHI-POINT 2	=	B.
	OLD TRANSIT TIME-POINT 1	=	B.
	NEW TRANSIT TIME-POINT 1	=	B.
	OLD TRANSIT TIME-POINT 2	=	B.
	NEW TRANSIT TIME-POINT 2	=	B.

321037

 * AUSTRALIA WELL TILANA NO. 1 RUN 3 *
 * ***** JOB CONTROL PARAMETERS ***** *

* SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS *

* *****TOP OF COMPUTATION INTERVAL	=	9349.	*
* *****BOTTOM OF COMPUTATION INTERVAL	=	12798.	*
* *****COMPUTATION INCREMENT	=	8.5888	*
* *****INTERPRETATION PROCEDURE	=	6.	*
* *****PLOT PRESENTATION	=	2.	*
* *****INPUT TAPEFILE	=	33782.	*
* *****COMPUTED RESULTS STORED ON TAPEFILE	=	33783.	*

 * AUSTRALIA WELL TILANA NO. 1 RUN 3 *
 * HOLE CONSTANTS AT TIME OF LOGGING *

* SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS *

* SURVEY NUMBER	=	3.	*
* SURVEY TOP	=	9358.	*
* SURVEY BOTTOM	=	12795.	*
* BIT SIZE	=	12.2588	*
* MUD WEIGHT	=	9.9888	*
* MUD RESISTIVITY, MEASURED	=	8.3578	*
* MUD TEMPERATURE	=	95.	*
* MUD FILTRATE RESISTIVITY(RMF)	=	8.3898	*
* MUD FILTRATE TEMPERATURE.	=	72.	*
* MAXIMUM RECORDED TEMPERATURE	=	232.	*

321038

AUSTRALIA WELL TILANA NO. 1 RUN 3
 POROSITY AND WATER SATURATION PARAMETERS

SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS

ZONE NUMBER	=	4.	
ZONE TOP	=	9358.	
ZONE BOTTOM	=	18468.	
SW			
EQUATION NO.	=		6.
FORMATION FACTOR -A-	=		1.
CEMENTATION EXPONENT -M-	=		9.
WATER SATURATION EXPONENT -N-	=		2.
FORMATION WATER RESISTIVITY -RW-	=		8.1888
TEMP. OF FORM. WATER RESISTIVITY	=		158.
SXO=SW**X WHERE X	=		8.2888
SVB=VSH**Y WHERE Y	=		8.6888
AVG. MEAN SURFACE TEMP.	=		58.
*** FORMATION TEMPERATURE	=	198.8917	
*** TEMPERATURE GRADIENT DEG/100 FT.	=	1.4224	
*** RW AT FORMATION TEMPERATURE	=	8.8793	
*** RMF AT FORMATION TEMPERATURE	=	8.1234	
POROSITY			
MODEL	=		2.
MAXIMUM POROSITY	=		8.3588
COMPUTE SECONDARY POROSITY?	=		8.
MINERAL 1----- MATRIX DENSITY	=		2.6588
MINERAL 1-----HYDROGEN INDEX	=		8.
MINERAL 1-----TRANSIT TIME	=		55.7888
MINERAL 2-----MATRIX DENSITY	=		2.9888
MINERAL 2-----HYDROGEN INDEX	=		8.
MINERAL 2-----TRANSIT TIME	=		51.
MUD FILTRATE DENSITY	=		1.
*** MUD FILTRATE SALINITY	=	28562.8633	
*** MUD FILTRATE DENSITY	=	1.8144	
*** MUD FILTRATE HYDROGEN INDEX	=	8.9935	
HYDROCARBON DENSITY	=		1.
*** HYDROCARBON HYDROGEN INDEX	=		1.
FLUID TRANSIT TIME	=		189.
BAD HOLE CONSTANTS			
MAXIMUM HOLESIZE	=		18.
MAXIMUM DENSITY CORR.	=		8.2588
SONIC LIMIT?(1=YES)	=		1.
DELTA T AT 8 POROSITY	=		8.
DELTA T AT 28% POROSITY	=		8.
DELTA T MATRIX	=		55.7888
DELTA T FLUID	=		189.

AUSTRALIA WELL TILANA NO. 1 RUN 3

*****SHALE PARAMETERS*****

SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS

ZONE NUMBER	=	4.	
ZONE TOP	=	935#.	
ZONE BOTTOM	=	1846#.	
SHALE PARAMETERS	RESISTIVITY	=	6.
	BOUND WATER-RWB	=	#.3000
	DENSITY	=	2.5500
	NEUTRON POROSITY	=	#.2800
	TRANSIT TIME	=	85.
SHALE INDICATORS	USE GAMMA RAY(1=YES)	=	#.
	GAMMA RAY-SHALE	=	#.
	GAMMA RAY-CLEAN	=	#.
	USE SP(1=YES)	=	#.
	SP -CLEAN	=	#.
	SP-SHALE	=	#.
	USE NEUTRON-DENSITY(1=YES)	=	1.
	NEUTRON PHI AT 2.7#	=	-#.0700
	NEUTRON PHI AT 2.2#	=	#.2300
	USE SONIC-DENSITY(1=YES)	=	#.
	TRANSIT TIME AT 2.7#	=	#.
	TRANSIT TIME AT 2.2#	=	#.
	USE NEUTRON-SONIC(1=YES)	=	#.
	TRANSIT TIME AT PHI=#	=	#.
	TRANSIT TIME AT PHI=2#	=	#.
	USE NEUTRON PHI (1=YES)	=	#.
	CLEAN FORMATION PHI	=	#.
	USE RT (1=YES)	=	#.
	MAXIMUM RT,CLEAN	=	#.
	USE M-N CROSS-PLOT (1=YES)	=	#.
	POINT 1- M	=	#.8500
	- N	=	#.6600
	POINT 2- M	=	#.7900
	- N	=	#.5050

321040

 * AUSTRALIA WELL TILANA NO. 1 RUN 3 *
 * LISTING OPTIONS, NET PAY CUTOFFS AND RECALIBRATION *
 * *****

* SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS *

* ZONE NUMBER	=	4.	
* ZONE TOP	=	935 B .	
* ZONE BOTTOM	=	1846 B .	
* LISTINGS(1=YES)	LIST INPUT DATA	=	B.
	LIST SHALE INDICATORS	=	B.
	LIST ACTUAL CALCULATIONS	=	B.
	LIST NET PAY	=	B.
* PAY SUBJECT TO	POROSITY GREATER THAN	=	B.1888
	SW LESS THAN OR EQUAL TO	=	B.5888
	VSHALE LESS THAN	=	B.5888
	SW/SXO RATIO LESS THAN	=	B.7888
	TOP OF PAY INTERVAL	=	935 B .
	BOTTOM OF PAY INTERVAL	=	
* LOG ADJUSTMENTS	DI FACTOR CNL TO DENSITY	=	1.
	OLD DENSITY-POINT 1	=	B.
	NEW DENSITY-POINT 1	=	B.
	OLD DENSITY-POINT 2	=	B.
	NEW DENSITY-POINT 2	=	B.
	OLD NEUTRON PHI-POINT 1	=	B.
	NEW NEUTRON PHI-POINT 1	=	B.
	OLD NEUTRON PHI-POINT 2	=	B.
	NEW NEUTRON PHI-POINT 2	=	B.
	OLD TRANSIT TIME-POINT 1	=	B.
	NEW TRANSIT TIME-POINT 1	=	B.
	OLD TRANSIT TIME-POINT 2	=	B.
	NEW TRANSIT TIME-POINT 2	=	B.

AUSTRALIA WELL TILANA NO. 1 RUN 3
 POROSITY AND WATER SATURATION PARAMETERS

SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS

ZONE NUMBER	=	5.	
ZONE TOP	=	18461.	
ZONE BOTTOM	=	12788.	
SW	EQUATION NO.	=	6.
	FORMATION FACTOR -A-	=	1.
	CEMENTATION EXPONENT -M-	=	9.
	WATER SATURATION EXPONENT -N-	=	2.
	FORMATION WATER RESISTIVITY -RW--	=	0.1000
	TEMP. OF FORM. WATER RESISTIVITY-	=	212.
	SXO=SW**X WHERE X	=	0.2000
	SWB=VSH**Y WHERE Y	=	0.6000
	AVG. MEAN SURFACE TEMP.	=	50.
***	FORMATION TEMPERATURE	=	215.3504
***	TEMPERATURE GRADIENT DEG/100 FT.	=	1.4224
***	RW AT FORMATION TEMPERATURE	=	0.0985
***	RMF AT FORMATION TEMPERATURE	=	0.1098
POROSITY	MODEL	=	2.
	MAXIMUM POROSITY	=	0.3500
	COMPUTE SECONDARY POROSITY?	=	0.
	MINERAL 1----- MATRIX DENSITY	=	2.6500
	MINERAL 1-----HYDROGEN INDEX	=	0.
	MINERAL 1-----TRANSIT TIME	=	55.7000
	MINERAL 2-----MATRIX DENSITY	=	2.9800
	MINERAL 2-----HYDROGEN INDEX	=	0.
	MINERAL 2-----TRANSIT TIME	=	51.
	MUD FILTRATE DENSITY	=	1.
***	MUD FILTRATE SALINITY	=	20562.8633
***	MUD FILTRATE DENSITY	=	1.0144
***	MUD FILTRATE HYDROGEN INDEX	=	0.9935
	HYDROCARBON DENSITY	=	1.
***	HYDROCARBON HYDROGEN INDEX	=	1.
	FLUID TRANSIT TIME	=	189.
BAD HOLE CONSTANTS	MAXIMUM HOLESIZE	=	16.
	MAXIMUM DENSITY CORR.	=	0.0600
	SONIC LIMIT?(1=YES)	=	1.
	DELTA T AT 0 POROSITY	=	0.
	DELTA T AT 20% POROSITY-	=	0.
	DELTA T MATRIX	=	55.7000
	DELTA T FLUID	=	189.

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AUSTRALIA WELL TILANA NO. 1 RUN 3

*****SHALE PARAMETERS*****

SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS

ZONE NUMBER	=	5.	
ZONE TOP	=	10461.	
ZONE BOTTOM	=	12788.	
SHALE PARAMETERS			
	RESISTIVITY	=	10.
	BOUND WATER-RWB	=	0.5000
	DENSITY	=	2.6600
	NEUTRON POROSITY	=	0.3300
	TRANSIT TIME	=	85.
SHALE INDICATORS	USE GAMMA RAY(1=YES)	=	0.
	GAMMA RAY-SHALE	=	0.
	GAMMA RAY-CLEAN	=	0.
	USE SP(1=YES)	=	0.
	SP -CLEAN	=	0.
	SP-SHALE	=	0.
	USE NEUTRON-DENSITY(1=YES)	=	1.
	NEUTRON PHI AT 2.70	=	-0.0700
	NEUTRON PHI AT 2.20	=	0.2300
	USE SONIC-DENSITY(1=YES)	=	0.
	TRANSIT TIME AT 2.70	=	0.
	TRANSIT TIME AT 2.20	=	0.
	USE NEUTRON-SONIC(1=YES)	=	0.
	TRANSIT TIME AT PHI=0	=	0.
	TRANSIT TIME AT PHI=20	=	0.
	USE NEUTRON PHI (1=YES)	=	0.
	CLEAN FORMATION PHI	=	0.
	USE RT (1=YES)	=	0.
	MAXIMUM RT,CLEAN	=	0.
	USE M-N CROSS-PLOT (1=YES)	=	0.
	POINT 1- M	=	0.8500
	- N	=	0.6600
	POINT 2- M	=	0.7900
	- N	=	0.5050

 * AUSTRALIA WELL TILANA NO. 1 RUN 3 *
 * LISTING OPTIONS, NET PAY CUTOFFS AND RECALIBRATION *

* SUMMARY OF IMPORTANT CONSTANTS USED AND/OR COMPUTED IN THIS ANALYSIS *

* ZONE NUMBER	=	5.	
* ZONE TOP	=	18461.	
* ZONE BOTTOM	=	12788.	
* LISTINGS(1=YES)	LIST INPUT DATA	=	S.
	LIST SHALE INDICATORS	=	S.
	LIST ACTUAL CALCULATIONS	=	S.
	LIST NET PAY	=	S.
* PAY SUBJECT TO	POROSITY GREATER THAN	=	S.1888
	SW LESS THAN OR EQUAL TO	=	S.5888
	VSHALE LESS THAN	=	S.5888
	SW/SXO RATIO LESS THAN	=	S.7888
	TOP OF PAY INTERVAL	=N.A.	
	BOTTOM OF PAY INTERVAL	=	12788.
* LOG ADJUSTMENTS	DI FACTOR CNL TO DENSITY	=	1.
	OLD DENSITY-POINT 1	=	S.
	NEW DENSITY-POINT 1	=	S.
	OLD DENSITY-POINT 2	=	S.
	NEW DENSITY-POINT 2	=	S.
	OLD NEUTRON PHI-POINT 1	=	S.
	NEW NEUTRON PHI-POINT 1	=	S.
	OLD NEUTRON PHI-POINT 2	=	S.
	NEW NEUTRON PHI-POINT 2	=	S.
	OLD TRANSIT TIME-POINT 1	=	S.
	NEW TRANSIT TIME-POINT 1	=	S.
	OLD TRANSIT TIME-POINT 2	=	S.
	NEW TRANSIT TIME-POINT 2	=	S.

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APPENDIX 2

**AVERAGE POROSITY AND WATER
SATURATION DATA**

SIMCOM LOG ANALYSIS - DST INTERVAL ANALYSIS**INTERVAL 3042M - 3048M**

TOP INTERVAL	BOTTOM INTERVAL	POROSITY	WATER SATURATION
3042.0	3042.5	2.0	96.0
3042.5	3043.0	7.5	81.0
3043.0	3043.5	11.0	70.0
3043.5	3044.0	15.0	61.0
3044.0	3044.5	14.5	62.0
3044.5	3045.0	11.5	69.5
3045.0	3045.5	14.0	63.0
3045.5	3046.0	13.5	65.0
3046.0	3046.5	12.0	68.0
3046.5	3047.0	11.0	72.0
3047.0	3047.5	11.0	73.0
3047.5	3048.0	7.5	88.0
	AVERAGES	10.9	72.4

SIMCOM LOG ANALYSIS - DST INTERVAL ANALYSIS**INTERVAL 3071M - 3075M**

TOP INTERVAL	BOTTOM INTERVAL	POROSITY	WATER SATURATION
3071.0	3071.5	9.0	70.0
3071.5	3072.0	12.5	64.0
3072.0	3072.5	12.0	66.0
3072.5	3073.0	10.5	71.0
3073.0	3073.5	11.0	69.0
3073.5	3074.0	16.0	56.0
3074.0	3074.5	10.0	72.0
3074.5	3075.0	3.0	92.0
	AVERAGES	10.5	70.0

SIMCOM LOG ANALYSIS - DST INTERVAL ANALYSIS**INTERVAL 3179M - 3185M**

TOP INTERVAL	BOTTOM INTERVAL	POROSITY	WATER SATURATION
3179.0	3179.5	8.0	92.0
3179.5	3180.0	9.0	85.0
3180.0	3180.5	6.5	98.0
3180.5	3181.0	4.0	100.0
3181.0	3181.5	8.0	92.0
3181.5	3182.0	7.5	97.0
3182.0	3182.5	9.0	84.0
3182.5	3183.0	14.0	66.0
3183.0	3183.5	13.0	64.0
3183.5	3184.0	13.0	32.0
3184.0	3184.5	12.0	55.0
3184.5	3185.0		
	AVERAGES	9.5	78.6

APPENDIX 3
SIDEWALL CORE DATA

SUMMARY OF SIDEWALL CORE DESCRIPTIONS

PAGE 10a

WELL: TILAMA NO. 1
DATE: OCTOBER 11, 1985

SERVICE COMPANY: SCHLUMBERGER

LOG SUITE NO. 2

GEOLOGIST: C. E. REVILLA

RUN NO: 1

SHOT: 51

RECOVERED: 51

SHOT NO	DEPTH (M)	PULL (LBS)	REC'D (CM)	CONDTH (STATE)	ROCK TYPE	STAIN	OIL FLUOR %	CUT	CRUSH CUT	VIS. POR. %
1	3065	638	3.2	BROKEN	CLAYSTONE	-	-	-	-	
2	3060	830	2.5	BROKEN	CLAYSTONE	-	-	-	-	
3	3036	155	2.5	INTACT	SILTSTONE	-	-	-	TR YEL RESIDUE	5
4	3004	1049	2.5	INTACT	SILTSTONE	-	-	-	-	8
5	2974	677	3	INTACT	SANDSTONE	-	-	-	-	5
6	2967	177	1.9	INTACT	SANDSTONE	-	-	-	-	10
7	2945	151	2.0	INTACT	CLAYSTONE	-	-	-	-	
8	2907	170	2.5	INTACT	CLAYSTONE	-	-	-	-	
9	2863	516	2.8	INTACT	SANDSTONE	-	-	-	-	8-10
10	2829	190	2.5	INTACT	CLAYSTONE	-	-	-	-	
11	2776	184	2.5	BROKEN	CLAYSTONE	-	-	-	-	
12	2751	832	3.2	BROKEN	CLAYSTONE	-	-	-	-	
13	2707	107	2.5	INTACT	CLAYSTONE/ALTERED VOLCANIC ASH(??)	-	-	-	-	
14	2667	92	2.5	BROKEN	CLAYSTONE	-	-	-	-	
15	2637.5	200	1.8	INTACT	CLAYSTONE	-	-	-	-	
16	2610	613	2.5	INTACT	CLAYSTONE	-	-	-	-	

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SUMMARY OF SIDEWALL CORE DESCRIPTIONS

PAGE 10b

WELL: TILAMA NO. 1

LOG SUITE NO. 2

RUN NO: 1

SHOT: 51

RECOVERED: 51

DATE: OCTOBER 11, 1985

SERVICE COMPANY: SCHLUMBERGER

GEOLOGIST: C E REVILLA

SHOT NO	DEPTH (M)	PULL (LBS)	REC'D (CM)	CONDTM (STATE)	ROCK TYPE	STAIN	OIL FLUOR %	CUT	CRUSH CUT	VIS. POR. %
17	2579	108	2.5	INTACT	CLAYSTONE	-	-	-	-	-
18	2549	203	2.0	BROKEN	CLAYSTONE	-	-	-	-	-
19	2514	131	3.2	BROKEN	CLAYSTONE	-	-	-	-	-
20	2486	107	2.0	BROKEN	CLAYSTONE	-	-	-	-	-
21	2464	97	2.5	INTACT	CLAYSTONE	-	-	-	-	-
22	2435	793	3.3	INTACT	CLAYSTONE	-	-	-	-	-
23	2403	100	2.5	BROKEN	SANDSTONE	-	-	-	-	10
24	2377.5	132	1.9	BROKEN	CLAYSTONE	-	-	-	-	-
25	2356	108	2.0	INTACT	CLAYSTONE	-	-	-	-	-
26	2330	594	3.8	INTACT	CLAYSTONE AND SANDSTONE, LAMINAE	-	-	-	-	5
27	2298	108	2.5	INTACT	CLAYSTONE	-	-	-	-	-
28	2268	331	2.3	INTACT	CLAYSTONE	-	-	-	-	-
29	1969	512	3.6	INTACT	CLAYSTONE	-	-	-	-	-
30	1941	891	4.1	INTACT	CLAYSTONE	-	-	-	-	-
31	1911	188	5.1	INTACT	CLAYSTONE	-	-	-	-	-
32	1883	128	4.1	INTACT	CLAYSTONE/ALTERED VOLCANIC ASH OR TUFF??	-	-	-	-	-

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SUMMARY OF SIDEWALL CORE DESCRIPTIONS

PAGE 10f

WELL: TILAMA NO. 1
DATE: OCTOBER 31, 1985

LOG SUITE NO. 3
SERVICE COMPANY: SCHLUMBERGER

RUN NO: 3
GEOLOGIST: G. M. KJELLGREN

SHOT: 30
RECOVERED: 28

SHOT NO	DEPTH (M)	PULL (LBS)	REC'D (CM)	CONDTN (STATE)	ROCK TYPE	STAIN	OIL FLUOR %	CUT	CRUSH CUT	VIS. POR. %
56	3811	340	2.5	V. POOR	ALTERED BASALT	-	-	-	-	-
57	3751	130	1	GOOD	CLAYSTONE/SANDSTONE	-	-	-	-	10-25
58	3706	764	2	GOOD	CLAYSTONE	-	-	-	-	-
59	3690.6	143	2	POOR	CLAYSTONE	-	-	-	-	-
60	3621	1010	3	GOOD	CLAYSTONE	-	-	-	-	-
61	3584	756	2	GOOD	CLAYSTONE	-	-	-	-	-
62	3574	72	2	GOOD	CLAYEY SANDSTONE	-	-	-	-	10-20
63	3546.5	1020	2.5	GOOD	CLAYSTONE WITH COAL	-	TR	YES	YES	-
64	3407.5	1939	3	GOOD	ALTERED BASALT	-	TR	-	-	-
65	3341	1939	3	GOOD	ALTERED BASALT	-	-	-	-	-
66	3283	205	2.5	GOOD	CLAYSTONE/COALY CLAYSTONE	-	-	-	-	-
67	3237.5	248	1.5	GOOD	CLAYSTONE	-	-	YES	YES	-
68	3227	NO REC								
69	3214	294	3	GOOD	SANDSTONE	-	-	-	-	20-25
70	3202	192	2.5	GOOD	CLAYSTONE	-	-	-	YES	-
71	3197.5	663	3	GOOD	SANDSTONE	PATCHY	TR	YES	YES	15-20

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SUMMARY OF SIDEWALL CORE DESCRIPTIONS

PAGE 10g

WELL: TILANA NO. 1

LOG SUITE NO. 3

RUN NO: 3

SHOT: 30

RECOVERED: 28

DATE: OCTOBER 31, 1985

SERVICE COMPANY: SCHLUMBERGER

GEOLOGIST: G. M. KJELGREN

SHOT NO	DEPTH (M)	PULL (LBS)	REC'D (CM)	CONDTN (STATE)	ROCK TYPE	STAIN	OIL FLUOR %	CUT	CRUSH CUT	VIS. POR. %
72	3183	127	3	GOOD	SANDSTONE	-	-	-	-	15-25
73	3105	156	2.5	GOOD	CLAYSTONE	-	-	-	-	-
74	3094	354	4	GOOD	SANDSTONE	PATCHY	20-25	YES	YES	15-25
75	3084	444	2.5	GOOD	SANDSTONE/COAL	PATCHY	50-60	-	YES	20-25
76	3080	1302	2.5	GOOD	CLAYSTONE	-	-	-	YES	-
77	3074	1175	3	GOOD	SANDSTONE/COAL	TR	TR	-	YES	20-25
78	3072.5	894	3	GOOD	SANDSTONE	PATCHY	TR	-	-	20-25
79	3068	NO REC								
80	3047	510	2	GOOD	SANDSTONE	PATCHY	-	-	-	15-25
81	3044	362	3	GOOD	SANDSTONE/CLAYSTONE	EVEN	-	-	-	10-20
82	3037	1912	3	GOOD	SANDSTONE	PATCHY	-	-	-	20-25
83	3031.5	2048	3	GOOD	SANDSTONE	TR	-	-	-	15-20
84	3020.4	578	1.5	GOOD	SANDSTONE	TR	TR	-	-	15-25
85	2994.6	434	2	GOOD	SANDSTONE	TR	-	-	-	25

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APPENDIX 4

CORE LABORATORIES FLUID ANALYSIS

AMOCO AUSTRALIA PETROLEUM CO.

TILANA #1

RESERVOIR FLUID ANALYSIS

Petroleum Reservoir Engineering



321058

321059

4 Marlow Road, Keswick, South Australia 5035. Tel: 2970777. Telex: AA87011

CORE LABORATORIES
Petroleum Reservoir Engineering



11th February, 1986

AMOCO AUSTRALIA PETROLEUM CO,
Level 12,
15 Blue Street,
NORTH SYDNEY, N.S.W. 2060

Attention : Mr. C.W. Waring

Subject : Reservoir Fluid Analysis
Well : Tilana #1
File : AFL 85076

Dear Sir,

Subsurface fluid samples were collected from the subject well and submitted to our Adelaide laboratory for analysis. Presented in the following report are the results of this analysis.

The contents of bottom-hole sampler 280 and 281 were transferred into special high pressure PVT cylinders to facilitate analysis.

The two bottom-hole samplers were found to contain gas and formation water and cylinder OBHS 29 contained only formation water.

Water analysis was performed on all formation water samples and the hydrocarbon composition of gas within the bottom hole samplers was performed by routine chromatography.

We thank Amoco Australia Petroleum Co. for the opportunity to be of service. Please do not hesitate in contacting us should you require any further information.

Yours sincerely,

A handwritten signature in black ink, appearing to read "Jan Bon", written over the typed name.

Jan Bon,
Manager.

JB/gm/dc

CORE LABORATORIES
Petroleum Reservoir Engineering

Page : 1 of 5
File : AFL 85076
Well : Tilana #1

WATER ANALYSIS - BOTTOM HOLE SAMPLER #280

CHEMICAL COMPOSITION

<u>Cations</u>		<u>Mg/L</u>	<u>Me/L</u>
Calcium	(Ca)	45.0	2.25
Magnesium	(Mg)	12.0	0.987
Sodium	(Na)	2590	113
Potassium	(K)	70.0	1.79
<u>Anions</u>		<u>Mg/L</u>	<u>Me/L</u>
Hydroxide	(OH)		
Carbonate	(CO ₃)		
Bicarbonate	(HCO ₃)	4930	80.8
Sulphate	(SO ₄)	680	14.2
Chloride	(Cl)	1710	48.2
Nitrate	(NO ₃)	100	1.61

TOTALS AND BALANCE

Cations	(Me/L)	118	Diff = 27.1
Anions	(Me/L)	145	Sum = 262

Diff*100./Sum = 10.3%

Sodium / Total Cation Ratio = 95.7%

Remarks

Imbalance due to presence of iron, boron and traces.

DERIVED DATA

<u>Total Dissolved Solids</u>	<u>Mg/L</u>
A. Based on E.C.	6090
B. Calculated (HCO ₃ =CO ₃)	7630
Total Hardness	162
Carbonate hardness	162
Non-Carbonate Hardness	
Total Alkalinity	4040
(Each as CaCO ₃)	

UNITS

Reaction - PH	7.5
<u>Conductivity (E.C.)</u>	
Micro-S/Cm at 25°C	10000
Resistivity OHM/M at 25°C	1.00

N.B. Mg/L = Milligrams per litre
Me/L = Milliequivs per litre

CORE LABORATORIES
Petroleum Reservoir Engineering

Page : 2 of 5
File : AFL 85076
Well : Tilana #1

WATER ANALYSIS - BOTTOM HOLE SAMPLER #281

CHEMICAL COMPOSITION

<u>Cations</u>		<u>Mg/L</u>	<u>Me/L</u>
Calcium	(Ca)	40.0	2.00
Magnesium	(Mg)	53.0	4.36
Sodium	(Na)	2470	107
Potassium	(K)	51.0	1.56
<u>Anions</u>		<u>Mg/L</u>	<u>Me/L</u>
Hydroxide	(OH)		
Carbonate	(CO ₃)	524	17.5
Bicarbonate	(HCO ₃)	3520	57.7
Sulphate	(SO ₄)	660	13.7
Chloride	(Cl)	2500	70.5
Nitrate	(NO ₃)	98.0	1.58

TOTALS AND BALANCE

Cations (Me/L)	115	Diff =	45.7
Anions (Me/L)	161	Sum =	276

Diff*100./Sum = 16.5%

Sodium / Total Cation Ratio = 93.1%

Remarks

Imbalance due to presence of iron, aluminium and traces.

DERIVED DATA

<u>Total Dissolved Solids</u>	<u>Mg/L</u>
A. Based on E.C.	7360
B. Calculated (HCO ₃ =CO ₃)	8140
<u>Total Hardness</u>	318
Carbonate hardness	318
Non-Carbonate Hardness	
<u>Total Alkalinity</u>	3760
(Each as CaCO ₃)	

UNITS

Reaction - PH	9.2
<u>Conductivity (E.C.)</u>	
Micro-S/Cm at 25°C	11900
Resistivity OHM/M at 25°C	0.840

N.B. Mg/L = Milligrams per litre
Me/L = Milliequivalents per litre

CORE LABORATORIES
Petroleum Reservoir Engineering

Page : 3 of 5
File : AFL 85076
Well : Tilana #1

WATER ANALYSIS - CYLINDER #OBHS 29

CHEMICAL COMPOSITION

<u>Cations</u>		<u>Mg/L</u>	<u>Me/L</u>
Calcium	(Ca)	390	19.5
Magnesium	(Mg)	1300	107
Sodium	(Na)	11700	509
Potassium	(K)	330	8.44
<u>Anions</u>		<u>Mg/L</u>	<u>Me/L</u>
Hydroxide	(OH)		
Carbonate	(CO3)	24.2	0.805
Bicarbonate	(HCO3)	119	1.95
Sulphate	(SO4)	2900	60.4
Chloride	(Cl)	19700	557
Nitrate	(NO3)	2.3	0.037

TOTALS AND BALANCE

Cations	(Me/L)	644	Diff = 24.0
Anions	(Me/L)	620	Sum = 1260

Diff*100./Sum = 1.90%

Sodium / Total Cation Ratio = 79.1%

Remarks

DERIVED DATA

	<u>Mg/L</u>
<u>Total Dissolved Solids</u>	
A. Based on E.C.	37500
B. Calculated (HCO3=CO3)	36400
Total Hardness	6320
Carbonate hardness	97.6
Non-Carbonate Hardness	6230
Total Alkalinity (Each as CaCO3)	138

UNITS

Reaction - PH	8.6
<u>Conductivity (E.C.)</u>	
Micro-S/Cm at 25°C	47000
Resistivity OHM/M at 25°C	0.213

N.B. Mg/L = Milligrams per litre
Me/L = Milliequivs per litre

CORE LABORATORIES
Petroleum Reservoir Engineering

Page : 4 of 5
File : AFL 85076
Well : Tilana #1

HYDROCARBON ANALYSIS OF GAS SAMPLE

Test Cylinder #:

280

<u>Component</u>	<u>Mol Percent</u>	<u>GPM</u>
Hydrogen Sulphide	0.00	
Carbon Dioxide	8.86	
Nitrogen	1.43	
Methane	80.04	
Ethane	4.81	1.283
Propane	2.71	0.744
iso-Butane	0.60	0.196
n-Butane	0.65	0.204
iso-Pentane	0.23	0.084
n-Pentane	0.19	0.069
Hexanes	0.11	0.045
Heptanes plus	0.37	0.168
	<u>100.00</u>	<u>2.793</u>

Gas gravity (Air = 1.000):

0.735

Gross heating value (BTU
per cubic foot of dry gas
@ 14.696 psia and 60°F):

1045

HYDROCARBON ANALYSIS OF GAS SAMPLE

Test Cylinder #:

281

<u>Component</u>	<u>Mol Percent</u>	<u>GPM</u>
Hydrogen Sulphide	0.00	
Carbon Dioxide	0.19	
Nitrogen	5.89	
Methane	79.67	
Ethane	6.32	1.686
Propane	3.93	1.079
iso-Butane	0.75	0.245
n-Butane	0.84	0.264
iso-Pentane	0.19	0.069
n-Pentane	0.13	0.047
Hexanes	0.02	0.008
Heptanes plus	2.07	0.937
	<u>100.00</u>	<u>4.335</u>

Gas gravity (Air = 1.000):

0.741

Gross heating value (BTU
per cubic foot of dry gas
@ 14.696 psia and 60°F):

1198

321065

APPENDIX 5
OTIS WELL TEST REPORTS

321066

OTIS SERVICES

WELL TEST REPORT

AMOCO AUSTRALIA PETROLEUM COMPANY
WELL : TILANA #1
RIG : DIAMOND M. EPOCH
AREA : BASS STRAIT
DST#s : 1, 2, 3 & 4
03RD - 22ND NOVEMBER 1985



A Halliburton Company

321067

OTIS

P.O. BOX 269 JURONG TOWN POST OFFICE
SINGAPORE 9161

TELEPHONE: 2619581
TELEX : RS 21229
CABLE : SINGOTIS

13TH DECEMBER 1985

AMOCO AUSTRALIA LIMITED
15 BLUE STREET
SYDNEY
NEW SOUTH WALES 2000
AUSTRALIA

Dear Sir,

Please find attached the Otis Well Test Report for the drill stem tests conducted on your well, TILANA #1, during 03RD NOVEMBER - 22ND NOVEMBER 1985.

We, at Otis, are continually striving to improve the content and format of our Well Test Reports and trust that our standard format report is acceptable and contains all the information you require. However should you have any queries, or improvement that you would like to see incorporated into our report, please do not hesitate to contact the WTS Department at our SALE/PERTH OFFICE in AUSTRALIA.

It has been a pleasure working with AMOCO AUSTRALIA PETROLEUM COMPANY on this well, and we hope we may continue to be of service to you in the future.

Yours sincerely,
OTIS ENGINEERING CORPORATION

A Woolham

ANTHONY WOOLHAM/DAVE MUMFORD
Well Testing Services Department
AUSTRALIA

Otis Engineering Corporation



A HALLIBURTON Company

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TEST OBJECTIVE

The test objective for TILANA #1 was to conduct drill stem tests on the zones specified by the representative of AMOCO AUSTRALIA PETROLEUM COMPANY encompassing the following:-

1. To determine the initial reservoir pressure.
2. To determine reservoir parameters of Kh, skin, boundaries and changes in these parameters within the radius of investigation of the test.
3. To obtain representative water samples, if produced, to determine R_w and composition. Other tests may also be conducted on the sample.
4. To determine well productivity.
5. To compile an Otis computerised Well Test Report.

TEST NO.	INTERVAL	FORMATION	THICKNESS
1	3179 - 3185 METRES	SANDSTONE	6 METRES
2	3179 - 3185 METRES	SANDSTONE	6 METRES
3	3179 - 3185 METRES	SANDSTONE	6 METRES
4	3071 - 3075 METRES	SANDSTONE	4 METRES

DESCRIPTION OF OPERATIONS

COMPANY : AMOCO AUSTRALIA PETROLEUM CO.
WELL : TILANA #1
DST NO. : 1
FORMATION : SANDSTONE
INTERVAL TESTED : 3179 - 3185 METRES
DATE : 11TH NOVEMBER 1985

The test string was run in the hole and displaced with 129 bbls of salt water.

At 0534 hours the zone was perforated using 2-1/8 inch enerjet guns 0° phasing 4 SPF.

Immediately upon firing the guns there was a sudden loss of annulus pressure.

At 0537 hours with 20 PSI wellhead pressure the well was opened to the flare on a 32/64-inch adjustable choke for 6 minutes.

The well was shut in at the choke manifold and the rams opened. There was an immediate increase in pressure at the wellhead, indicating communication between the annulus and test string.

Pressure was applied to the annulus and a similar-like increase was observed at the wellhead.

At 0606 hours Schlumberger started pulling spent perforating guns out of the hole. On reaching surface it was found that the cable had been severed leaving the perforating guns downhole.

The annulus pressure was bled down and the rams opened. Weight was pulled on the test string indicating that the packer was still set and was not the cause of the annulus - test string communication.

The rams were closed and the salt water cushion was reverse circulated, ending DST#1.

DESCRIPTION OF OPERATIONS

COMPANY : AMOCO AUSTRALIA PETROLEUM CO.
WELL : TILANA #1
DST NO. : 2
FORMATION : SANDSTONE
INTERVAL TESTED : 3179 - 3185 METRES
DATE : 12TH NOVEMBER 1985

DST #2 is a re-run of DST #1.
 The test string was run in the hole and displaced with 129 bbls of salt water.

At 0800 hours pressure was applied to the annulus to open the LPR-N valve. There was no indication at the bubble hose that the valve had opened.
 The annulus was bled down and pressurized several times with still no positive indication of the LPR valve opening.

The Otis DHSIT and H.P. gauge were rigged up and run in the hole to determine the fluid depth.
 After establishing the fluid level had not changed the DHSIT and H.P. gauge were rigged down.

A CCL was run in the hole but was unable to pass 10,220 feet by wireline measurement indicating the LPR-N valve was still closed.
 The CCL was rigged down and annulus pressure was bled off and then re-applied numerous times in an attempt to open the LPR-N.

With no positive indication to show the LPR-N valve was open the annulus pressure was increased to 2000 PSI which activated the APR-N valve resulting in the test string being reverse circulated, ending DST #2.

DESCRIPTION OF OPERATIONS

COMPANY : AMOCO AUSTRALIA PETROLEUM CO.
 WELL : TILANA #1
 DST NO. : 3
 FORMATION : SANDSTONE
 INTERVAL TESTED : 3179 - 3185 METRES
 DATE : 13TH - 14TH NOVEMBER 1985

DST #3 is the continuation of DST #1 & #2.
 The test string was run in the hole and displaced with 129 bbls of salt water.

Pressure was applied to the annulus and a very weak and intermittent blow was observed at the bubble hose.
 After correcting a problem with losing annulus pressure, Schlumberger rigged up perforating guns and run in hole, but were unable to get the guns past 3035 metres.

The guns were rigged down and Otis wireline was run in the hole with a 2-inch gauge cutter. The gauge cutter was run down to 3185 metres without locating any obvious restriction. The gauge cutter was pulled out of the hole and a 2.125-inch blind box was rigged up and run to 3185 metres again without encountering any obvious restriction.
 The blind box was rigged down and the perforating guns run in the hole to depth.

At 0546 hours the zone was re-perforated with no indication of flow at the bubble hose.
 After rigging down spent perforating guns the Otis H.P. gauge was run in the hole to determine fluid level and for a gradient survey.

After establishing fluid level and fluid gradient 2 x 600 cc. bottom hole samplers were run in the hole to 7500 feet. The samplers were pulled to surface and one sampler opened. The sampler contained salt water only.

At 2240 hours the APR-A valve was opened reverse circulating the test string, ending DST #3.

DESCRIPTION OF OPERATIONS

COMPANY : AMOCO AUSTRALIA PETROLEUM CO.
 WELL : TILANA #1
 DST NO. : 4
 FORMATION : SANDSTONE
 INTERVAL TESTED : 3071 - 3075 METRES
 DATE : 19TH - 20TH NOVEMBER 1985

The test string was run in the hole and displaced with 99 bbls of salt water.

At 0654 hours the zone was perforated using 2-1/8inch enerjet guns 4 S.P.F. at 0° phasing, but with no indication at the bubble hose that the well was flowing.

After rigging down the spent perforating guns Schlumberger run in the hole with their Production Logging Tool.

The P.L.T. was pulled out of the hole and perforating guns run in but were unable to pass 2855 metres which indicated the guns were meeting a restriction round about the S.R.O. nipple.

The perforating guns were pulled to the surface and on close inspection sharp edges were noticed on a few of the bottom charges. These were filed down and the guns were run to depth without any problems.

At 2143 hours the 3042 - 3048 metres zone was perforated with no positive indication at the bubble hose the well was flowing.

The spent perforating guns were rigged down and the Otis lubricator rigged up and a bottom hole sampler, H.P. gauge and a CCL were run in the hole.

A bottom hole sample was taken at 10,080 feet and when opened at surface contained a slightly gaseous mud.

After conducting a gradient survey tandem bottom hole samplers, H.P. gauge and CCL were run in the hole and samples obtained across each set of perforations.

The Otis lubricator was rigged down and the test string reverse circulated, ending DST #4 and the testing programme for Tilana #1.



SEQUENCE OF OPERATIONS

OEC-872-1-B-SIN

TEST NUMBER

DST#1-4

RIG NAME

DIAMOND M. EPOCH

PAGE OF

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CUSTOMER AMOCO AUSTRALIA PETR. CO.		WELL NAME OR NUMBER TILANA #1	FIELD WILDCAT	AREA BASS STRAIT
CUSTOMER REPRESENTED BY MR. JOE GUILLERY / RICHARD BYHAM		OTIS TEST SUPERVISOR TONY WOOLHAM		

DATE	TIME	OPERATIONS
03NOV85		A. WOOLHAM DEPARTED PERTH. OVERNIGHT IN DEVONPORT
04NOV85		H. THOMAS DEPARTED SALE FOR DEVONPORT. WOOLHAM AND THOMAS ARRIVED ON BOARD RIG
		STARTED CHECK-OUT P.T. EQUIPMENT. CHAN AND WONG DEPARTED SINGAPORE
05NOV85		CHAN AND WONG ARRIVED ON BOARD RIG
		PRESSURE TESTED SUBSEA TEST TREE / SUBSEA LUBRICATOR VALVE / SURFACE TEST TREE
		AND CHOKE MANIFOLD TO 5000 PSI - O.K. SWING OUT BOOMS AND SECURE
		STARTED LAYING PIPEWORK TO BOOMS.
		HOOKED UP ELECTRIC TO TRANSFER PUMP AND TEST - O.K.
06NOV85		CONTINUED LAYING PIPEWORK.
		HOOKED UP ELECTRIC TO DIESEL BURNER AND TEST - O.K.
07NOV85	0020	PICKED UP SUBSEA TEST TREE TO RIG FLOOR AND TORQUED UP JOINTS
	0115	SUBSEA TEST TREE RUN IN HOLE FOR SPACE OUT
	0210	PICKED UP SUBSEA LUBRICATOR VALVE / TORQUED UP JOINTS AND RUN IN HOLE
	0230	FLUTED HANGER LANDED OFF IN WEAR BUSHING
		UNABLE TO CLOSE RAMS ON SLICK JT. STARTED TO PULL LANDING STRING OUT OF HOLE
	0310	RE-ADJUSTED FLUTED HANGER AND RUN SUBSEA TEST TREE IN HOLE
	0330	SUBSEA LUBRICATOR VALVE RUN IN HOLE
	0400	CLOSED RAMS ON SLICK JOINT - O.K.
	0410	CLOSED BALLS ON SUBSEA TEST TREE AND PRESSURE TESTED TO 3000 PSI - O.K.

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SEQUENCE OF OPERATIONS

OEC-872-1-B-SIN

TEST NUMBER

DST#1-4

RIG NAME

DIAMOND M. EPOCH

PAGE 2 OF 7

CUSTOMER	WELL NAME OR NUMBER	FIELD	AREA
AMOCO AUSTRALIA PETR. CO.	TILANA #1	WILDCAT	BASS STRAIT
CUSTOMER REPRESENTED BY	OTIS TEST SUPERVISOR		
MR. JOE GUILLERY / RICHARD BYHAM	TONY WOOLHAM		

DATE	TIME	OPERATIONS	
07NOV85	0420	OPENED BALLS ON SUBSEA TEST TREE / PUMPED CLOSE BALL ON SUBSEA LUBRICATOR V/V	1
		AND PRESSURE TESTED TO 3000 PSI - O.K.	2
	0510	BREAK OUT SUBSEA LUBRICATOR VALVE AND STAND BACK IN DERRICK	3
	0535	BREAK OUT SUBSEA TEST TREE AND STAND BACK IN DERRICK	4
		COMPLETED RIG IN OF FLOWLINES	5
		PRESSURE TESTED HEATER VALVES TO 5000 PSI - O.K.	6
		PRESSURE TESTED GAS - OIL DIVERTOR VALVES / SEPARATOR BODY / SEPARATOR INLET -	7
		BYPASSED VALVES. TANK INLET - BYPASSED VALVES AND OIL AND GAS FLOWLINES TO	8
		1000 PSI - O.K.	9
08NOV85	0145	PICKED UP SUBSEA TEST TREE AND RUN IN HOLE	10
	0300	PICKED UP SUBSEA LUBRICATOR VALVE AND RUN IN HOLE	11
	0335	PICKED UP SURFACE TEST TREE AND MADE UP TO TEST STRING	12
	0430	RIGGED UP SURFACE FLOWLINES	13
	0630	PRESSURE TESTED SURFACE FLOWLINES AGAINST HEATER VALVES TO 5000 PSI - O.K.	14
	0700	2-1/8 INCH GAUGE CUTTER RUN IN HOLE	15
		GAUGE CUTTER AND VARIOUS SCHLUMBERGER TOOLS UNABLE TO PASS 3038 METRES	16
	1600	BREAK OUT SURFACE FLOWLINES	17
	1645	BREAK OUT SURFACE TEST TREE AND LAID DOWN	18
	1725	BREAK OUT SUBSEA LUBRICATOR VALVE AND STAND BACK IN DERRICK	19

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SEQUENCE OF OPERATIONS

OEC-872-1-B-SIN

TEST NUMBER DST#1-4	RIG NAME DIAMOND M. EPOCH	PAGE 3	OF 7
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CUSTOMER AMOCO AUSTRALIA PETR. CO.	WELL NAME OR NUMBER TILANA #1	FIELD WILDCAT	AREA BASS STRAIT
CUSTOMER REPRESENTED BY MR. JOE GULLERY / RICHARD BYHAM		OTIS TEST SUPERVISOR TONY WOOLHAM	

DATE	TIME	OPERATIONS	
08NOV85	1745	BREAK OUT SUBSEA TEST TREE AND STAND BACK IN DERRICK	1
	2000	PRESSURE TESTED SURFACE TEST TREE TO 5000 PSI - O.K.	2
09NOV85		RIGGED IN NEW HANDRAILS ON BOTH BOOMS. FLUSHED THROUGH WATER LINES TO BURNERS	3
	2330	PICKED UP SUBSEA TEST TREE AND RUN IN HOLE	4
10NOV85	0005	PICKED UP SUBSEA LUBRICATOR VALVE AND RUN IN HOLE	5
	0015	MADE UP SURFACE TEST TREE TO TEST STRING	6
	0045	PRESSURE TESTED SURFACE FLOWLINES TO 5000 PSI - O.K.	7
	0145	2.125 INCH BLIND BOX RUN IN HOLE UNABLE TO PASS	8
	0400	2-INCH GAUGE CUTTER RUN IN HOLE AND JARRED UP RESTRICTION	9
	0630	SCHLUMBERGER STARTED TO RIG UP	10
	0740	PRESSURE TESTED LUBRICATOR	11
	0900	PERFORATING GUNS RUN IN HOLE	12
	1225	SCHLUMBERGER UNABLE TO CORRELATE. STARTED PULLING GUN OUT OF HOLE	13
	1340	SCHLUMBERGER RUN IN HOLE WITH GAMMA RAY / CASING COLLAR LOCATOR	14
	1435	SCHLUMBERGER PULLED OUT OF HOLE WITH GAMMA RAY AND CCL	15
	1710	SCHLUMBERGER RUN IN HOLE WITH GAMMA RAY AND CCL	16
	2010	SCHLUMBERGER PULLED OUT OF HOLE WITH GAMMA RAY AND CCL	17
11NOV85	0315	SCHLUMBERGER RIGGED UP PERFORATION TOOL	18
	0345	SCHLUMBERGER RUN IN HOLE WITH GUN	19

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SEQUENCE OF OPERATIONS

OEC-872-1-B-SIN

TEST NUMBER	RIG NAME	PAGE	OF
DST#1-4	DIAMOND M. EPOCH	4	7

CUSTOMER	WELL NAME OR NUMBER	FIELD	AREA
AMOCO AUSTRALIA PETR. CO.	TILANA #1	WILDCAT	BASS STRAIT
CUSTOMER REPRESENTED BY		OTIS TEST SUPERVISOR	
MR. JOE GUILLERY / RICHARD BYHAM		TONY WOOLHAM	

DATE	TIME	OPERATIONS	
11NOV85	0534	SCHLUMBERGER PERFORATED WELL. STARTED DST #1 (REFER FIELD RDGS. FOR DATA)	1
	0955	DST #1 - A MISRUN. TEST STRING REVERSE CIRCULATED	2
	1025	RIGGED DOWN SURFACE FLOWLINES	3
	1040	LAI D DOWN SURFACE TEST TREE	4
	1110	BREAK OUT SUBSEA LUBRICATOR VALVE AND STAND BACK IN DERRICK	5
	1125	BREAK OUT SUBSEA TEST TREE AND STAND BACK IN DERRICK	6
		PRESSURE TESTED SURFACE TEST TREE TO 5000 PSI - O.K.	7
12NOV85	0445	PICKED UP SUBSEA TEST TREE AND RUN IN HOLE FOR DST #2	8
	0510	PICKED UP SUBSEA LUBRICATOR VALVE AND RUN IN HOLE	9
	0530	PICKED UP SURFACE TEST TREE AND MADE UP TO TEST STRING	10
	0745	MADE UP SURFACE FLOWLINES AND PRESSURE TESTED TO 5000 PSI - O.K.	11
		STARTED DST #2 (REFER FIELD READINGS FOR FURTHER DATA)	12
	1320	DST #2 - A MISRUN. REVERSED CIRCULATE WATER CUSHION	13
		LAI D DOWN SURFACE TEST TREE	14
		BREAK OUT SUBSEA LUBRICATOR VALVE AND STAND BACK IN DERRICK	15
		BREAK OUT SUBSEA TEST TREE AND STAND BACK IN DERRICK	16
		BREAK OUT SURFACE TEST TREE AND LAI D DOWN	17
		GENERAL MAINTENANCE OF P.T. EQUIPMENT	18
13NOV85	0945	PICKED UP SUBSEA TEST TREE AND RUN IN HOLE	19

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SEQUENCE OF OPERATIONS

OEC-872-1-B-SIN

TEST NUMBER	RIG NAME	PAGE	OF
DST#1-4	DIAMOND M. EPOCH	5	7

CUSTOMER	WELL NAME OR NUMBER	FIELD	AREA
AMOCO AUSTRALIA PETR. CO.	TILANA #1	WILDCAT	BASS STRAIT
CUSTOMER REPRESENTED BY		OTIS TEST SUPERVISOR	
MR. JOE GUILLERY / RICHARD BYHAM		TONY WOOLHAM	

DATE	TIME	OPERATIONS	
13NOV85	1000	PICKED UP SUBSEA LUBRICATOR VALVE AND RUN IN HOLE	1
	1015	PICKED UP SURFACE TEST TREE AND MADE UP TO TEST STRING	2
	1025	RIGGED UP SURFACE FLOWLINES TO 5000 PSI - O.K.	3
	1105	PRESSURED UP ON ANNULUS TO OPEN LPR FOR DST #3 (REFER FIELD RDGS. FOR DATA)	4
14NOV85	2240	TEST STRING REVERSE CIRCULATED ENDING DST #3	5
15NOV85	0210	BREAK OUT AND LAY DOWN SURFACE TEST TREE	6
	0240	BREAK OUT SUBSEA LUBRICATOR VALVE AND STAND BACK IN DERRICK	7
	0300	BREAK OUT SUBSEA TEST TREE AND STAND BACK IN DERRICK	8
	1500	PRESSURE TESTED SURFACE TEST TREE TO 5000 PSI - O.K.	9
		GENERAL MAINTENANCE OF P.T. EQUIPMENT	10
16NOV85		GENERAL MAINTENANCE OF P.T. EQUIPMENT	11
17NOV85	0245	PICKED UP SUBSEA TEST TREE AND RUN IN HOLE	12
	0330	PICKED UP SUBSEA LUBRICATOR VALVE AND RUN IN HOLE	13
	0400	PICKED UP SURFACE TEST TREE AND MADE UP TO TEST STRING	14
	0540	WIRELINE GAUGE CUTTER RUN IN HOLE TO 3000 METRES	15
	0800	STARTED RIGGING UP SCHLUMBERGER LUBRICATOR	16
	0940	PRESSURE TESTED SURFACE EQUIPMENT TO 5000 PSI - O.K.	17
	1035	PUMPED CLOSE SUBSEA LUBRICATOR VALVE. PERFORATING GUNS RUN IN HOLE	18
	1105	PUMPED OPEN SUBSEA LUBRICATOR VALVE	19

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SEQUENCE OF OPERATIONS

OEC-872-1-B-SIN

TEST NUMBER

DST#1-4

RIG NAME

DIAMOND M. EPOCH

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CUSTOMER AMOCO AUSTRALIA PETR. CO.	WELL NAME OR NUMBER TILANA #1	FIELD WILDCAT	AREA BASS STRAIT
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CUSTOMER REPRESENTED BY MR. JOE GUILLERY / RICHARD BYHAM	OTIS TEST SUPERVISOR TONY WOOLHAM
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DATE	TIME	OPERATIONS	
17NOV85	1155	PERFORATING GUNS STUCK IN HOLE. PULLED OUT FROM ROPE SOCKET.	1
		STARTED PULLING GUN OUT OF HOLE	2
	1350	OTIS WIRELINE RUN IN HOLE WITH FISHING TOOL	3
	2130	OTIS WIRELINE UNABLE TO RETRIEVE PERFORATING GUNS	4
	2330	RIGGED DOWN SURFACE TEST TREE	5
18NOV85	0005	BREAK OUT SUBSEA LUBRICATOR VALVE AND STAND BACK IN DERRICK	6
	0030	BREAK OUT SUBSEA TEST TREE AND STAND BACK IN DERRICK.	7
		GENERAL MAINTENANCE OF P.T. EQUIPMENT	8
	2230	PICKED UP SUBSEA TEST TREE AND RUN IN HOLE	9
	2300	PICKED UP SUBSEA LUBRICATOR VALVE AND RUN IN HOLE	10
	2330	PICKED UP SURFACE TEST TREE AND MADE UP TO TEST STRING	11
	2345	WIRELINE RUN IN HOLE WITH GAUGE CUTTER	12
19NOV85	0100	WIRELINE GAUGE CUTTER RUN TO DEPTH	13
	0135	RIGGED UP SCHLUMBERGER LUBRICATOR	14
	0300	PRESSURE TESTED SURFACE EQUIPMENT TO 5000 PSI - O.K.	15
	0430	RIGGED UP PERFORATING GUNS AND RUN IN HOLE	16
	0654	ZONE PERFORATED. STARTED DST #4 (REFER FIELD READINGS FOR FURTHER DATA).	17
20NOV85	1730	TEST STRING REVERSE CIRCULATED ENDING DST #4 / RIGGED DOWN SURFACE TEST TREE	18
		BREAK OUT SUBSEA LUBRICATOR VALVE / SUBSEA TEST TREE / SURFACE FLOWLINES	19

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SEQUENCE OF OPERATIONS

OEC-872-1-B-SIN

TEST NUMBER DST#1-4	RIG NAME DIAMOND M. EPOCH	PAGE 7	OF 7
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CUSTOMER AMOCO AUSTRALIA PETR. CO.	WELL NAME OR NUMBER TILANA #1	FIELD WILDCAT	AREA BASS STRAIT
CUSTOMER REPRESENTED BY MR. JOE GUILLERY / RICHARD BYHAM		OTIS TEST SUPERVISOR TONY WOOLHAM	

DATE	TIME	OPERATIONS	
1			1
21NOV85		CONTINUED RIG DOWN OF ALL P.T. EQUIPMENT FOR SHIPMENT TO HOBART	
2			2
		CHAN / WONG AND THOMAS DEPARTED RIG	
3			3
22NOV85		A. WOOLHAM OFFLOADED ALL TEST EQUIPMENT AND DEPARTED RIG FOR PERTH	
4			4
		CHAN AND WONG DEPARTED MELBOURNE FOR SINGAPORE	
5			5
6			6
7			7
8			8
9			9
10			10
11			11
12			12
13			13
14			14
15			15
16			16
17			17
18			18
19			19

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TEST STRING

TEST NUMBER		RIG NAME		DATE (DAY MO. YR.)		PAGE OF	
DST#1		DIAMOND M.EPOCH		10NOV85		1 1	
CUSTOMER		WELL NAME OR NUMBER		FIELD		AREA	
AMOCO AUSTRALIA PETR. CO.		TILANA #1		WILDCAT		BASS STRAIT	
TOP OF HOLE	DEPTH (FEET)	DEPTH M	KB ELEVATION (FT)	GROUND ELEV./WATER DEPTH (FEET)	REFERENCE ELEV.	MUD WT. (LBS./FT.)	INTERVAL TESTED (FEET)
			67	267	KB	--	3179-3185M
ITEM #	DESCRIPTION		OUTSIDE DIAMETER (INCHES)	INSIDE DIAMETER (INCHES)	LENGTH M		
1	OTIS SURFACE TREE						
2	XD 4-3/8 6STUB ACB X 4.5 IF P.		6.250	2.880			
3	5-INCH DRILLPIPE		6.250	4.276	28.36		
4	XD 4.5 IF B. X 4.5 4STUB ACP.		6.250	2.880	0.37		
5	OTIS SUBSEA LUBRICATOR VALVE		10.750	2.880	1.62		
6	XD 4.5 4STUB ACB. X 4.5 IF PIN		6.250	2.880	0.20		
7	5-INCH DRILLPIPE		6.250	4.276	69.77		
8	XD 4.5 IF B. X 4.5 4STUB ACP.		6.500	2.880	1.10		
9	OTIS SUBSEA TEST TREE		10.750	2.880	4.42		
10	XD 4.5 4STUB ACB. X 4.5 IF PIN		6.500	2.880	0.55		
11	5-INCH DRILLPIPE 103 STANDS		6.250	4.276	2888.08		
12	XD 4-1/2 IF BOX /3-1/2 PH6 PIN		6.250	2.750	0.31		
2991.00	13 OTIS SRD NIPPLE		4.625	2.280	0.60		
	14 XD 3-1/2 PH6 BOX /4-1/2 IF PIN		6.250	2.875	0.34		
	15 XD 4-1/2 IF BOX X 3-1/2 IF PIN		6.375	2.438	0.36		
2993.00	16 5-INCH FULFLO SAFETY VALVE		5.000	2.250	1.45		
	17 XD 3-1/2 IF BOX X 4-1/2 IF PIN		6.125	2.875	0.30		
	18 3 EACH DRILL COLLAR		6.438	2.875	28.37		
3023.00	19 XD 4-1/2 IF BOX X 3-1/2 IF PIN		6.125	2.313	0.30		
3028.00	20 5-INCH SLIP JOINT - OPEN		5.000	2.250	5.53		
3033.00	21 5-INCH SLIP JOINT - 1/2 OPEN		5.000	2.250	4.77		
3037.00	22 5-INCH SLIP JOINT - CLOSED		5.000	2.250	4.01		
3037.50	23 XD 3-1/2 IF BOX X 4-1/2 IF PIN		6.125	2.875	0.32		
	24 9 EACH 6-1/2 DRILL COLLAR		6.438	2.875	85.60		
	25 XD 4-1/2 IF BOX X 3-1/2 IF PIN		6.125	2.313	0.30		
	26 APR-A		5.000	2.250	0.91		
	27 APR-M2		5.000	2.250	2.29		
3127.00	28 LPR-N TESTER		5.000	2.250	4.99		
	29 5-3/8 BUNDLE CARRIER		5.375	2.250	2.43		
	30 4-5/8 BIG JOHN JAR		4.625	2.250	1.58		
	31 4-5/8 HYDRAULIC CIR. VALVE		4.625	2.250	2.20		
	32 XD 3-1/2 IF BOX X 3-1/2 FH PIN		4.750	2.438	0.26		
	33 4-5/8 FULFLO VR SAFETY JOINT		4.625	2.250	1.25		
	34 9-5/8 RTTS TEST PACKER		7.800	3.000	1.10		
	35 TAILPIPE 5-INCH DRILLPIPE		6.500	4.276	9.62		
	36 WIRELINE GUIDE		6.375	2.813	0.51		
	37						

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TEST STRING

TEST NUMBER		RIG NAME		DATE (DAY MO. YR.)		PAGE		OF					
DST#2		DIAMOND M.EPOCH		12NOV85		1		1					
CUSTOMER			WELL NAME OR NUMBER			FIELD			AREA				
AMOCO AUSTRALIA PETR. CO.			TILANA #1			WILDCAT			BASS STRAIT				
TOP OF HOLE		DEPTH (FEET)		KB ELEVATION (FT)		GROUND ELEV./WATER DEPTH (FEET)		REFERENCE ELEV.		MUD WT. (LBS./FT.)		INTERVAL TESTED (FEET)	
				67		267		KB		9.0 GAL		3179-3185M	
		DEPTH M		ITEM #		DESCRIPTION		OUTSIDE DIAMETER (INCHES)		INSIDE DIAMETER (INCHES)		LENGTH M	
				1		OTIS SURFACE TEST TREE							
				2		XD 4-3/8 6STUB ACB. X 4.5 IF P		6.250		2.880			
				3		5-INCH DRILLPIPE		6.250		4.276		93.04	
				4		XD 4.5 IF B. X 4.5 4STUB ACP.		6.250		2.880		1.22	
				5		OTIS SUBSEA LUBRICATOR VALVE		10.750		2.880		5.30	
				6		XD 4.5 4STUB ACB. X 4-1/2 IF P		6.250		2.880		0.66	
				7		5-INCH DRILLPIPE		6.250		4.276		288.91	
				8		XD 4-1/2 IF B. X 4.5 4STUB ACP		6.500		2.880		3.63	
				9		OTIS SUBSEA TEST TREE		10.250		2.880		14.51	
		102.0		10		XD 4.5 4STUB ACB. X 4.5 IF PIN		6.500		2.880		1.83	
				11		5-INCH DRILLPIPE 103 STANDS		6.250		4.276			
				12		XD 4-1/2 IF BOX /3-1/2 FH6 PIN		6.250		2.750		1.03	
				13		OTIS SRD NIPPLE		4.625		2.280		2.00	
		2991.3		14		XD 3-1/2 FH6 BOX /4-1/2 IF PIN		6.250		2.875		1.12	
				15		XD 4-1/2 IF BOX X 3-1/2 IF PIN		6.375		2.438		1.20	
				16		5-INCH FULFLO SAFETY VALVE		5.000		2.250		4.75	
		2992.6		17		XD 3-1/2 IF BOX X 4-1/2 IF PIN		6.125		2.875		1.00	
				18		3 EACH DRILL COLLAR		6.438		2.875		93.13	
				19		XD 4-1/2 IF BOX X 3-1/2 IF PIN		6.125		2.313		1.00	
				20		5-INCH SLIP JOINT - OPEN		5.000		2.250		18.16	
				21		5-INCH SLIP JOINT - 1/2 OPEN		5.000		2.250		15.66	
				22		5-INCH SLIP JOINT - CLOSED		5.000		2.250		13.16	
				23		XD 3-1/2 IF BOX X 4-1/2 IF PIN		6.125		2.875		1.00	
				24		9 EACH 6-1/2 DRILL COLLAR		6.438		2.875		279.42	
				25		XD 4-1/2 IF BOX X 3-1/2 IF PIN		6.125		2.313		1.00	
		3123.2		26		APR-A		5.000		2.250		3.00	
				27		LPR-N TESTER		5.000		2.250		16.37	
		3124.1		28		5-3/8 BUNDLE CARRIER		5.375		2.250		7.97	
				29		4-5/8 BIG JOHN JAR		4.625		2.250		5.20	
				30		4-5/8 HYDRAULIC CIR. VALVE		4.625		2.250		7.22	
				31		XD 3-1/2 IF BOX X 3-1/2 FH PIN		4.750		2.438		0.86	
				32		4-5/8 FULFLO VR SAFETY JOINT		4.625		2.250		4.12	
				33		9-5/8 RTTS TEST PACKER		7.800		3.000		3.61	
		3137.3		34		TAILPIPE 5-INCH DRILLPIPE		6.250		4.276		31.56	
				35		WIRELINE GUIDE		6.375		2.813		1.67	
		3148.0		36									
				37									

291081



TEST STRING

TEST NUMBER DST#3	RIG NAME DIAMOND M.EPOCH	DATE (DAY MO. YR.) 14NOV85	PAGE 1	OF 1
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CUSTOMER AMOCO AUSTRALIA PETR. CO.	WELL NAME OR NUMBER TILANA #1	FIELD WILDCAT	AREA BASS STRAIT
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TOP OF HOLE	DEPTH (FEET)	DEPTH M	KB ELEVATION (FT) 67	GROUND ELEV./WATER DEPTH (FEET) 267	REFERENCE ELEV. KB	MUD WT. (LBS./FT.) 9.0 GAL	INTERVAL TESTED (FEET) 3179-3185M
			ITEM #	DESCRIPTION	OUTSIDE DIAMETER (INCHES)	INSIDE DIAMETER (INCHES)	LENGTH M
			1	SURFACE TREE			
			2	5-INCH DRILLPIPE	6.250	4.226	93.04
			3	XO 4.5 IF B. X 4.5 4STUB ACP.	6.250	2.880	1.22
			4	OTIS SUBSEA LUBRICATOR VALVE	10.750	2.880	5.30
			5	XO 4.5 IF B. X 4.5 4STUB ACP.	6.250	2.880	0.66
			6	5-INCH DRILLPIPE	6.850	4.276	228.91
			7	XO 4.5 IF B. X 4.5 4STUB ACP.	6.500	2.880	3.63
			8	OTIS SUBSEA TEST TREE	10.750	2.880	14.51
			9	XO 4.5 4STUB ACB. X 4.5 IF PIN	6.500	2.880	1.83
			10	5-INCH DRILLPIPE	6.250	4.276	9475.33
		2991.3	11	XO 4-1/2 IF BOX 7/3-1/2 PH6 PIN	6.250	2.750	1.03
			12	OTIS SRD NIPPLE	4.625	2.280	2.00
			13	XO 3-1/2 PH6 BOX 7/4-1/2 IF PIN	6.250	2.875	1.12
		2994.1	14	XO 4-1/2 IF BOX X 3-1/2 IF PIN	6.375	2.438	1.20
			15	5-INCH FULFLO SAFETY VALVE	5.000	2.250	4.75
			16	XO 3-1/2 IF BOX X 4-1/2 IF PIN	6.125	2.875	1.00
			17	3 EACH DRILL COLLAR	6.438	2.875	93.13
			18	XO 4-1/2 IF BOX X 3-1/2 IF PIN	6.125	2.313	1.00
			19	SLIP JOINT - OPEN	5.000	2.250	18.16
			20	SLIP JOINT - 1/2 OPEN	5.000	2.250	15.66
			21	SLIP JOINT - CLOSED	5.000	2.250	13.16
			22	XO 3-1/2 IF BOX X 4-1/2 IF PIN	6.125	2.875	1.00
			23	6 EACH 6-1/2-INCH DRILL COLLAR	6.438	2.875	186.28
		3094.8	24	XO 4-1/2 IF BOX X 3-1/2 IF PIN	6.125	2.688	0.85
			25	APR-A REVERSE TOOL	5.000	2.250	3.00
			26	XO 3-1/2 IF BOX X 4-1/2 IF PIN	6.188	2.750	1.06
			27	3 EACH 6-1/2 DRILL COLLAR	6.438	2.875	93.14
			28	XO 4-1/2 IF BOX X 3-1/2 IF PIN	6.125	2.313	1.00
		3125.3	29	LPR-N	5.000	2.250	16.37
		3132.1	30	5-3/8 BUNDLE CARRIER	5.375	2.250	7.97
			31	4-5/8 BIG JOHN JAR	4.625	2.250	5.20
			32	4-5/8 HYDRAULIC CIRC. VALVE	4.625	2.250	7.22
			33	XO 3-1/2 IF BOX X 3-1/2 FH PIN	4.750	2.438	0.86
			34	4-5/8 FULFLO VR	4.625	2.250	4.12
		3137.9	35	9-5/8 RTTS TEST PACKER	7.800	3.000	3.61
			36	TAPIPE DRILLPIPE	6.500	4.276	31.58
		3149.1	37	WIRELINE GUIDE	6.375	2.813	1.67
			38				

BOTTOM OF HOLE

321082



T. STRING

TEST NUMBER		RIG NAME		DATE (DAY MO. YR.)		PAGE OF	
DST#4		DIAMOND M.EPOCH		17NOV85		1 1	
CUSTOMER		WELL NAME OR NUMBER		FIELD		AREA	
AMOCO AUSTRALIA PETR. CO.		TILANA #1		WILDCAT		BASS STRAIT	
TOP OF HOLE	DEPTH (FEET)	DEPTH M	KB ELEVATION (FT)	GROUND ELEV./WATER DEPTH (FEET)	REFERENCE ELEV.	MUD WT. (LBS./FT.)	INTERVAL TESTED (FEET)
			67	267	KB	-	3071-3075M
ITEM #	DESCRIPTION		OUTSIDE DIAMETER (INCHES)	INSIDE DIAMETER (INCHES)	LENGTH M		
1	OTIS SURFACE TEST TREE						
2	XD 4-3/8 6STUB ACB. X 4.5 IF P		6.250	2.880			
3	5-INCH DRILLPIPE		6.250	4.226	93.04		
4	XD 4.5 IF B. X 4.5 4STUB ACP.		6.250	2.880	1.22		
5	OTIS SUBSEA LUBRICATOR VALVE		10.750	2.880	5.30		
6	XD 4.5 IF B. X 4.5 4STUB ACP.		6.250	2.880	0.66		
7	5-INCH DRILLPIPE		6.250	4.276	228.91		
8	XD 4.5 IF B. X 4.5 4STUB ACP.		6.500	2.880	3.63		
9	OTIS SUBSEA TEST TREE		10.750	2.880	14.51		
10	XD 4.5 4STUB ACB. X 4.5 IF PIN		6.500	2.880	1.83		
11	5-INCH DRILLPIPE		6.250	4.276	9031.02		
12	XD 4-1/2 IF BOX /3-1/2 PH6 PIN		6.250	2.750	1.03		
13	OTIS SRD NIPPLE		4.625	2.280	2.00		
14	XD 3-1/2 PH6 BOX /4-1/2 IF PIN		6.250	2.875	1.12		
15	XD 4-1/2 IF BOX X 3-1/2 IF PIN		6.375	2.438	1.20		
16	5-INCH FULFLO SAFETY VALVE		5.000	2.250	4.75		
17	XD 3-1/2 IF BOX X 4-1/2 IF PIN		6.125	2.875	1.00		
18	3 EACH DRILL COLLAR		6.438	2.875	93.13		
19	XD 4-1/2 IF BOX X 3-1/2 IF PIN		6.125	2.313	1.00		
20	SLIP JOINT - OPEN		5.000	2.250	18.16		
21	SLIP JOINT - 1/2 OPEN		5.000	2.250	15.66		
22	SLIP JOINT - CLOSED		5.000	2.250	13.16		
23	XD 3-1/2 IF BOX X 4-1/2 IF PIN		6.125	2.875	11.00		
24	6 EACH 6-1/2 DRILL COLLAR		6.438	2.875	186.28		
25	XD 4-1/2 IF BOX X 3-1/2 IF PIN		6.125	2.688	0.85		
26	APR-A REVERSE TOOL		5.000	2.250	3.00		
27	XD 3-1/2 IF BOX X 4-1/2 IF PIN		6.188	2.750	1.06		
28	3 EACH 6-1/2 DRILL COLLAR		6.438	2.875	93.14		
29	XD 4-1/2 IF BOX X 3-1/2 IF PIN		6.125	2.313	1.00		
30	LPR-N		5.000	2.250	16.37		
31	5-3/8 BUNDLE CARRIER		5.375	2.250	7.97		
32	4-5/8 BIG JOHN JAR		4.625	2.250	5.20		
33	4-5/8 HYDRAULIC CIRC. VALVE		4.625	2.250	7.22		
34	XD 3-1/2 IF BOX X 3-1/2 FH PIN		4.750	2.438	0.86		
35	4-5/8 FULFLO VR		4.625	2.250	4.12		
36	9-5/8 RTTS TEST PACKER		7.800	3.000	3.61		
37	TAILPIPE DRILLPIPE		6.500	4.276	31.56		
38	WIRELINE GUIDE		6.375	2.813	1.67		
		BOTTOM OF HOLE					

321083

EQUIPMENT LIST

1	SUBSEA TEST TREE	78-EO-80
1	SUBSEA LUBRICATOR VALVE	78-EO-85
1	SURFACE TEST TREE	
1	TRANSFER PUMP	
1	CHOKE MANIFOLD	3INCH 10000 PSI 5-VALVE c/w WILLIS positive and adjustable chokes
1	HEATER	2MMBTU GAS FIRED INDIRECT
1	SEPARATOR	1440 PSI 3PHASE
1	TANK	100 BBLs 50 PSI
1	PORTABLE LABORATORY	
2	CB-12 BURNERS	



SURFACE SAMPLING DATA

OEC-889-2

TEST NUMBER
DST #3RATE NUMBER
ONEAREA
BASS STRAITPAGE OF
1 1

CUSTOMER AMOCO AUSTRALIA PETR. CO.		WELL NAME OR NUMBER TILANA #1		FIELD WILDCAT		FORMATION SANDSTONE	
ELEVATION (FEET)	STANDARD CONDITIONS <input checked="" type="checkbox"/> 14.73 psi 60°F <input type="checkbox"/> OTHER			PRESS.	TEMP	WELL IS <input checked="" type="checkbox"/> PERFORATED <input type="checkbox"/> OPEN HOLE	
INTERVAL TESTED (FEET) 3179 - 3185 M.							

SAMPLE # 1

DATE WELL SAMPLED 14NOV85	TIME WELL SAMPLED 2045	SAMPLING TOOL NAME: LEUTERT			NUMBER	VOLUME (CC) 600	SHIPPING CONTAINER NUMBER: OBHS 29 VOLUME (CC): 635		HOURS WELL BEFORE SAMPLING <input type="checkbox"/> FLOWING <input type="checkbox"/> SHUT-IN
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DOWN HOLE CONDITIONS

TRANSFER CONDITIONS

BOTTOM HOLE PRESSURE "	BOTTOM HOLE TEMP. "	SAMPLING DEPTH	SAMPLING DEPTH PRESSURE	GAS - OIL CONTACT	OIL-WATER CONTACT	SURFACE SAMPLE PRESS.	SURFACE SAMPLE TEMP.	TRANSFER PRESS.	TRANSFER TEMP.	FIELD BUBBLE POINT PRESS.	FIELD BUBBLE POINT TEMP.	VOLUME OF Hg REMAINING WITH SAMPLE	OUTAGE TAKEN IN SAMPLE CONTAINER	SHIPPING PRESSURE
DEPTH (FEET) PSIG	DEPTH (FEET) PSIG	(FEET)	(PSIG)	(FEET)	(FEET)	(°F)	(°F)	(PSIG)	(°F)	(PSIG)	(°F)	(CC)	(CC)	(PSIG)
2137		7500	2137				60					35		

SURFACE FIELD READINGS AND FACTORS USED

WELL HEAD		CASING	CHOKE	HI STAGE SEP.		LO STAGE SEP.		OIL				GAS		WATER FLOW RATE	TOTAL GAS/OIL FLOW RATE AT	GOR	OGR
PRESS.	TEMP.	PRESS.	SIZE	PRESS.	TEMP.	PRESS.	TEMP.	GRAVITY @ 60°F	BSW	C _f	W _f	GRAVITY	F _{pv}	(BPD)	(BPD) (MMCF/D)	STOCK TANK	STOCK TANK
(PSIG)	(°F)	(PSIG)	(4.41 INCH)	(PSIG)	(°F)	(PSIG)	(°F)	(°API)	(%)	*	*	(air 1)				<input type="checkbox"/>	<input type="checkbox"/>
			1400													<input type="checkbox"/>	<input type="checkbox"/>

SAMPLE #

DATE WELL SAMPLED	TIME WELL SAMPLED	SAMPLING TOOL NAME			NUMBER	VOLUME (CC)	SHIPPING CONTAINER NUMBER		VOLUME (CC)	HOURS WELL BEFORE SAMPLING <input type="checkbox"/> FLOWING <input type="checkbox"/> SHUT-IN
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DOWN HOLE CONDITIONS

TRANSFER CONDITIONS

BOTTOM HOLE PRESSURE "	BOTTOM HOLE TEMP. "	SAMPLING DEPTH	SAMPLING DEPTH PRESSURE	GAS - OIL CONTACT	OIL-WATER CONTACT	SURFACE SAMPLE PRESS.	SURFACE SAMPLE TEMP.	TRANSFER PRESS.	TRANSFER TEMP.	FIELD BUBBLE POINT PRESS.	FIELD BUBBLE POINT TEMP.	VOLUME OF Hg REMAINING WITH SAMPLE	OUTAGE TAKEN IN SAMPLE CONTAINER	SHIPPING PRESSURE
DEPTH (FEET) PSIG	DEPTH (FEET) PSIG	(FEET)	(PSIG)	(FEET)	(FEET)	(°F)	(°F)	(PSIG)	(°F)	(PSIG)	(°F)	(CC)	(CC)	(PSIG)

SURFACE FIELD READINGS AND FACTORS USED

WELL HEAD		CASING	CHOKE	HI STAGE SEP.		LO STAGE SEP.		OIL				GAS		WATER FLOW RATE	TOTAL GAS/OIL FLOW RATE AT	GOR	OGR
PRESS.	TEMP.	PRESS.	SIZE	PRESS.	TEMP.	PRESS.	TEMP.	GRAVITY @ 60°F	BSW	C _f	W _f	GRAVITY	F _{pv}	(BPD)	(BPD) (MMCF/D)	STOCK TANK	STOCK TANK
(PSIG)	(°F)	(PSIG)	(4.41 INCH)	(PSIG)	(°F)	(PSIG)	(°F)	(°API)	(%)	*	*	(air 1)				<input type="checkbox"/>	<input type="checkbox"/>
																<input type="checkbox"/>	<input type="checkbox"/>

COMMENTS:

DUPLICATE SAMPLE WHEN OPENED AT SURFACE CONTAINED MUDDY WATER AND NO PRESSURE

* C_f IS MEASURED CORRECTION FACTOR FOR CORRECTING OIL VOLUME FROM SEPARATOR TO STOCK TANK CONDITIONS. IT INCLUDES WEATHERING FACTOR, W_f, AND A METER NONLINEARITY EFFECT, M. C_f = M W_f

321080



SURFACE SAMPLING DATA

OEC-889-2

TEST NUMBER DST #4	RATE NUMBER ONE	AREA BASS STRAIT	PAGE 1	OF 1
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CUSTOMER AMOCO AUSTRALIA PETR. CO.	WELL NAME OR NUMBER TILANA #1	FIELD WILDCAT	FORMATION SANDSTONE
ELEVATION (FEET)	STANDARD CONDITIONS <input checked="" type="checkbox"/> 14.73 psi 60°F <input type="checkbox"/> OTHER	WELL IS <input checked="" type="checkbox"/> PERFORATED <input type="checkbox"/> OPEN HOLE	INTERVAL TESTED (FEET) 3071 - 3075 M.

SAMPLE # 1

DATE WELL SAMPLED 20NOV85	TIME WELL SAMPLED 1600	SAMPLING TOOL NAME: LEUTERT	NUMBER	VOLUME (CC) 600	SHIPPING CONTAINER NUMBER	VOLUME (CC) 600	HOURS WELL BEFORE SAMPLING	<input type="checkbox"/> FLOWING <input type="checkbox"/> SHUT-IN
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DOWN HOLE CONDITIONS						TRANSFER CONDITIONS								
BOTTOM HOLE PRESSURE "	BOTTOM HOLE TEMP. "	SAMPLING DEPTH	SAMPLING DEPTH PRESSURE	GAS-OIL CONTACT	OIL-WATER CONTACT	SURFACE SAMPLE PRESS.	SURFACE SAMPLE TEMP.	TRANSFER PRESS.	TRANSFER TEMP.	FIELD BUBBLE POINT PRESS.	FIELD BUBBLE POINT TEMP.	VOLUME OF Hg REMAINING WITH SAMPLE	OUTAGE TAKEN IN SAMPLE CONTAINER	SHIPPING PRESSURE
<small>(PSIG)</small>	<small>(°F)</small>	<small>(FEET)</small>	<small>(PSIG)</small>	<small>(FEET)</small>	<small>(FEET)</small>	<small>(°F)</small>	<small>(°F)</small>	<small>(PSIG)</small>	<small>(°F)</small>	<small>(PSIG)</small>	<small>(°F)</small>	<small>(CC)</small>	<small>(CC)</small>	<small>(PSIG)</small>
3923	267	3072M	3923											

SURFACE FIELD READINGS AND FACTORS USED

WELL HEAD		CASING	CHOKE	HI STAGE SEP.		LO STAGE SEP.		OIL				GAS		WATER FLOW RATE	TOTAL GAS/OIL FLOW RATE AT	<input type="checkbox"/> GOR <input type="checkbox"/> OGR
PRESS.	TEMP.	PRESS.	SIZE	PRESS.	TEMP.	PRESS.	TEMP.	GRAVITY @ 60°F	BSW	C _f	W _f	GRAVITY	F _{pv}	(BPD)	<input type="checkbox"/> STOCK TANK	<input type="checkbox"/> STOCK TANK
<small>(PSIG)</small>	<small>(°F)</small>	<small>(PSIG)</small>	<small>(64th INCH)</small>	<small>(PSIG)</small>	<small>(°F)</small>	<small>(PSIG)</small>	<small>(°F)</small>	<small>(°API)</small>	<small>()</small>	<small>*</small>	<small>*</small>	<small>(AIR - 1)</small>	<small>F_{pv}</small>	<small>(BPD)</small>	<small>(BPD)(MMCF/D)</small>	<small>(MCF/BBL)(BBL/MMCF)</small>
61	1400															

SAMPLE # 2

DATE WELL SAMPLED 20NOV85	TIME WELL SAMPLED 1630	SAMPLING TOOL NAME: LEUTERT	NUMBER	VOLUME (CC) 600	SHIPPING CONTAINER NUMBER	VOLUME (CC) 600	HOURS WELL BEFORE SAMPLING	<input type="checkbox"/> FLOWING <input type="checkbox"/> SHUT-IN
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DOWN HOLE CONDITIONS						TRANSFER CONDITIONS								
BOTTOM HOLE PRESSURE "	BOTTOM HOLE TEMP. "	SAMPLING DEPTH	SAMPLING DEPTH PRESSURE	GAS-OIL CONTACT	OIL-WATER CONTACT	SURFACE SAMPLE PRESS.	SURFACE SAMPLE TEMP.	TRANSFER PRESS.	TRANSFER TEMP.	FIELD BUBBLE POINT PRESS.	FIELD BUBBLE POINT TEMP.	VOLUME OF Hg REMAINING WITH SAMPLE	OUTAGE TAKEN IN SAMPLE CONTAINER	SHIPPING PRESSURE
<small>(PSIG)</small>	<small>(°F)</small>	<small>(FEET)</small>	<small>(PSIG)</small>	<small>(FEET)</small>	<small>(FEET)</small>	<small>(°F)</small>	<small>(°F)</small>	<small>(PSIG)</small>	<small>(°F)</small>	<small>(PSIG)</small>	<small>(°F)</small>	<small>(CC)</small>	<small>(CC)</small>	<small>(PSIG)</small>
3885	264	3045M	3885											

SURFACE FIELD READINGS AND FACTORS USED

WELL HEAD		CASING	CHOKE	HI STAGE SEP.		LO STAGE SEP.		OIL				GAS		WATER FLOW RATE	TOTAL GAS/OIL FLOW RATE AT	<input type="checkbox"/> GOR <input type="checkbox"/> OGR
PRESS.	TEMP.	PRESS.	SIZE	PRESS.	TEMP.	PRESS.	TEMP.	GRAVITY @ 60°F	BSW	C _f	W _f	GRAVITY	F _{pv}	(BPD)	<input type="checkbox"/> STOCK TANK	<input type="checkbox"/> STOCK TANK
<small>(PSIG)</small>	<small>(°F)</small>	<small>(PSIG)</small>	<small>(64th INCH)</small>	<small>(PSIG)</small>	<small>(°F)</small>	<small>(PSIG)</small>	<small>(°F)</small>	<small>(°API)</small>	<small>()</small>	<small>*</small>	<small>*</small>	<small>(AIR - 1)</small>	<small>F_{pv}</small>	<small>(BPD)</small>	<small>(BPD)(MMCF/D)</small>	<small>(MCF/BBL)(BBL/MMCF)</small>
61	1400															

COMMENTS: **SAMPLES WERE TAKEN SEPARATELY AT DIFFERENT DEPTHS ACROSS PERFORATIONS**
SAMPLES SHIPPED IN LEUTERT SAMPLERS. PROBABLE CONTENTS GASEOUS MUD
 * C_f IS MEASURED CORRECTION FACTOR FOR CORRECTING OIL VOLUME FROM SEPARATOR TO STOCK TANK CONDITIONS. IT INCLUDES WEATHERING FACTOR, W_f, AND A METER NONLINEARITY EFFECT, M. C_f = M W_f

321086



FR EADINGS
SINGLE STAGE UNIT
OEC - 905-1-A

TEST NO: DST#1 WELL NAME OR NUMBER: TILANA #1 TEST UNIT DESCRIPTION: 1440PSI 3PHASE SEPARATOR DATE (DAY MO YR): 09NOV85 PAGE 1 OF 3

CUSTOMER: AMOCO AUSTRALIA PETR. CO. FIELD: WILDCAT FORMATION: SANDSTONE OIL METER SIZE: 0 METER RANGE (BBL/S): ---

INTERNAL TESTED: 3179-3185M BHP SURVEY DEPTH (FT.): GAS PRODUCED TO: PIPELINE FLARE GAS METER RUN SIZE: 5.501 (INS) DIFF RANGE (INS H₂O): 0-200 STATIC PRESSURE TAKEN: UPSTREAM DOWNSTREAM

TIME		WELLHEAD DATA			DOWNHOLE DATA		FLOW CONTROL		GAS METERING					OIL OR CONDENSATE METERING				WATER METERING		
DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS	TEMP	CASING PRESS	BHP	BHT	MAN CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS	DIFF PRESS	TEMP	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP	OIL GRAVITY	W _i	# 1 TANK OR METER READING	SALINITY	
24 HOUR CLOCK	(HOURS)	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH IN)	(64TH IN)	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 60°F °API	BSW (%)	# 2 TANK OR METER READING (INS OR BBL)	(%)	
1	09	TEST STRING RUN IN HOLE AND																		1
1800	0.00																			
2	09	DISPLACED WITH 129 BBLs OF WATER																		2
1800	0.00																			
3	11	ZONE PERFORATED USING 2-1/8 INCH ENERJET GUNS																		3
0534	0.00	0	53	1420	0.0	0	0													
4	11	LOSS OF ANNULUS PRESSURE																		4
0535	0.01	5	53	0	0.0	0	0													
5	11																			5
0536	0.03	12	53	0	0.0	0	0													
6	11	WELL OPENED TO FLARE ON 32/64-INCH ADJ. CHOKE																		6
0537	0.04	20	53	0	0.0	0	32													
7	11																			7
0538	0.06	1	53	0	0.0	0	32													
8	11																			8
0539	0.08	0	53	0	0.0	0	32													
9	11																			9
0540	0.09	0	53	0	0.0	0	32													
10	11																			10
0541	0.11	0	53	0	0.0	0	32													
11	11	WELL SHUT IN AT CHOKE MANIFOLD																		11
0542	0.13	0	53	0	0.0	0	0													
12	11	WEAK BLOW AT BUBBLE HOSE																		12
0543	0.14	0	53	0	0.0	0	0													
13	11																			13
0544	0.16	0	53	0	0.0	0	0													
14	11																			14
0545	0.18	0	53	0	0.0	0	0													
15	11																			15
0546	0.19	0	53	0	0.0	0	0													
16	11																			16
0547	0.21	0	53	0	0.0	0	0													
17	11	NO BLOW AT BUBBLE HOSE																		17
0548	0.23	0	53	0	0.0	0	0													

Complete Form 1000-1 (Rev. 11/83)

321087



FIE ADINGS
SINGLE STAGE UNIT
OEC - 905-1-A

TEST NO: DST#1 WELL NAME OR NUMBER: TILANA #1 TEST UNIT DESCRIPTION: 1440PSI 3PHASE SEPARATOR DATE (DAY MO YR): 11NOV85 PAGE: 2 OF: 3

CUSTOMER: AMOCO AUSTRALIA PETR. CO. FIELD: WILDCAT FORMATION: SANDSTONE OIL METER SIZE: 0 METER RANGE (BBL/S): --

INTERNAL TESTED: 3179-3185M BHP SURVEY DEPTH (FT.): GAS PRODUCED TO: PIPELINE FLARE GAS METER RUN SIZE: 5.501 (INS) DIFF. RANGE (INS. H₂O): 0-200 STATIC PRESSURE TAKEN: UPSTREAM DOWNSTREAM

TIME		WELLHEAD DATA			DOWNHOLE DATA		FLOW CONTROL		GAS METERING					OIL OR CONDENSATE METERING				WATER METERING		
DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS.	TEMP.	CASING PRESS.	BHP	BHT	MAN. CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS.	DIFF. PRESS.	TEMP.	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP.	OIL GRAVITY	W _i	# 1 TANK OR METER READING	SALINITY	
24 HOUR CLOCK	(HOURS)	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH) IN	(64TH) IN	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 60°F %API	BSW (%)	# 2 TANK OR METER READING (INS. OR BBL)	(%)	
1	11 0549	0	53	0	0.0	0	0	0												1
RAMS OPENED. STRONG BLOW AT BUBBLE HOSE																				
2	11 0550	18	60	0	0.0	0	32													2
WELL OPENED TO FLARE ON 32/64 INCH ADJ. CHOKE																				
3	11 0551	10	65	0	0.0	0	32													3
4	11 0552	20	70	0	0.0	0	32													4
5	11 0553	170	74	0	0.0	0	0													5
WELL SHUT IN AT CHOKE MANIFOLD																				
6	11 0554	180	73	0	0.0	0	0													6
7	11 0555	185	73	0	0.0	0	0													7
8	11 0556	184	72	0	0.0	0	0													8
9	11 0557	197	72	0	0.0	0	0													9
10	11 0558	197	72	0	0.0	0	0													10
11	11 0559	196	72	0	0.0	0	0													11
STARTED PRESSURE UP ON ANNULUS																				
12	11 0600	800	72	700	0.0	0	0													12
13	11 0605	870	70	700	0.0	0	0													13
14	11 0606	872	70	700	0.0	0	0													14
SCHLUMBERGER STARTED PULLING OUT OF HOLE																				
15	11 0610	870	69	700	0.0	0	0													15
16	11 0615	860	67	700	0.0	0	0													16
17	11 0620	850	65	700	0.0	0	32													17
BLED PRESSURE OF STRING THRU 32/64-IN ADJ. CHOKE																				

Complete Form T-1000 (Rev. 1/78)

321088



FIELD READINGS
SINGLE STAGE UNIT
OEC - 905-1-A

TEST NO: DST#1 WELL NAME OR NUMBER: TILANA #1 TEST UNIT DESCRIPTION: 1440PSI 3PHASE SEPARATOR DATE (DAY MO YR): 11NOV85 PAGE: 3 OF: 3

CUSTOMER: AMOCO AUSTRALIA PETR. CO. FIELD: WILDCAT FORMATION: SANDSTONE OIL METER SIZE: 0 METER RANGE (BBL):

INTERNAL TESTED: 3179-3185M BHP SURVEY DEPTH: GAS PRODUCED TO: PIPELINE FLARE GAS METER RUN SIZE: 5.501 (INS) DIFF RANGE (INS H₂O): 0-200 STATIC PRESSURE TAKEN: UPSTREAM DOWNSTREAM

TIME		WELLHEAD DATA			DOWNHOLE DATA		FLOW CONTROL		GAS METERING				OIL OR CONDENSATE METERING				WATER METERING			
DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS	TEMP.	CASING PRESS	BHP	BHT	MAN. CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS.	DIFF. PRESS.	TEMP.	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP	OIL GRAVITY	W _i	# 1 TANK OR METER READING	SALINITY	
24 HOUR CLOCK	(HOURS)	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH IN)	(64TH IN)	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 60°F %API	BSW (%)	# 2 TANK OR METER READING (INS OR BBL)	(%)	
1	11	WELL SHUT IN AT CHOKE MANIFOLD																		1
0622	0.79	120	64	700	0.0	0	0													
2	11																			2
0623	0.81	130	62	700	0.0	0	0													
3	11																			3
0624	0.83	117	62	700	0.0	0	0													
4	11																			4
0625	0.84	110	62	700	0.0	0	0													
5	11																			5
0630	0.93	84	61	700	0.0	0	0													
6	11																			6
0645	1.18	65	60	700	0.0	0	0													
7	11	ANNULUS PRESSURE BLED OFF																		7
0700	1.43	56	59	0	0.0	0	0													
8	11																			8
0715	1.68	46	58	0	0.0	0	0													
9	11	CHOKE OPENED FULLY TO BLEED DOWN STRING																		9
0723	1.81	45	57	0	0.0	0	128													
10	11	OPENED RAMS																		10
0740	4.09	150	0	0	0.0	0	0													
11	11	PULLED WEIGHT ON STRING TO TEST PACKER																		11
0745	4.18	155	0	0	0.0	0	0													
12	11	PACKER STILL SET																		12
0745	4.18	155	0	0	0.0	0	0													
13	11	CLOSED RAMS. STARTED PUMPING DOWN ANNULUS																		13
0753	4.31	155	0	0	0.0	0	0													
14	11	WELL OPENED TO BURNER TO REVERSE OUT H2O CUSHION																		14
0755	4.34	155	0	0	0.0	0	0													
15	11	MUD AT SURFACE. STOPPED PUMPING. END OF DST#1																		15
1020	4.76																			
16																				16
17																				17

Computer - Paper Tapes (Master)

321089



FE. LOADINGS
SINGLE STAGE UNIT
OEC - 905-1-A

TEST NO. DST#2	WELL NAME OR NUMBER TILANA #1	TEST UNIT DESCRIPTION 1440PSI 3PHASE SEPARATOR	DATE (DAY, MO, YR) 11NOV85	PAGE 1	OF 3
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CUSTOMER AMOCO AUSTRALIA PETR. CO.	FIELD WILDCAT	FORMATION SANDSTONE	OIL METER SIZE 2	METER RANGE (BBL/S) 6-60 GPM
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INTERNAL TESTED 3179-3185M	BHP SURVEY DEPTH (FT.)	GAS PRODUCED TO <input type="checkbox"/> PIPELINE <input checked="" type="checkbox"/> FLARE	GAS METER RUN SIZE 5.501 (INS)	DIFF. RANGE (INS. H ₂ O) 0-200	STATIC PRESSURE TAKEN <input type="checkbox"/> UPSTREAM <input checked="" type="checkbox"/> DOWNSTREAM
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TIME		WELLHEAD DATA			DOWNHOLE DATA		FLOW CONTROL		GAS METERING					OIL OR CONDENSATE METERING				WATER METERING		
DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS.	TEMP.	CASING PRESS.	BHP	BHT	MAN CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS.	DIFF. PRESS.	TEMP.	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP	OIL GRAVITY	W _i	# 1 TANK OR METER READING	SALINITY	
24 HOUR CLOCK	(HOURS)	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH IN)	(64TH IN)	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 60°F °API	BSW (%)	# 2 TANK OR METER READING (INS. OR BBL)	(%)	
1	11	TEST STRING RUN IN HOLE WITH 129 BBL/S OF																		1
2100	0.00																			
2	11	SALT WATER CUSHION																		2
2100	0.00																			
3	12	PRESSURE TESTED ANNULUS TO 400 PSI - O.K.																		3
0757	0.00	0	56	400	0.0	0	0	0												
4	12	PRESSURED UP ANNULUS TO OPEN LPR VALVE																		4
0800	0.05	0	56	1440	0.0	0	0	0												
5	12	NO RESPONSE AT BUBBLE HOSE																		5
0800	0.05	0	56	1440	0.0	0	0	0												
6	12	BLED OFF ANNULUS PRESSURE																		6
0803	0.05	0	56	0	0.0	0	0	0												
7	12	PRESSURED UP ANNULUS. NO RESPONSE AT BUBBLE HOSE																		7
0804	0.01	0	56	1360	0.0	0	0	0												
8	12	NO INDICATION OF FLOW AT BUBBLE HOSE																		8
0815	0.18	0	56	1550	0.0	0	0	0												
9	12	OTIS OHSIT AND HP GAUGE RUN IN HOLE																		9
0831	0.44	0	56	1540	0.0	0	0	0												
10	12																			10
0900	0.93	0	56	1540	0.0	0	0	0												
11	12	HP GAUGE STABILIZED AT 4500 FEET																		11
0906	1.03	0	56	1540	0.0	0	0	0												
12	12	HP GAUGE PULLED TO 4000 FT. FOR GRADIENT STOP																		12
0926	1.36	0	56	1540	0.0	0	0	0												
13	12	HP GAUGE STARTED PULLING OUT OF HOLE																		13
0930	1.43	0	56	1540	0.0	0	0	0												
14	12																			14
1000	1.93	0	56	1540	0.0	0	0	0												
15	12	HP GAUGE AT SURFACE																		15
1010	2.09	0	56	1540	0.0	0	0	0												
16	12	RIGGED DOWN HP GAUGE AND OHSIT. RIGGED UP CCL																		16
1027	2.38	0	57	1540	0.0	0	0	0												
17	12	CCL RUN IN HOLE																		17
1030	2.43	0	57	1540	0.0	0	0	0												

Computer - Form 1000 (Rev. 11/84)

321090



FIELD ADINGS
SINGLE STAGE UNIT
OEC - 905-1-A

TEST NO: DST#2 WELL NAME OR NUMBER: TILANA #1 TEST UNIT DESCRIPTION: 1440PSI 3PHASE SEPARATOR DATE (DAY MO. YR): 12NOV85 PAGE 2 OF 3

CUSTOMER: AMOCO AUSTRALIA PETR. CO. FIELD: WILDCAT FORMATION: SANDSTONE OIL METER SIZE: 2 METER RANGE (BBL/S): 6-60 GPM

INTERNAL TESTED: 3179-3185M (FT.) BHP SURVEY DEPTH (FT.): GAS PRODUCED TO: PIPELINE FLARE GAS METER RUN SIZE: 5.501 (INS) DIFF. RANGE (INS H₂O): 0-200 STATIC PRESSURE TAKEN: UPSTREAM DOWNSTREAM

TIME		WELLHEAD DATA			DOWNHOLE DATA		FLOW CONTROL		GAS METERING					OIL OR CONDENSATE METERING				WATER METERING		
DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS	TEMP	CASING PRESS	BHP	BHT	MAN CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS	DIFF PRESS	TEMP	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP	OIL GRAVITY	W _i	# 1 TANK OR METER READING	SALINITY	
24 HOUR CLOCK	(HOURS)	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH IN)	(64TH IN)	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 80°F API	BSW (%)	# 2 TANK OR METER READING (INS OR BBL)	(%)	
1	12	CCL UNABLE TO PASS 10220 FEET																		
1137	3.54	0	61	1560	0.0	0	0	0												
2	12	STARTED PULLING OUT OF HOLE																		
1137	3.54	0	61	1560	0.0	0	0	0												
3	12	CCL IN LUBRICATOR. CLOSED SWAB VALVE																		
1229	4.41	0	62	1580	0.0	0	0	0												
4	12	ANNULUS PRESSURE BLED DOWN																		
1230	4.43	0	62	0	0.0	0	0	0												
5	12	PRESSURED UP ON ANNULUS																		
1240	4.59	0	62	1840	0.0	0	0	0												
6	12	NO INDICATION OF FLOW AT BUBBLE HOSE																		
1240	4.59	0	62	1840	0.0	0	0	0												
7	12	BLED DOWN ANNULUS PRESSURE																		
1243	4.64	0	62	700	0.0	0	0	0												
8	12	PRESSURED UP ON ANNULUS																		
1246	4.69	0	62	1900	0.0	0	0	0												
9	12	NO INDICATION OF FLOW AT BUBBLE HOSE																		
1246	4.69	0	62	1900	0.0	0	0	0												
10	12	BLED DOWN ANNULUS PRESSURE																		
1249	4.74	0	62	600	0.0	0	0	0												
11	12	PRESSURED UP ANNULUS																		
1250	4.76	0	64	1900	0.0	0	0	0												
12	12	NO INDICATION OF FLOW AT BUBBLE HOSE																		
1250	4.76	0	64	1900	0.0	0	0	0												
13	12	BLED DOWN ANNULUS PRESSURE																		
1255	4.84	0	64	0	0.0	0	0	0												
14	12	PRESSURED UP ANNULUS																		
1302	4.96	0	64	1700	0.0	0	0	0												
15	12	NO INDICATION OF FLOW AT BUBBLE HOSE																		
1302	4.96	0	64	1700	0.0	0	0	0												
16	12	PRESSURED UP ANNULUS. APR-N OPENED																		
1312	5.13	0	64	2000	0.0	0	0	0												
17	12	TEST STRING U-TUBING																		
1312	5.13	0	64	2000	0.0	0	0	0												

Computer Form Tissue Paper

321001



HEL WINGS
SINGLE STAGE UNIT
OEC - 905-1-A

TEST NO: DST#2 WELL NAME OR NUMBER: TILANA #1 TEST UNIT DESCRIPTION: 1440PSI 3PHASE SEPARATOR DATE (DAY MO. YR.): 12NOV85 PAGE 3 OF 3

CUSTOMER: AMOCO AUSTRALIA PETR. CO. FIELD: WILDCAT FORMATION: SANDSTONE OIL METER SIZE: 2 METER RANGE (BLS): 6-60 GPM

INTERNAL TESTED: 3179-3185M BHP SURVEY DEPTH (FT.): GAS PRODUCED TO: PIPELINE FLARE GAS METER RUN SIZE: 5.501 (INS) DIFF. RANGE (INS. H₂O): 0-200 STATIC PRESSURE TAKEN: UPSTREAM DOWNSTREAM

TIME		WELLHEAD DATA			DOWNHOLE DATA		FLOW CONTROL		GAS METERING					OIL OR CONDENSATE METERING				WATER METERING	
DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS	TEMP	CASING PRESS	BHP	BHT	MAN CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS.	DIFF. PRESS.	TEMP.	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP	OIL GRAVITY	W _i	# 1 TANK OR METER READING	SALINITY
24 HOUR CLOCK	(HOURS)	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH IN)	(64TH IN)	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 60°F °API	BSW (%)	# 2 TANK OR METER READING (INS. OR BBL)	(%)
1	12	CHOKE MANIFOLD BYPASS OPENED																	
1317	5.21	54	64	0	0.0	0	0	0											
2	12	CUSHION FLOWING TO FLARE / END OF DST #2																	
1317	5.21	54	64	0	0.0	0	0	0											
3																			
4																			
5																			
6																			
7																			
8																			
9																			
10																			
11																			
12																			
13																			
14																			
15																			
16																			
17																			

Computer - Forams Tester - Phone

321092



FE ADINGS
SINGLE STAGE UNIT
OEC - 905-1-A

TEST NO. DST#3 WELL NAME OR NUMBER TILANA #1 TEST UNIT DESCRIPTION 1440PSI 3PHASE SEPARATOR DATE (DAY MO YR) 13NOV85 PAGE 1 OF 4

CUSTOMER AMOCO AUSTRALIA PETR. CO. FIELD WILDCAT FORMATION SANDSTONE OIL METER SIZE 2 METER RANGE (BBL/S) 6-60 GPM

INTERNAL TESTED 3179-3185M BHP SURVEY DEPTH (FT.) GAS PRODUCED TO PIPELINE FLARE GAS METER RUN SIZE 5.501 (INS) DIFF. RANGE (INS. H₂O) 0-200 STATIC PRESSURE TAKEN UPSTREAM DOWNSTREAM

TIME		WELLHEAD DATA			DOWNHOLE DATA		FLOW CONTROL		GAS METERING					OIL OR CONDENSATE METERING				WATER METERING		
DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS.	TEMP.	CASING PRESS.	BHP	BHT	MAN. CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS.	DIFF. PRESS.	TEMP.	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP.	OIL GRAVITY	W _i	# 1 TANK OR METER READING	SALINITY	
24 HOUR CLOCK	(HOURS)	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH IN)	(64TH IN)	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 60°F °API	BSW (%)	# 2 TANK OR METER READING (INS. OR BBL)	(%)	
1	13 0300	0.00																		1
2	13 0300	0.00																		2
3	13 1107	0.00																		3
4	13 1107	0.00																		4
5	13 1111	0.06																		5
6	13 1117	0.16																		6
7	13 1120	0.20																		7
8	13 1125	0.29																		8
9	13 1145	0.62																		9
10	13 1157	0.82																		10
11	13 1330	2.37																		11
12	13 1330	2.37																		12
13	13 1334	2.44																		13
14	13 1345	0.18																		14
15	13 1445	0.16																		15
16	13 1445	0.16																		16
17	13 1530	0.90																		17

Computer - From Testrun Report

321093



FIELD ADINGS
SINGLE STAGE UNIT
OEC - 905-1-A

TEST NO DST#3	WELL NAME OR NUMBER TILANA #1	TEST UNIT DESCRIPTION 1440PSI 3PHASE SEPARATOR	DATE (DAY MO. YR.) 13NOV85	PAGE 2	OF 4
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CUSTOMER AMOCO AUSTRALIA PETR. CO.	FIELD WILDCAT	FORMATION SANDSTONE	OIL METER SIZE 2	METER RANGE (BBL/S) 6-60 GPM
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INTERNAL TESTED 3179-3185M	BHP SURVEY DEPTH (FT.)	GAS PRODUCED TO <input type="checkbox"/> PIPELINE <input checked="" type="checkbox"/> FLARE	GAS METER RUN SIZE 5.501 (INS)	DIFF RANGE (INS H ₂ O) 0-200	STATIC PRESSURE TAKEN <input type="checkbox"/> UPSTREAM <input checked="" type="checkbox"/> DOWNSTREAM
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TIME		WELLHEAD DATA			DOWNHOLE DATA		FLOW CONTROL		GAS METERING					OIL OR CONDENSATE METERING				WATER METERING		
DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS	TEMP	CASING PRESS	BHP	BHT	MAN CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS	DIFF PRESS	TEMP	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP	OIL GRAVITY	W _i	# 1 TANK OR METER READING	SALINITY	
24 HOUR CLOCK	(HOURS)	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH IN)	(64TH IN)	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 60°F °API	BSW (%)	# 2 TANK OR METER READING (INS OR BBL)	(%)	
1	13	RIGGED UP PERFORATING GUNS																		1
1530	0.90	0	62	1400	0.0	0	0	0												1
2	13	PUMPED OPEN SUBSEA LUBRICATOR VALVE																		2
1605	1.49	0	61	1300	0.0	0	0	0												2
3	13	PERFORATING GUNS RUN IN HOLE																		3
1605	1.49	0	61	1300	0.0	0	0	0												3
4	13	PERFORATING GUNS UNABLE TO PASS 3035 METRES																		4
1740	3.07	0	60	1280	0.0	0	0	0												4
5	13	STARTED PULLING OUT OF HOLE																		5
1740	3.07	0	60	1280	0.0	0	0	0												5
6	13	RIGGED DOWN PERFORATING GUNS																		6
1850	4.24	0	58	1280	0.0	0	0	0												6
7	13	2-INCH GAUGE CUTTER RUN IN HOLE																		7
2125	6.82	0	55	1300	0.0	0	0	0												7
8	13	MEDIUM BLOW OBSERVED AT BUBBLE HOSE																		8
2135	6.99	0	55	1300	0.0	0	0	0												8
9	13	GAUGE CUTTER RUN TO 3185 METRES																		9
2235	7.99	0	55	1320	0.0	0	0	0												9
10	13	STARTED PULLING OUT OF HOLE																		10
2235	7.99	0	55	1320	0.0	0	0	0												10
11	13	RIGGED DOWN GAUGE CUTTER																		11
2255	8.32	0	55	1320	0.0	0	0	0												11
12	13	2.125-INCH BLIND BOX RUN IN HOLE																		12
2320	8.74	0	55	1320	0.0	0	0	0												12
13	13	BLIND BOX RUN TO 3185 METRES																		13
2345	9.15	0	55	1320	0.0	0	0	0												13
14	13	STARTED PULLING OUT OF HOLE																		14
2345	9.15	0	55	1320	0.0	0	0	0												14
15	14	RIGGED DOWN OTIS WIRELINE																		15
0025	9.82	0	55	1320	0.0	0	0	0												15
16	14	STARTED RIG-UP PERFORATING GUNS																		16
0025	9.82	0	55	1320	0.0	0	0	0												16
17	14	PUMPED CLOSE SUBSEA LUBRICATOR VALVE																		17
0300	12.40	0	55	1330	0.0	0	0	0												17

Continued From Previous Page

321094



FEL ADINGS
SINGLE STAGE UNIT
DEC - 905-1-A

TEST NO. DST#3 WELL NAME OR NUMBER TILANA #1 TEST UNIT DESCRIPTION 1440PSI 3PHASE SEPARATOR DATE (DAY MO. YR.) 14NOV85 PAGE 3 OF 4

CUSTOMER AMOCO AUSTRALIA PETR. CO. FIELD WILDCAT FORMATION SANDSTONE OIL METER SIZE 2 METER RANGE (BBL/S) 6-60 GPM

INTERNAL TESTED 3179-3185M (FT.) BHP SURVEY DEPTH (FT.) GAS PRODUCED TO PIPELINE FLARE GAS METER RUN SIZE 5.501 (INS) DIFF RANGE (INS. H₂O) 0-200 STATIC PRESSURE TAKEN UPSTREAM DOWNSTREAM

TIME	WELLHEAD DATA				DOWNHOLE DATA		FLOW CONTROL		GAS METERING					OIL OR CONDENSATE METERING				WATER METERING			
	DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS.	TEMP.	CASING PRESS.	BHP	BHT	MAN. CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS.	DIFF. PRESS.	TEMP.	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP.	OIL GRAVITY	W _i	# 1 TANK OR METER READING	SALINITY	
24 HOUR CLOCK	HOURS	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH IN)	(64TH IN)	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 60°F °API	BSW (%)	# 2 TANK OR METER READING (INS. OR BBL)	(%)		
1 14	PERFORATING GUNS IN LUBRICATOR																				1
0300	12.40	0	55	1330	0.0	0	0	0													
2 14	PUMPED OPEN SUBSEA LUBRICATOR VALVE																				2
0400	13.40	0	57	1340	0.0	0	0	0													
3 14	PERFORATING GUNS RUN IN HOLE																				3
0400	13.40	0	57	1340	0.0	0	0	0													
4 14	PERFORATING GUNS AT DEPTH																				4
0530	14.90	0	58	1340	0.0	0	0	0													
5 14	TEST ZONE RE-PERFORATED																				5
0546	15.17	0	58	1340	0.0	0	0	0													
6 14	NO INDICATION OF FLOW AT BUBBLE HOSE																				6
0546	15.17	0	58	1340	0.0	0	0	0													
7 14	PERFORATING GUNS START OUT OF HOLE																				7
0617	15.69	0	59	1340	0.0	0	0	0													
8 14	PUMPED CLOSE SUBSEA LUBRICATOR VALVE																				8
0712	16.60	0	60	1350	0.0	0	0	0													
9 14	STARTED RIGGING DOWN SPENT PERFORATING GUNS																				9
0725	16.82	0	60	1350	0.0	0	0	0													
10 14	AND LUBRICATOR																				10
0725	16.82	0	60	1350	0.0	0	0	0													
11 14	STARTED RIGGING UP OTIS H.P. GAUGE																				11
0900	18.40	0	60	1350	0.0	0	0	0													
12 14	H.P. GAUGE RUN IN HOLE FOR GRADIENT SURVEY																				12
1015	19.65	0	58	1360	0.0	0	0	0													
13 14	H.P. GAUGE AT 3000 FEET FOR GRADIENT STOP																				13
1037	20.02	0	58	1360	0.0	0	0	0													
14 14	H.P. GAUGE AT 10449 FEET																				14
1311	22.59	0	55	1380	0.0	0	0	0													
15 14	WIRELINE COMPLETE GRADIENT SURVEY																				15
1800	27.40	0	54	1400	0.0	0	0	0													
16 14	PUMPED CLOSE SUBSEA LUBRICATOR VALVE																				16
1800	27.40	0	54	1400	0.0	0	0	0													
17 14	RIGGED UP 2 X 600 CC. B.H.S. AND H.P. GAUGE																				17
1915	28.65	0	54	1400	0.0	0	0	0													

Cable-Form Tester (Rev)

321095



FIELD DINGS
SINGLE STAGE UNIT
DEC - 905-1-A

TEST NO: DST#3 WELL NAME OR NUMBER: TILANA #1 TEST UNIT DESCRIPTION: 1440PSI 3PHASE SEPARATOR DATE (DAY, MO, YR): 14NOV85 PAGE 4 OF 4

CUSTOMER: AMOCO AUSTRALIA PETR. CO. FIELD: WILDCAT FORMATION: SANDSTONE OIL METER SIZE: 2 METER RANGE (BBL): 6-60 GPM

INTERNAL TESTED: 3179-3185M BHP SURVEY DEPTH (FT.): GAS PRODUCED TO: PIPELINE FLARE GAS METER RUN SIZE: 5.501 (INS) DIFF. RANGE (INS. H₂O): 0-200 STATIC PRESSURE TAKEN: UPSTREAM DOWNSTREAM

TIME		WELLHEAD DATA			DOWNHOLE DATA		FLOW CONTROL		GAS METERING				OIL OR CONDENSATE METERING				WATER METERING			
DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS	TEMP.	CASING PRESS.	BHP	BHT	MAN CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS	DIFF. PRESS.	TEMP.	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP	OIL GRAVITY	W _i	# 1 TANK OR METER READING	SALINITY	
24 HOUR CLOCK	(HOURS)	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH IN)	(64TH IN)	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 60°F API	BSW (%)	# 2 TANK OR METER READING (INS OR BBL)	(%)	
1	14	SAMPLERS RUN IN HOLE																		1
1930	28.90	0	54	1400	0.0	0	0													
2	14	SAMPLERS AT 7500 FT. SET TO GO OFF AT 2045																		2
2015	29.65	0	54	1400	0.0	0	0													
3	14	SAMPLERS STARTED PULLING OUT OF HOLE																		3
2105	30.49	0	54	1400	0.0	0	0													
4	14	SAMPLING PRESSURE 2152 PSIA AT 216 DEG.F.																		4
2105	30.49	0	54	1400	0.0	0	0													
5	14	SAMPLERS AT SURFACE. RIGGED DOWN WIRELINE																		5
2200	31.40	0	54	1400	0.0	0	0													
6	14	SAMPLER #1 OPENED & CONTAINED SALT WATER ONLY																		6
2200	31.40	0	54	1400	0.0	0	0													
7	14	APR-A V/V OPENED TO REVERSE CIRC. TEST STRING																		7
2240	32.07	0	54	2600	0.0	0	0													
8	14	ENDING DST #3																		8
2240	32.07	0	54	2600	0.0	0	0													
9																				
10																				
11																				
12																				
13																				
14																				
15																				
16																				
17																				

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321096



FIEL ADINGS
SINGLE STAGE UNIT
OEC - 905-1-A

TEST NO. DST#4 WELL NAME OR NUMBER TILANA #1 TEST UNIT DESCRIPTION 1440PSI 3PHASE SEPARATOR DATE (DAY, MO, YR.) 16NOV85 PAGE 1 OF 4

CUSTOMER AMOCO AUSTRALIA PETR. CO. FIELD WILDCAT FORMATION SANDSTONE OIL METER SIZE 2 METER RANGE (BBL/S) 6-60 GPM

INTERNAL TESTED 3071-3075M BHP SURVEY DEPTH (FT.) GAS PRODUCED TO PIPELINE FLARE GAS METER RUN SIZE 5.501 (INS) DIFF. RANGE (INS. H₂O) 0-200 STATIC PRESSURE TAKEN UPSTREAM DOWNSTREAM

TIME		WELLHEAD DATA			DOWNHOLE DATA		FLOW CONTROL		GAS METERING				OIL OR CONDENSATE METERING				WATER METERING			
DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS.	TEMP.	CASING PRESS.	BHP	BHT	MAN. CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS.	DIFF. PRESS.	TEMP.	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP	OIL GRAVITY	W _i	# 1 TANK OR METER READING	SALINITY	
24 HOUR CLOCK	(HOURS)	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH) (IN)	(64TH) (IN)	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 80°F %API	BSW (%)	# 2 TANK OR METER READING (INS. OR BBL)	(%)	
1	16	TEST STRING RUN IN HOLE AND																		1
2100	0.00																			
2	16	DISPLACED WITH 99 BBL/S OF WATER																		2
2100	0.00																			
3	19	ZONE PERFORATED USING 2-1/8 INCH ENERJET GUNS																		3
0654	0.00	0	50	1420	0.0	0	0													
4	19	NO INDICATION OF FLOW AT BUBBLE HOSE																		4
0655	0.01	0	50	1420	0.0	0	0													
5	19	NO INDICATION OF FLOW AT BUBBLE HOSE																		5
0700	0.09	0	50	1420	0.0	0	0													
6	19	SCHLUMBERGER STARTED OUT OF HOLE WITH																		6
0730	0.59	0	50	1420	0.0	0	0													
7	19	PERFORATING GUNS																		7
0730	0.59	0	50	1420	0.0	0	0													
8	19	PERFORATING GUNS AT SURFACE																		8
0835	1.68	0	50	1420	0.0	0	0													
9	19	PUMPED CLOSE SUBSEA LUBRICATOR VALVE																		9
0835	1.68	0	50	1420	0.0	0	0													
10	19	SCHLUMBERGER P.L.T. RUN IN HOLE																		10
1200	5.09	0	58	1440	0.0	0	0													
11	19	MEDIUM BLOW OBSERVED AT BUBBLE HOSE																		11
1306	6.19	0	58	1340	0.0	0	0													
12	19	P.L.T. AT SURFACE																		12
1455	8.01	0	57	1350	0.0	0	0													
13	19	PUMPED CLOSE SUBSEA LUBRICATOR VALVE																		13
1455	8.01	0	57	1350	0.0	0	0													
14	19	OPENED SUBSEA LUBRICATOR VALVE																		14
1625	9.51	0	57	1360	0.0	0	0													
15	19	RUN IN HOLE WITH PERFORATING GUNS																		15
1625	9.51	0	57	1360	0.0	0	0													
16	19	MEDIUM BLOW AT BUBBLE HOSE																		16
1630	9.59	0	58	1360	0.0	0	0													
17	19	PERFORATING GUN UNABLE TO PASS S.R.O. NIPPLE																		17
1750	10.93	0	57	1360	0.0	0	0													

Computer Form Tappan Plaster

321097



FEL. DINGS
SINGLE STAGE UNIT
OEC - 905-1-A

TEST NO. DST#4 WELL NAME OR NUMBER TILANA #1 TEST UNIT DESCRIPTION 1440PS1 3PHASE SEPARATOR DATE (DAY MO. YR.) 19NOV85 PAGE 2 OF 4

CUSTOMER AMOCO AUSTRALIA PETR. CO. FIELD WILDCAT FORMATION SANDSTONE OIL METER SIZE 2 METER RANGE (BBL) 6-60 GPM

INTERNAL TESTED 3071-3075M (FT.) BHP SURVEY DEPTH (FT.) GAS PRODUCED TO PIPELINE FLARE GAS METER RUN SIZE 5.501 (INS) DIFF. RANGE (INS H₂O) 0-200 STATIC PRESSURE TAKEN UPSTREAM DOWNSTREAM

TIME		WELLHEAD DATA			DOWNHOLE DATA		FLOW CONTROL		GAS METERING					OIL OR CONDENSATE METERING				WATER METERING			
DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS	TEMP	CASING PRESS	BHP	BHT	MAN CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS	DIFF. PRESS	TEMP.	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP	OIL GRAVITY	W,	# 1 TANK OR METER READING	SALINITY		
24 HOUR CLOCK	(HOURS)	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH IN)	(64TH IN)	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 60°F %API	BSW (%)	# 2 TANK OR METER READING (INS. OR BBL)	(%)		
1	19	BLED OFF ANNULUS PRESSURE. CLOSED LPR-N										1									1
1752	10.96	0	57	0	0.0	0	0	0													
2	19	OPENED LPR-N										2									2
1819	0.45	0	56	1180	0.0	0	0	0													
3	19	PERFORATING GUNS START OUT OF HOLE										3									3
1822	0.05	0	56	1180	0.0	0	0	0													
4	19	PERFORATING GUNS AT SURFACE										4									4
1855	0.60	0	56	1160	0.0	0	0	0													
5	19	PUMPED CLOSE SUBSEA LUBRICATOR VALVE										5									5
1855	0.60	0	56	1160	0.0	0	0	0													
6	19	RIGGED DOWN PERFORATING GUN AND MODIFY										6									6
1900	0.68	0	56	1160	0.0	0	0	0													
7	19	PUMPED OPEN SUBSEA LUBRICATOR VALVE										7									7
2010	1.84	0	54	1330	0.0	0	0	0													
8	19	MEDIUM BLOW AT BUBBLE HOSE										8									8
2010	1.84	0	54	1330	0.0	0	0	0													
9	19	PERFORATING GUNS RUN IN HOLE										9									9
2011	1.86	0	54	1330	0.0	0	0	0													
10	19	MEDIUM BLOW AT BUBBLE HOSE										10									10
2100	2.68	0	54	1330	0.0	0	0	0													
11	19	MEDIUM BLOW AT BUBBLE HOSE										11									11
2140	3.34	0	54	1330	0.0	0	0	0													
12	19	PERFORATE ADD ON ZONE 3042 - 3048 METRES WITH										12									12
2143	3.39	0	54	1330	0.0	0	0	0													
13	19	2-1/8 INCH ENERJET GUN										13									13
2143	3.39	0	54	1330	0.0	0	0	0													
14	19	NO OBVIOUS CHANGE TO MEDIUM BLOW AT BUBBLE HOSE										14									14
2144	3.41	0	54	1330	0.0	0	0	0													
15	19	WEAK BLOW AT BUBBLE HOSE										15									15
2150	3.51	0	54	1330	0.0	0	0	0													
16	19	WEAK BLOW AT BUBBLE HOSE										16									16
2200	3.68	0	54	1330	0.0	0	0	0													
17	19	PUMPED CLOSE SUBSEA LUBRICATOR VALVE										17									17
2311	4.86	0	54	1360	0.0	0	0	0													

Compiled From Testrun Report

321098



FEL. ADINGS
SINGLE STAGE UNIT
OEC - 905-1-A

TEST NO. DST#4 WELL NAME OR NUMBER TILANA #1 TEST UNIT DESCRIPTION 1440PSI 3PHASE SEPARATOR DATE (DAY MO. YR.) 19NOV85 PAGE 3 OF 4

CUSTOMER AMOCO AUSTRALIA PETR. CO. FIELD WILDCAT FORMATION SANDSTONE OIL METER SIZE 2 METER RANGE (BLS) 6-60 GPM

INTERNAL TESTED 3071-3075M BHP SURVEY DEPTH (FT.) GAS PRODUCED TO PIPELINE FLARE GAS METER RUN SIZE 5.501 (INS) DIFF. RANGE (INS. H₂O) 0-200 STATIC PRESSURE TAKEN UPSTREAM DOWNSTREAM

TIME		WELLHEAD DATA			DOWNHOLE DATA		FLOW CONTROL		GAS METERING					OIL OR CONDENSATE METERING				WATER METERING		
DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS.	TEMP.	CASING PRESS.	BHP	BHT	MAN. CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS.	DIFF. PRESS.	TEMP.	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP.	OIL GRAVITY	W _i	# 1 TANK OR METER READING	SALINITY	
24 HOUR CLOCK	(HOURS)	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH) (IN)	(64TH) (IN)	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 60°F %API	BSW (%)	# 2 TANK OR METER READING (INS. OR BBL)	(%)	
1	19	PERFORATING GUNS AT SURFACE																		1
2311	4.86	0	54	1360	0.0	0	0													1
2	20	PUMPED OPEN SUBSEA LUBRICATOR VALVE																		2
0020	6.01	0	54	1380	0.0	0	0													2
3	20	MEDIUM BLOW AT BUBBLE HOSE																		3
0020	6.01	0	54	1380	0.0	0	0													3
4	20	VERY WEAK BLOW AT BUBBLE HOSE																		4
0045	6.43	0	52	1390	0.0	0	0													4
5	20	RIGGED DOWN SCHLUMBERGER																		5
0045	6.43	0	52	1390	0.0	0	0													5
6	20	NO BLOW AT BUBBLE HOSE																		6
0100	6.68	0	52	1390	0.0	0	0													6
7	20	STARTED RIG-UP OTIS LUBRICATOR																		7
0110	6.84	0	52	1390	0.0	0	0													7
8	20	PRESSURE TESTED LUBRICATOR TO 4000 PSI - O.K.																		8
0150	7.51	4000	52	1390	0.0	0	0													8
9	20	H.P. GAUGE - B.H. SAMPLER RUN IN HOLE																		9
0200	7.68	0	52	1390	0.0	0	0													9
10	20	INTERMITTENT BLOW AT BUBBLE HOSE																		10
0300	8.68	0	52	1400	0.0	0	0													10
11	20	MEDIUM BLOW AT BUBBLE HOSE / FLUID LEVEL 2150 FT																		11
0334	9.24	0	52	1400	0.0	0	0													11
12	20	MEDIUM BLOW AT BUBBLE HOSE																		12
0400	9.68	0	52	1400	0.0	0	0													12
13	20	WEAK BLOW AT BUBBLE HOSE																		13
0430	10.18	0	52	1400	0.0	0	0													13
14	20	WEAK BLOW AT BUBBLE HOSE																		14
0500	10.68	0	50	1430	0.0	0	0													14
15	20	B.H.S. AT DEPTH 10080 FEET																		15
0600	11.68	0	50	1430	0.0	0	0													15
16	20	TOOK B.H. SAMPLE AT 3609 PSIA & 272 DEG.F.																		16
0620	12.01	0	50	1430	0.0	0	0													16
17	20	WIRELINE START OUT OF HOLE																		17
0645	12.43	0	50	1430	0.0	0	0													17

Customer Form Topcon 1/80

321099



FIELD ADINGS
SINGLE STAGE UNIT
OEC - 905-1-A

TEST NO DST#4	WELL NAME OR NUMBER TILANA #1	TEST UNIT DESCRIPTION 1440PSI 3PHASE SEPARATOR	DATE (DAY, MO, YR) 20NOV85	PAGE 4	OF 4
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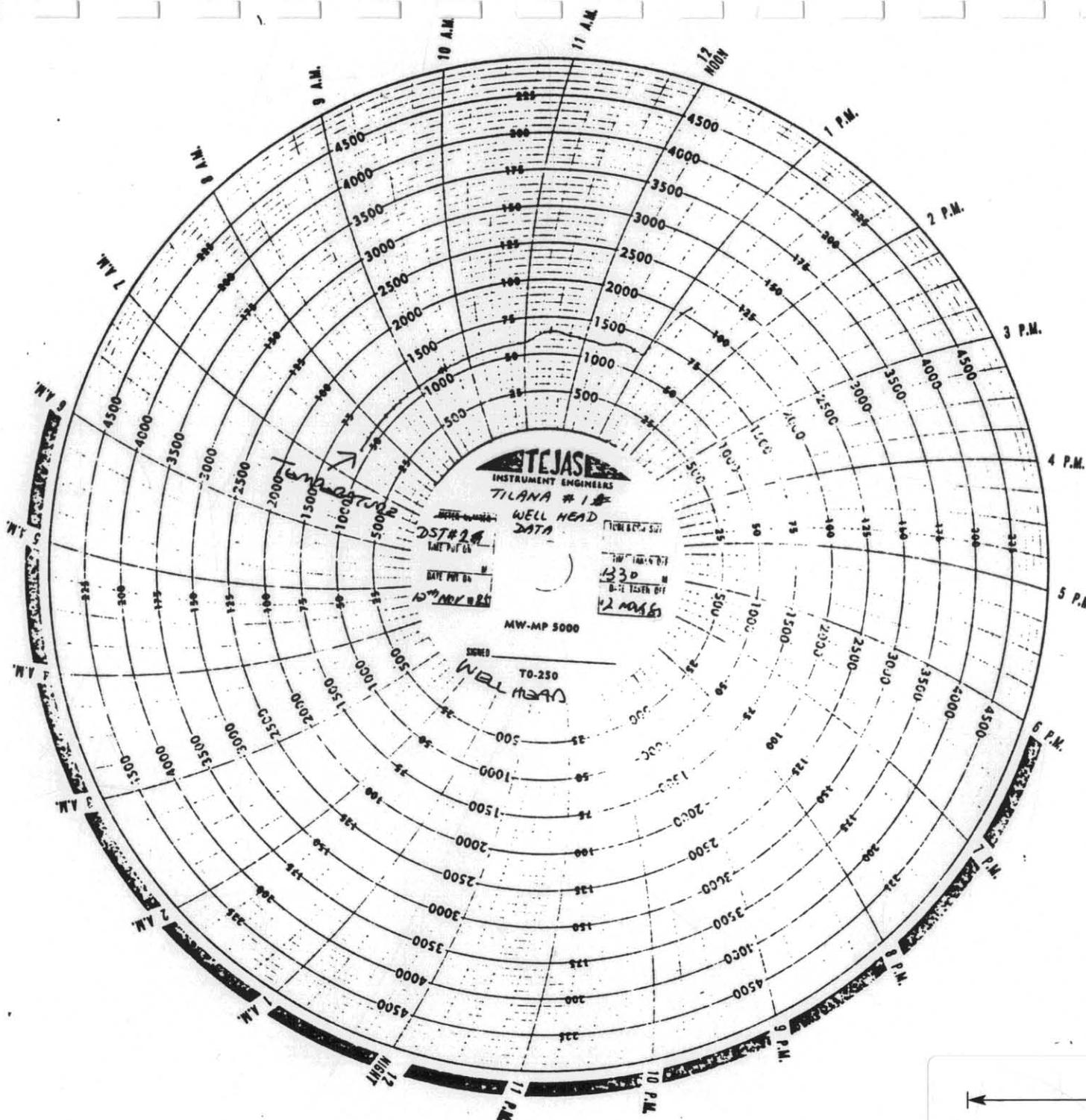
CUSTOMER AMOCO AUSTRALIA PETR. CO.	FIELD WILDCAT	FORMATION SANDSTONE	OIL METER SIZE 2	METER RANGE (BBL/S) 6-60 GPM
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INTERNAL TESTED 3071-3075M	BHP SURVEY DEPTH (FT.)	GAS PRODUCED TO <input type="checkbox"/> PIPELINE <input checked="" type="checkbox"/> FLARE	GAS METER RUN SIZE 5.501 (INS)	DIFF. RANGE (INS. H ₂ O) 0-200	STATIC PRESSURE TAKEN <input type="checkbox"/> UPSTREAM <input checked="" type="checkbox"/> DOWNSTREAM
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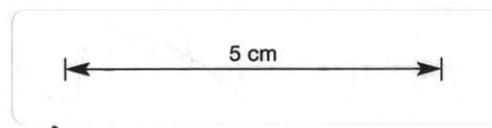
TIME	WELLHEAD DATA				DOWNHOLE DATA		FLOW CONTROL		GAS METERING				OIL OR CONDENSATE METERING				WATER METERING			
	DAY	FLOW OR SHUT-IN DURATION	TUBING PRESS	TEMP	CASING PRESS	BHP	BHT	MAN CHOKE	HEATER CHOKE	ORIFICE SIZE	STATIC PRESS	DIFF. PRESS	TEMP.	GAS GRAVITY (AIR=1)	# 1 TANK OR METER READING	# 1 OIL TEMP	OIL GRAVITY	W _i	# 1 TANK OR METER READING	SALINITY
24 HOUR CLOCK	(HOURS)	(PSIG)	(°F)	(PSIG)	(PSIG)	(°F)	(64TH) IN	(64TH) IN	(INS)	(PSIG)	(IN H ₂ O)	(°F)	% H ₂ S	# 2 TANK OR METER READING (INS OR BBL)	# 2 OIL TEMP (°F)	@ 60°F API	BSW (%)	# 2 TANK OR METER READING (INS OR BBL)	(%)	
1 20		WEAK BLOW AT BUBBLE HOSE																		
0700	12.68	0	50	1440	0.0	0	0	0												
2 20		B.H. SAMPLE AT SURFACE																		
0830	14.18	0	51	1440	0.0	0	0	0												
3 20		OPENED SAMPLE. GASEOUS MUD																		
0900	14.68	0	51	1440	0.0	0	0	0												
4 20		OTIS H.P. GAUGE RUN IN HOLE TO DETERMINE																		
1000	15.68	0	53	1440	0.0	0	0	0												
5 20		FLUID DEPTH																		
1000	15.68	0	53	1440	0.0	0	0	0												
6 20		WEAK BLOW AT BUBBLE HOSE																		
1100	16.68	0	55	1440	0.0	0	0	0												
7 20		VERY WEAK BLOW AT BUBBLE HOSE																		
1130	17.18	0	55	1440	0.0	0	0	0												
8 20		NO BLOW AT BUBBLE HOSE																		
1145	17.43	0	55	1440	0.0	0	0	0												
9 20		NO BLOW AT BUBBLE HOSE																		
1200	17.68	0	55	1440	0.0	0	0	0												
10 20		NO BLOW AT BUBBLE HOSE																		
1300	18.68	0	55	1440	0.0	0	0	0												
11 20		H.P. GAUGE AT SURFACE																		
1320	19.01	0	55	1440	0.0	0	0	0												
12 20		RIGGED UP C.C.L. / H.P. GAUGE AND																		
1350	19.51	0	55	1440	0.0	0	0	0												
13 20		BOTTOM HOLE SAMPLER																		
1350	19.51	0	55	1440	0.0	0	0	0												
14 20		WIRELINER AND TOOLS RUN IN HOLE																		
1425	20.09	0	55	1440	0.0	0	0	0												
15 20		WIRELINER STARTED PULLING OUT OF HOLE W/SAMPLERS																		
1645	22.43	0	55	1440	0.0	0	0	0												
16 20		SAMPLERS AT SURFACE																		
1730	23.18	0	55	1440	0.0	0	0	0												
17 20		REVERSED CIRCULATE TEST STRING ENDING DST #4																		
1730	23.18	0	55	1440	0.0	0	0	0												

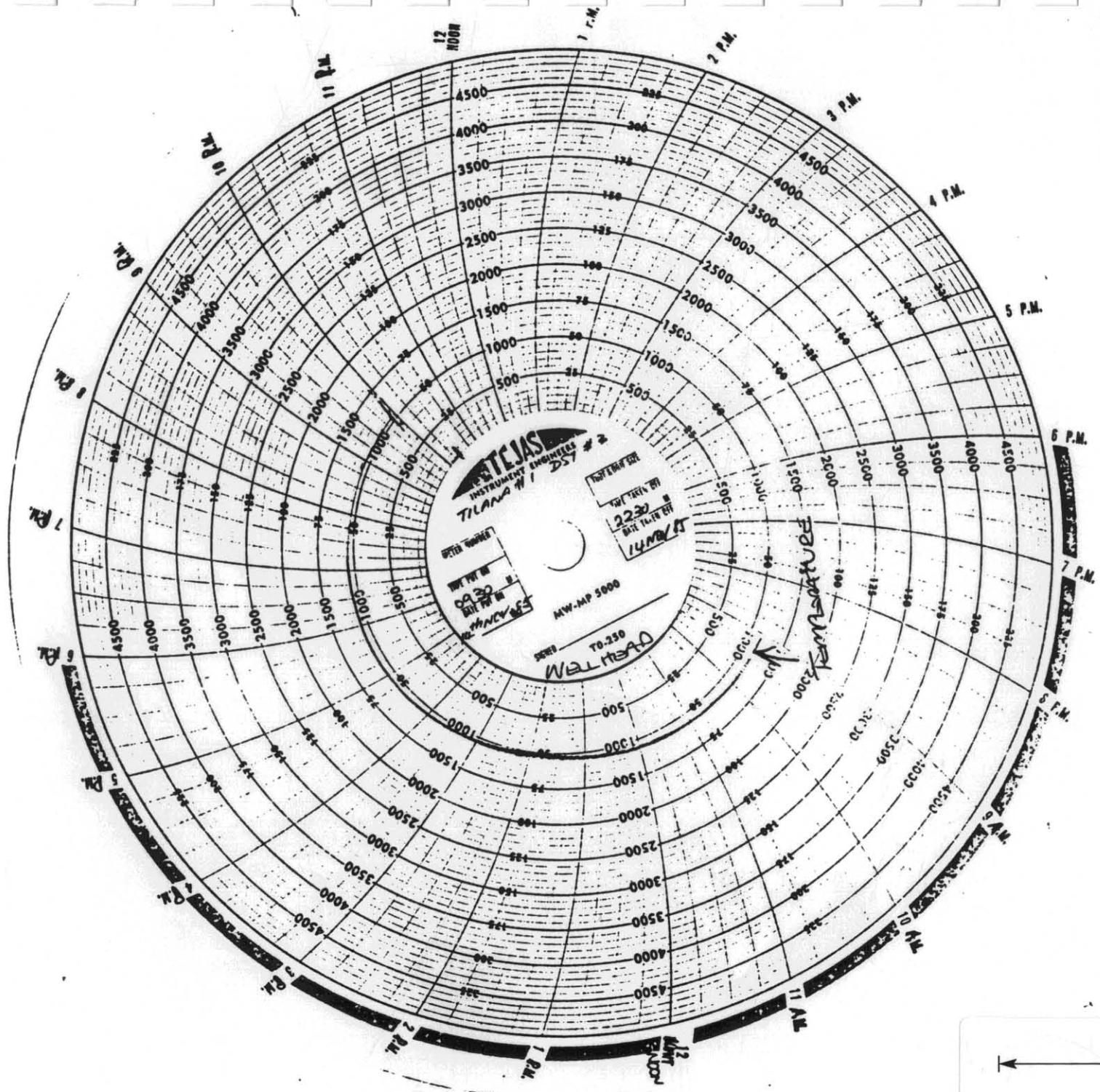
Computer From Texas Report

321100

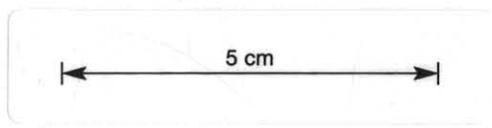


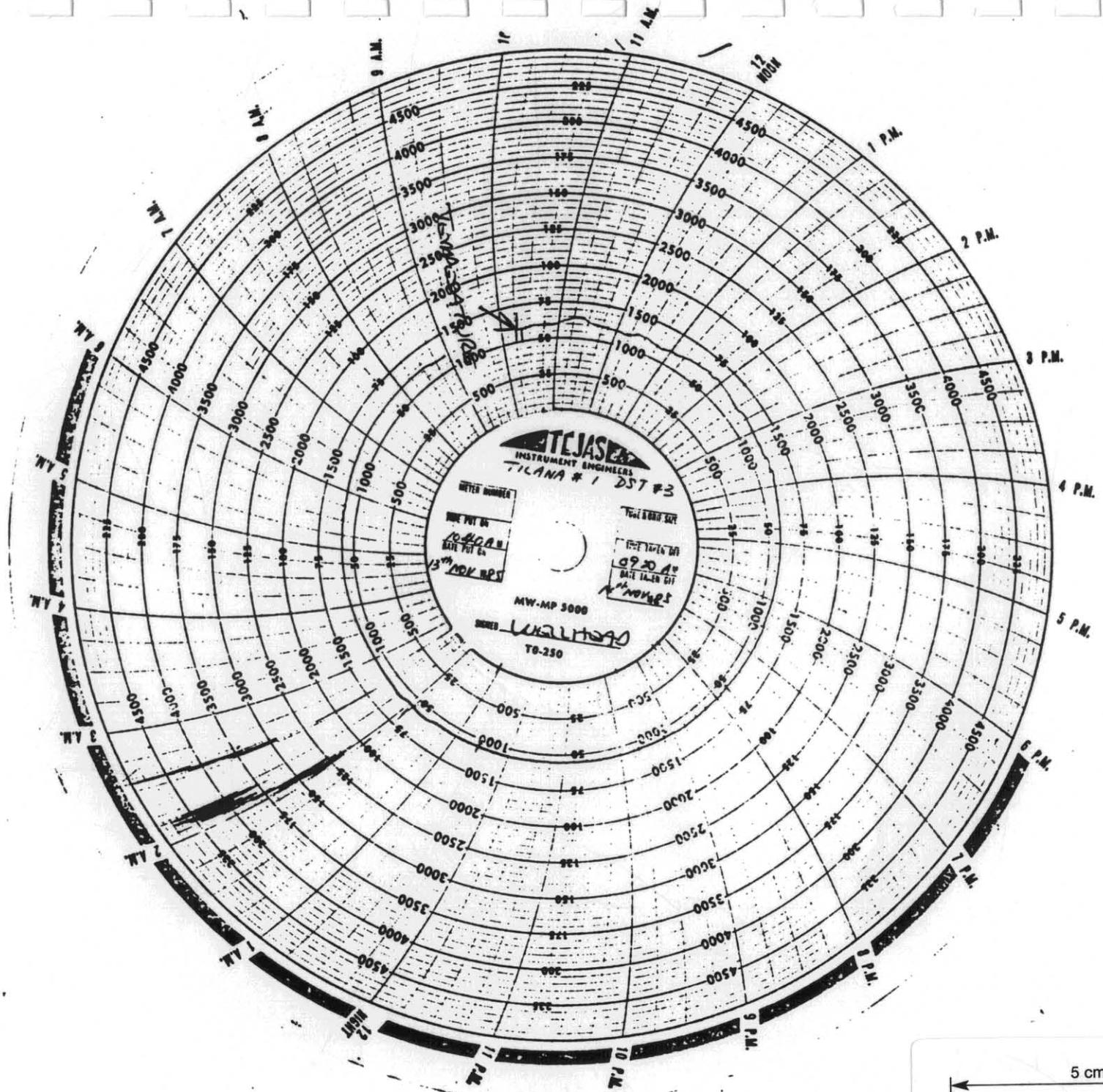
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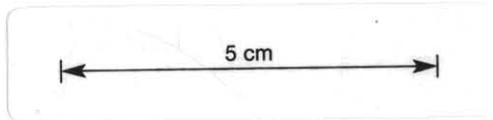


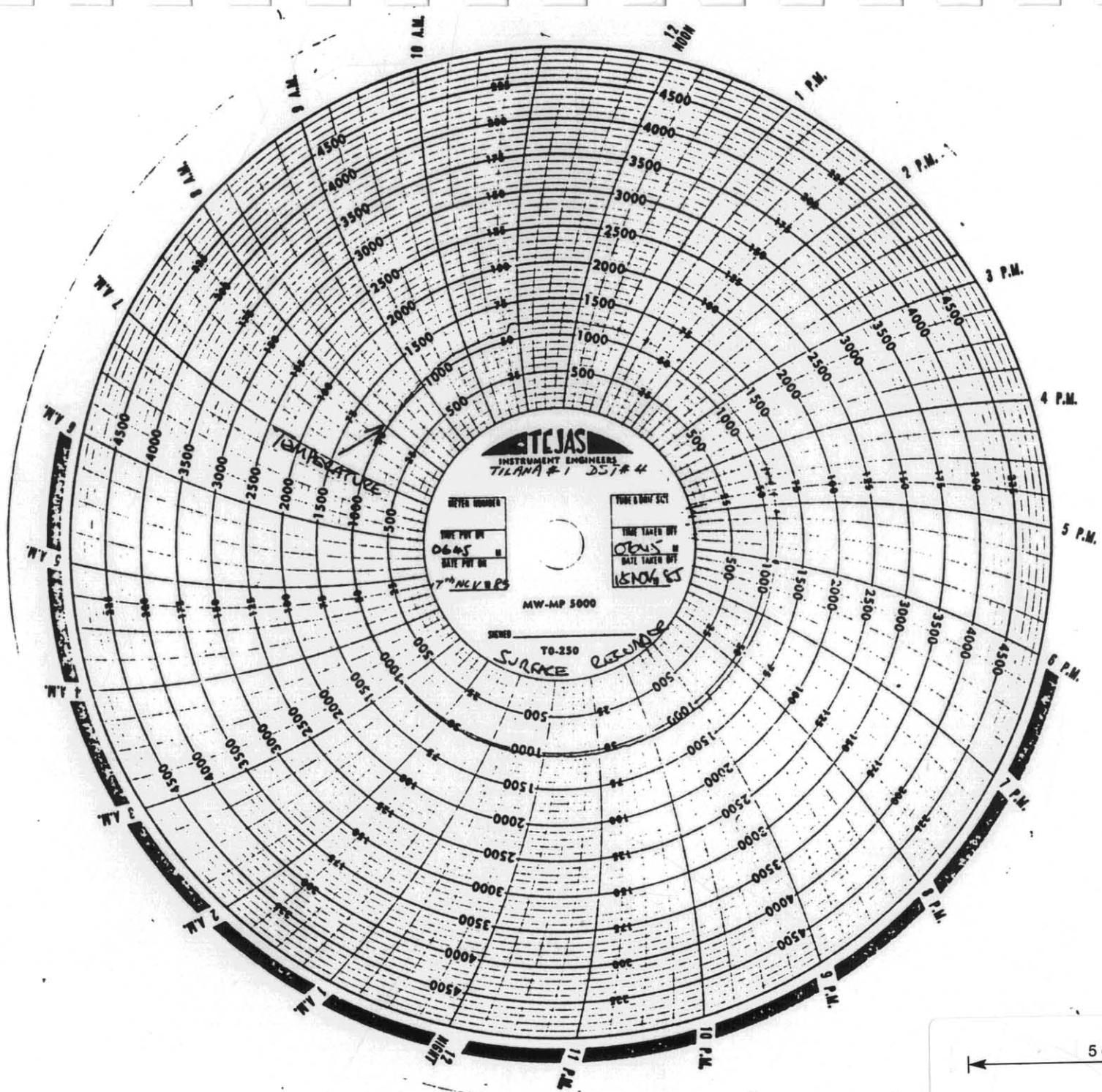
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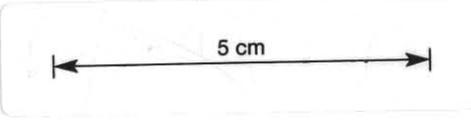


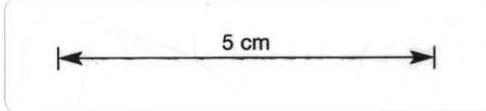
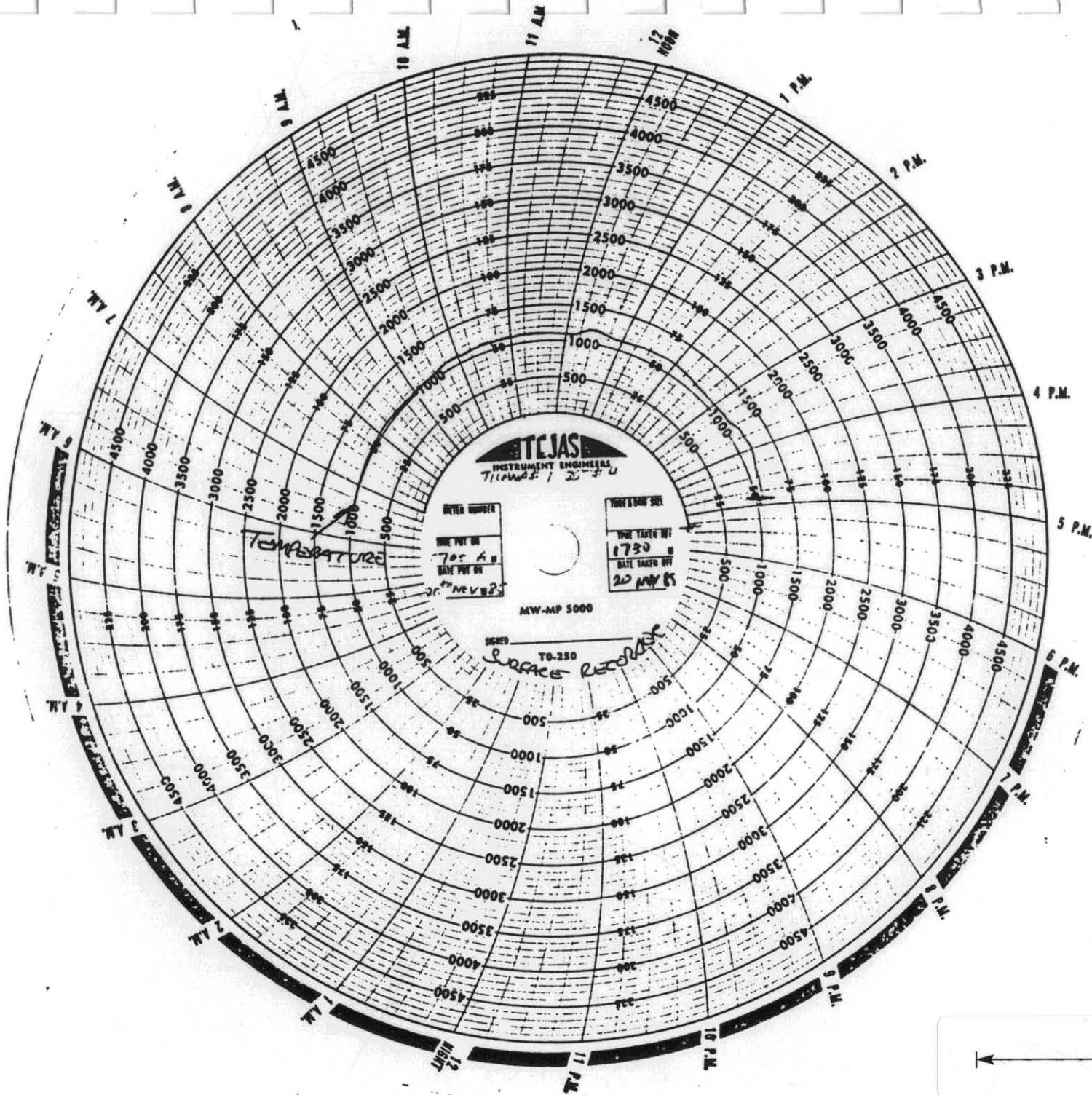
321104





321105





321106

APPENDIX 6

**HALLIBURTON FORMATION TESTING
SERVICE REPORTS**

321108

660



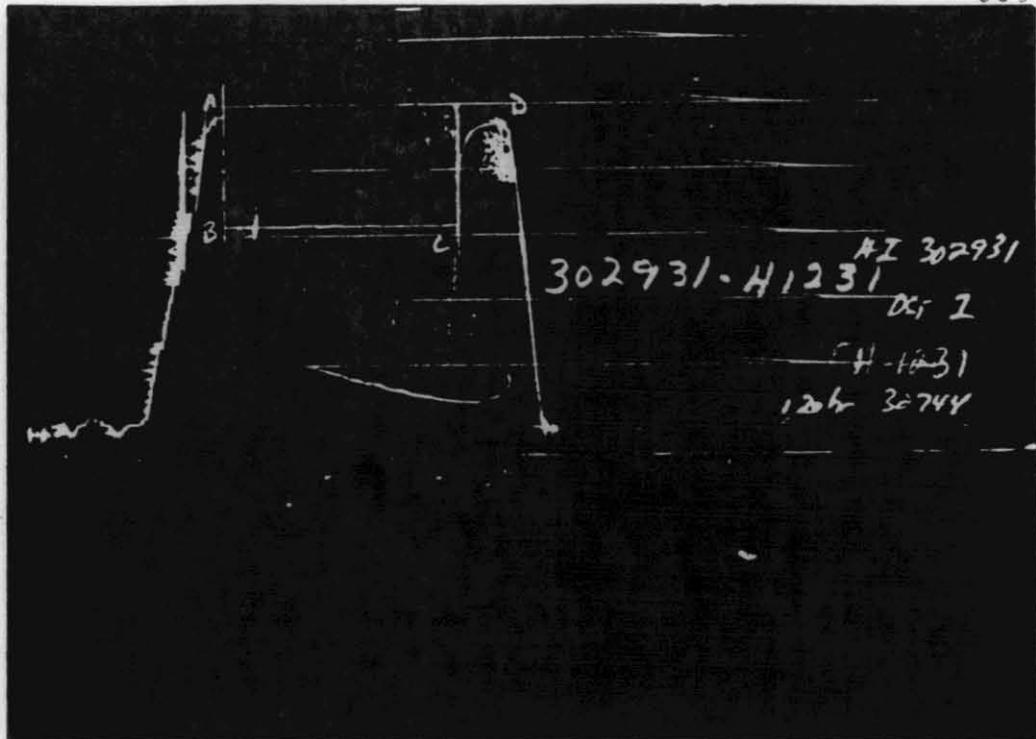
TICKET NO. 30299100
 09-DEC-85
 PERTH

FORMATION TESTING SERVICE REPORT

LEGAL LOCATION: TP14 TILBING
 LEASE NAME: _____
 WELL NO.: 1
 TEST NO.: 1-A
 FIELD NO.: _____
 BASS STRAIT
 COUNTY: OFFSHORE
 (OR) STATE: TASMANIA, AUSTRALIA
 AMOCO AUSTRALIA PETROLEUM COMPANY
 LEASE OWNER/COMPANY NAME: _____
 TESTED INTERVAL: 10301.0 - 10865.0

321109

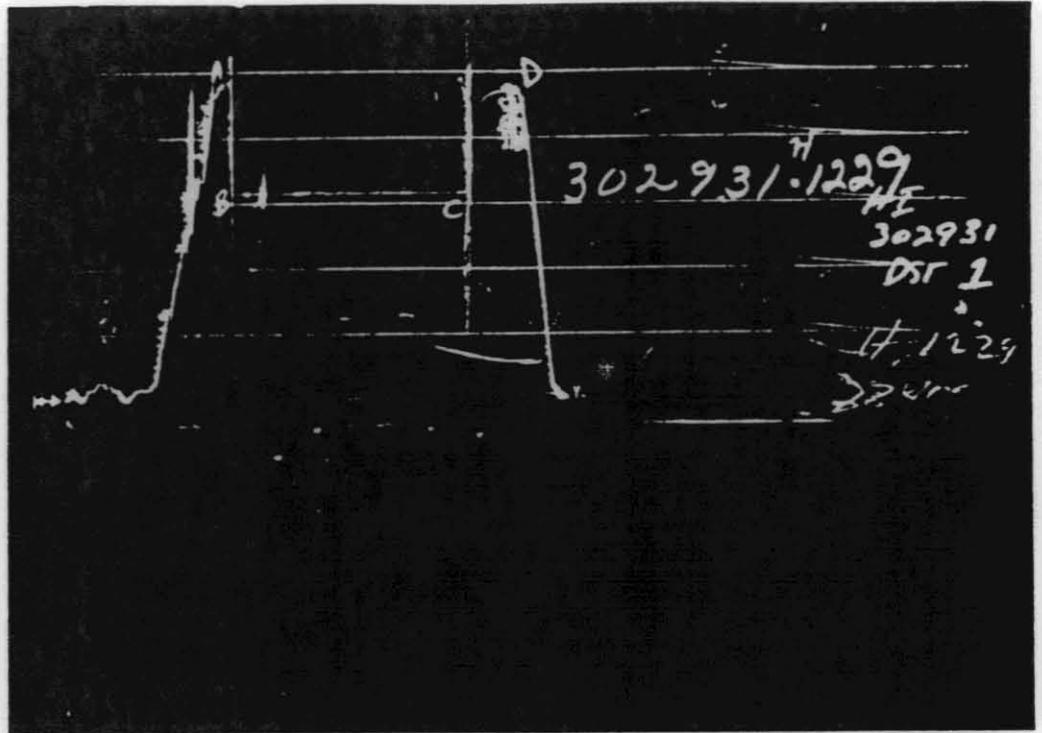
009



GAUGE NO: 1231 DEPTH: 10281.9 BLANKED OFF: NO HOUR OF CLOCK: 120

ID	DESCRIPTION	PRESSURE		TIME		TYPE
		REPORTED	CALCULATED	REPORTED	CALCULATED	
A	INITIAL HYDROSTATIC	4814	4822.9			
B	MIN. PSI AFTER PK. SET	3131	3127.9			
C	GUNS FIRED	4683	3130.1			
D	FINAL HYDROSTATIC	4721	4701.7			

321110



GAUGE NO: 1229 DEPTH: 10281.9 BLANKED OFF: NQ HOUR OF CLOCK: 120

ID	DESCRIPTION	PRESSURE		TIME		TYPE
		REPORTED	CALCULATED	REPORTED	CALCULATED	
A	INITIAL HYDROSTATIC	4822	4829.1			
B	MIN. PSI AFTER PK. SET	3148	3140.3			
C	GUNS FIRED	4749	3150.3			
D	FINAL HYDROSTATIC	4749	4714.0			

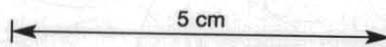
EQUIPMENT & HOLE DATA			TICKET NUMBER: 30293100		
FORMATION TESTED: SEE REMARKS			DATE: 11-11-85 TEST NO: 1-A		
NET PAY (ft): 20.0			TYPE DST: CASED HOLE W/LPR		
GROSS TESTED FOOTAGE: 564.0			HALLIBURTON CAMP:		
ALL DEPTHS MEASURED FROM: RKB			PERTH		
CASING PERFS. (ft): SEE REMARKS			TESTER: J.P. MC GARRY		
HOLE OR CASING SIZE (in): 9.625			WITNESS: J. GULLORY		
ELEVATION (ft): 73.0			DRILLING CONTRACTOR:		
TOTAL DEPTH (ft): 10865.0 CSG. SHOE			DIAMOND M-EPDCH		
PACKER DEPTH(S) (ft): 10301					
FINAL SURFACE CHOKE (in):					
BOTTOM HOLE CHOKE (in): 2.250					
MUD WEIGHT (lb/gal): 9.00					
MUD VISCOSITY (sec): 120					
ESTIMATED HOLE TEMP. (°F): 250					
ACTUAL HOLE TEMP. (°F): 242 @ 10281.9 ft					
FLUID PROPERTIES FOR RECOVERED MUD & WATER			SAMPLER DATA		
SOURCE	RESISTIVITY	CHLORIDES	Pctg AT SURFACE: _____		
_____	_____ °F	_____ ppm	cu.ft. OF GAS: _____		
_____	_____ °F	_____ ppm	cc OF OIL: _____		
_____	_____ °F	_____ ppm	cc OF WATER: _____		
_____	_____ °F	_____ ppm	cc OF MUD: _____		
_____	_____ °F	_____ ppm	TOTAL LIQUID cc: _____		
_____	_____ °F	_____ ppm			
HYDROCARBON PROPERTIES			CUSHION DATA		
OIL GRAVITY (°API): _____ @ _____ °F			TYPE AMOUNT WEIGHT		
GAS/OIL RATIO (cu.ft. per bbl): _____			SEAWATER (BBL) 122.0 8.55		
GAS GRAVITY: _____					
RECOVERED:					
MEASURED FROM TESTER VALVE					
REMARKS:					
PERFORATING UNDERBALANCED THROUGH DST STRING.					
WHEN GUNS FIRED, APR-M2 CIRCULATING VALVE OPENED DUMPING ANNULUS PRESSURE.					
FORMATION TESTED: EASTERN VIEW COAL MEASURES					
LEGAL LOCATION: LAT. 039 DEGREES-53'-36.96" SOUTH, LONG. 145 DEGREES-58' 42.20" EAST. CASING PERFORATION: 10429.79' TO 10449.48'					

TICKET NO. 30293100

		D.D.	I.D.	LENGTH	DEPTH	
1		DRILL PIPE.....	5.000	4.276	226.9	
5		CROSSOVER.....	6.500	2.880	3.6	
6		SUB-SEA TEST TREE.....	10.750	2.880	14.5	
5		CROSSOVER.....	6.500	2.880	1.8	
1		DRILL PIPE.....	5.000	4.276	9475.3	
5		CROSSOVER.....	6.250	2.750	1.0	
69		SURFACE READOUT (NON-HALLIBURTON).....	4.625	2.280	2.0	9814.5
5		CROSSOVER.....	6.250	2.875	1.1	
5		CROSSOVER.....	6.375	2.438	1.2	
93		FUL-FLO SAFETY VALVE.....	5.000	2.250	4.6	9818.0
5		CROSSOVER.....	6.125	2.875	1.0	
3		DRILL COLLARS.....	6.438	2.875	93.3	
5		CROSSOVER.....	6.125	2.313	1.0	
10		SLIP JOINT.....	5.000	2.250	18.2	
10		SLIP JOINT.....	5.000	2.250	15.2	
10		SLIP JOINT.....	5.000	2.250	13.2	
5		CROSSOVER.....	6.125	2.875	1.0	
3		DRILL COLLARS.....	6.438	2.875	279.4	
5		CROSSOVER.....	6.125	2.313	1.0	
52		APR-TYPE "A" CIRCULATING VALVE..	5.000	2.250	3.0	10247.1
54		APR-M2 SAFETY CIRCULATING VALVE.	5.000	2.250	7.5	10250.1
67		LPR-M TESTER VALVE.....	5.000	2.250	16.4	10259.6
84		BUNDLE CARRIER.....	5.375	2.250	6.0	10281.9
15		JAR.....	4.625	2.250	5.2	
57		FUL-FLO HYDRAULIC BYPASS.....	4.625	2.250	7.2	10294.4
5		CROSSOVER.....	4.750	2.438	0.9	
16		VR SAFETY JOINT.....	4.625	2.250	4.1	
71		CASING PACKER.....	7.800	3.000	5.3	10301.0
1		DRILL PIPE.....	5.000	4.276	31.6	

CONTINUED

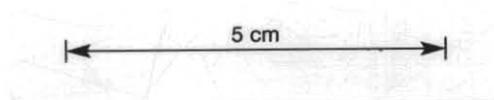
EQUIPMENT DATA



TICKET NO. 30293100

	O.D.	I.D.	LENGTH	DEPTH
5 <input type="checkbox"/> CROSSOVER.....	6.375	2.813	1.7	
TOTAL DEPTH				10865.0

EQUIPMENT DATA



321115

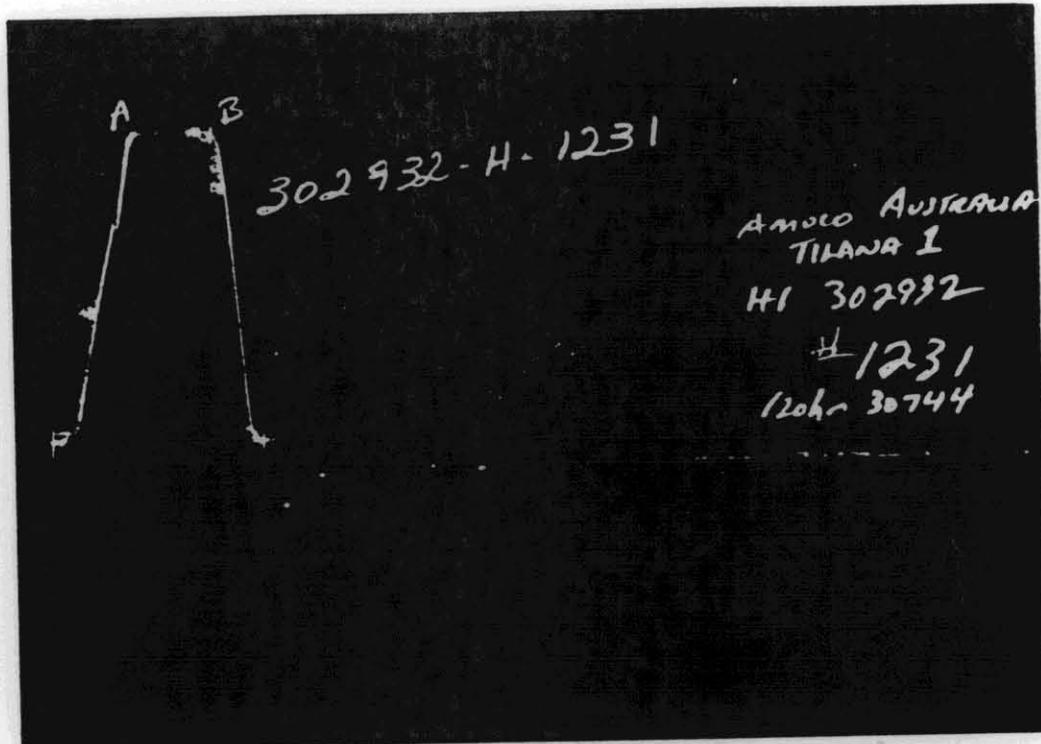
672



TICKET NO. 90293200
 03-DEC-85
 PERTH

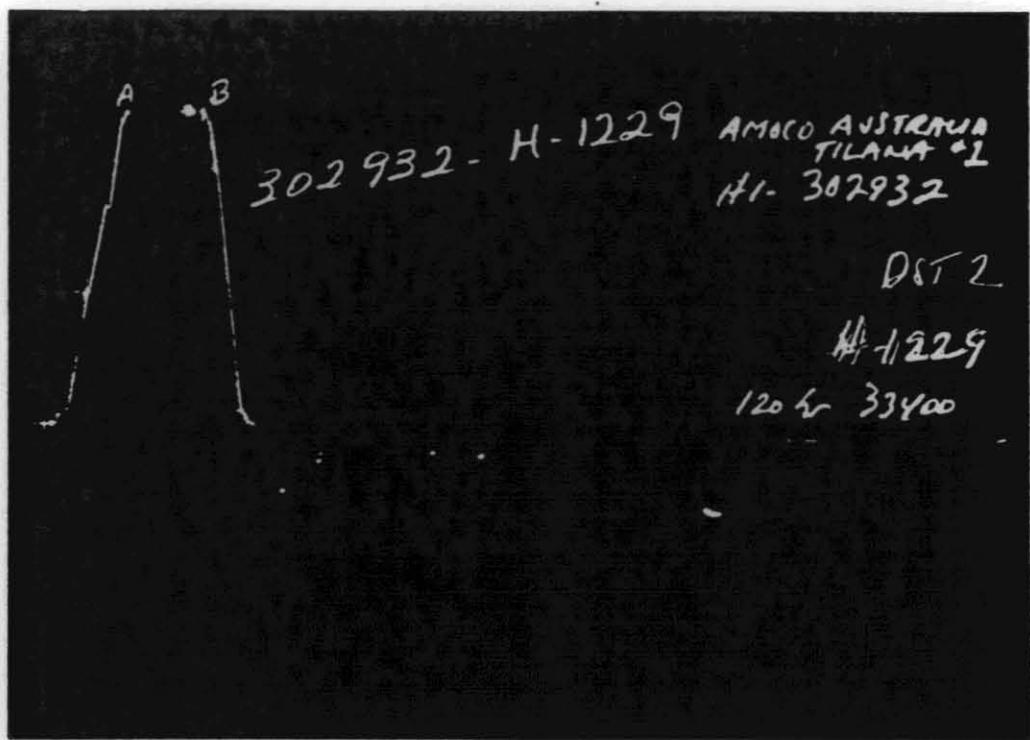
FORMATION TESTING SERVICE REPORT

LEGAL LOCATION LEASE NAME	WELL NO.	TEST NO.	FIELD AREA	BOSS STRAIT	COUNTY	OFFSHORE	IC	STATE	TASMANIA, AUSTR.
TP/14 TILBARR		1-B							
				10293.5 - 10865.0					
				TESTED INTERVAL					
									AMOCO AUSTRALIA PETROLEUM COMPANY
									LEASE OWNER/COMPANY NAME



GAUGE NO: 1231 DEPTH: 10274.4 BLANKED OFF: NO HOUR OF CLOCK: 120

ID	DESCRIPTION	PRESSURE		TIME		TYPE
		REPORTED	CALCULATED	REPORTED	CALCULATED	
A	INITIAL HYDROSTATIC	4720	4752.8			
B	FINAL HYDROSTATIC	4714	4741.3			



GAUGE NO: 1229 DEPTH: 10274.4 BLANKED OFF: NO HOUR OF CLOCK: 120

ID	DESCRIPTION	PRESSURE		TIME		TYPE
		REPORTED	CALCULATED	REPORTED	CALCULATED	
A	INITIAL HYDROSTATIC	4730	4762.6			
B	FINAL HYDROSTATIC	4742	4755.8			

EQUIPMENT & HOLE DATA			TICKET NUMBER: 30293200		
FORMATION TESTED: SEE REMARKS			DATE: 11-12-85 TEST NO: 1-B		
NET PAY (ft): 20.0			TYPE DST: <u>CASED HOLE W/LPR</u>		
GROSS TESTED FOOTAGE: 571.5			HALLIBURTON CAMP: _____		
ALL DEPTHS MEASURED FROM: <u>R. KELLY BUSHING</u>			PERTH		
CASING PERFS. (ft): 10429.79-10449.8			TESTER: <u>J. P. MC GARRY</u>		
HOLE OR CASING SIZE (in): 9.625			WITNESS: <u>J. GUILLORY</u>		
ELEVATION (ft): 73.0			DRILLING CONTRACTOR: _____		
TOTAL DEPTH (ft): 10865.0 CASING SHOE			DIAMOND M DRILLING		
PACKER DEPTH(S) (ft): 10294					
FINAL SURFACE CHOKE (in): _____					
BOTTOM HOLE CHOKE (in): 2.250					
MUD WEIGHT (lb/gal): 9.00					
MUD VISCOSITY (sec): 120					
ESTIMATED HOLE TEMP. (°F): 250					
ACTUAL HOLE TEMP. (°F): 256 @ 10274.4 ft					
FLUID PROPERTIES FOR RECOVERED MUD & WATER			SAMPLER DATA		
SOURCE	RESISTIVITY	CHLORIDES	Pctg AT SURFACE: _____		
_____	_____ °F	_____ ppm	cu.ft. OF GAS: _____		
_____	_____ °F	_____ ppm	cc OF OIL: _____		
_____	_____ °F	_____ ppm	cc OF WATER: _____		
_____	_____ °F	_____ ppm	cc OF MUD: _____		
_____	_____ °F	_____ ppm	TOTAL LIQUID cc: _____		
_____	_____ °F	_____ ppm			
HYDROCARBON PROPERTIES			CUSHION DATA		
OIL GRAVITY (°API): _____ @ _____ °F			TYPE	AMOUNT	WEIGHT
GAS/OIL RATIO (cu.ft. per bbl): _____			<u>SEAWATER (BBL)</u>	<u>122.0</u>	<u>8.70</u>
GAS GRAVITY: _____					
RECOVERED:					
REMARKS:					
LPR-N DID NOT OPEN. TOOL FUNCTION TESTED AT SURFACE WHEN BROUGHT OUT OF HOLE - TOOL FUNCTION OKAY AT SURFACE. PINS DID NOT SHEAR DOWN HOLE - POSSIBLE JUNK AROUND PRESSURE ENTRY PORTS.					
LEGAL LOCATION: LAT. 039 DEG., 53', 36.96"S; LONG. 145 DEG., 58', 42.20"E.					
FORMATION TESTED: EASTERN VIEW COAL MEASURES.					

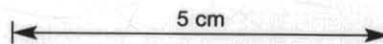
MEASURED FROM TESTER VALVE

TICKET NO. 30293200

		O.D.	I.O.	LENGTH	DEPTH	
1		DRILL PIPE.....	5.000	4.276	228.9	
5		CROSSOVER.....	6.500	2.880	3.6	
6		SUB-SEA TEST TREE.....	10.750	2.880	14.5	
5		CROSSOVER.....	6.500	2.880	1.8	
1		DRILL PIPE.....	5.000	4.276	9475.3	
5		CROSSOVER.....	6.250	2.750	1.0	
69		SURFACE READOUT(NON-HALLIBURTON)	4.625	2.280	2.0	9814.5
5		CROSSOVER.....	6.250	2.875	1.1	
5		CROSSOVER.....	6.375	2.438	1.2	
93		FUL-FLO SAFETY VALVE.....	5.000	2.250	4.8	9818.8
5		CROSSOVER.....	6.125	2.875	1.0	
3		DRILL COLLARS.....	6.438	2.875	93.1	
5		CROSSOVER.....	6.250	2.313	1.0	
10		SLIP JOINT.....	5.000	2.250	18.2	
10		SLIP JOINT.....	5.000	2.250	15.7	
10		SLIP JOINT.....	5.000	2.250	13.2	
5		CROSSOVER.....	6.125	2.875	1.0	
3		DRILL COLLARS.....	6.438	2.875	279.4	
5		CROSSOVER.....	6.125	2.313	1.0	
52		APR-TYPE "A" CIRCULATING VALVE..	5.000	2.250	3.0	10250.1
67		LPR-N TESTER VALVE.....	5.000	2.250	16.4	10252.1
84		BUNDLE CARRIER.....	5.375	2.250	8.0	10274.4
15		JAR.....	4.625	2.250	5.2	
57		FUL-FLO HYDRAULIC BYPASS.....	4.625	2.250	7.2	10286.8
5		CROSSOVER.....	4.750	2.438	0.9	
18		VR SAFETY JOINT.....	4.625	2.250	4.1	
71		CASING PACKER.....	7.800	3.000	5.3	10293.5
1		DRILL PIPE.....	5.000	4.276	91.6	

CONTINUED

EQUIPMENT DATA



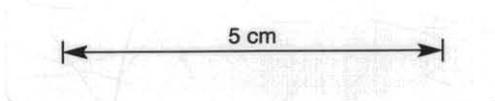
321121

52

TICKET NO. 30293200

	O.D.	I.D.	LENGTH	DEPTH
5 <input type="checkbox"/> CROSSOVER.....	6.375	2.813	1.7	
TOTAL DEPTH				10665.0

EQUIPMENT DATA



321122

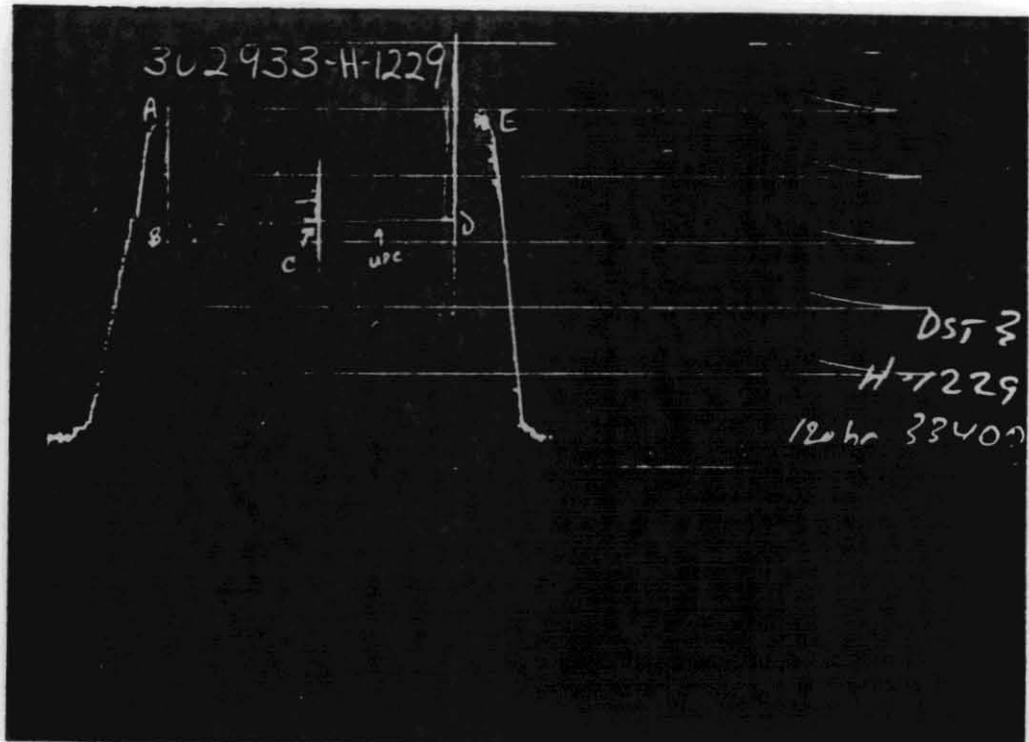
779

TP-14 TILBIR
 LEASE NAME
 WELL NO. 1
 TEST NO. 1-C
 10295.0 - 10865.0
 TESTED INTERVAL
 BMDCO AUSTRALIA PETROLEUM COMPANY
 LEASE OWNER/COMPANY NAME
 LEGAL LOCATION
 SEC - TWP - RANG. SEE REMARKS
 FIELD AREA
 BASS STRAIGHT
 COUNTY OFFSHORE (BIC) STATE TASMANIA, AUST.



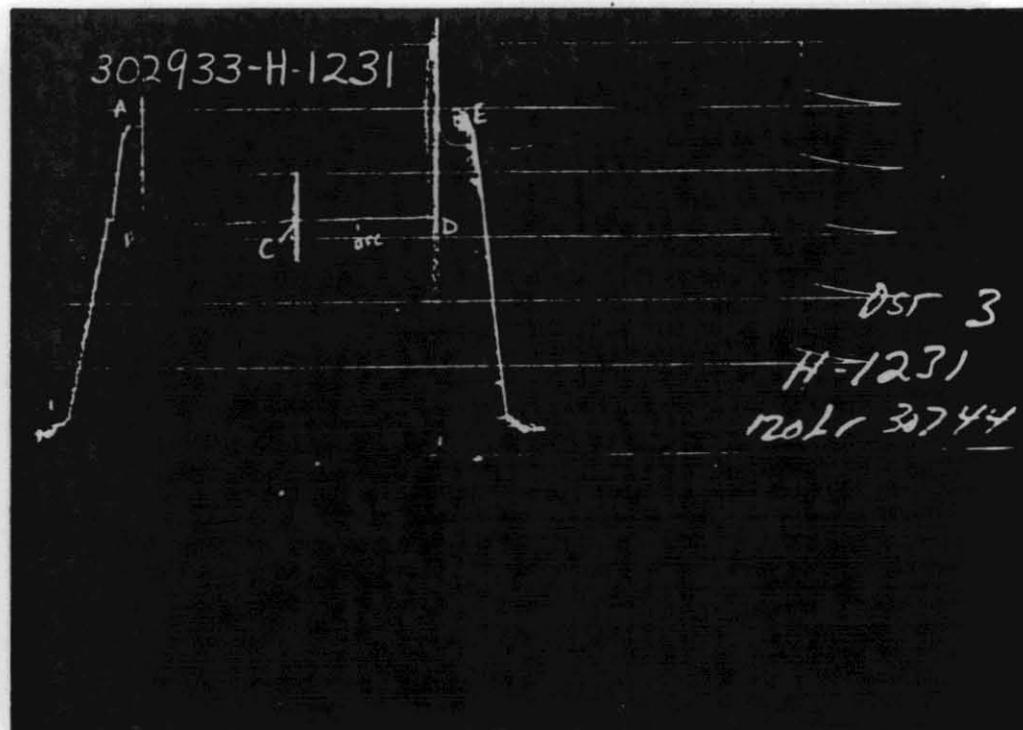
TICKET NO. 90299300
 04-DEC-85
 PERTH

FORMATION TESTING SERVICE REPORT



GAUGE NO: 1229 DEPTH: 10275.9 BLANKED OFF: NO HOUR OF CLOCK: 120

ID	DESCRIPTION	PRESSURE		TIME		TYPE
		REPORTED	CALCULATED	REPORTED	CALCULATED	
A	INITIAL HYDROSTATIC	4724	4744.8			
B	MIN. PSI AFTER PKR. SET	3148	3150.3			
C	INITIAL FIRST FLOW	3210	3296.4	1014	1014	F
D	FINAL FIRST FLOW	3309	3319.2			
E	FINAL HYDROSTATIC	4730	4744.8			



GAUGE NO: 1231 DEPTH: 10275.9 BLANKED OFF: NO HOUR OF CLOCK: 120

ID	DESCRIPTION	PRESSURE		TIME		TYPE
		REPORTED	CALCULATED	REPORTED	CALCULATED	
A	INITIAL HYDROSTATIC	4733	4755.2			
B	MIN. PSI AFTER PKR. SET	3125	3136.1			
C	INITIAL FIRST FLOW	3194	3276.7	1014	1014	F
D	FINAL FIRST FLOW	3300	3299.4			
E	FINAL HYDROSTATIC	4758	4755.2			

EQUIPMENT & HOLE DATA			TICKET NUMBER: 30293300		
FORMATION TESTED: E.VIEW COAL MEASURES			DATE: 11-15-85 TEST NO: 1-C		
NET PAY (ft): 20.0			TYPE DST: CASED HOLE W/LPR		
GROSS TESTED FOOTAGE: 570.0			HALLIBURTON CAMP:		
ALL DEPTHS MEASURED FROM: RKB			PERTH		
CASING PERFS. (ft): SEE REMARKS			TESTER: J. P. MC GARRY		
HOLE OR CASING SIZE (in): 9.625			WITNESS:		
ELEVATION (ft): 73.0			DRILLING CONTRACTOR:		
TOTAL DEPTH (ft): 10865.0 CASING SHOE			DIAMOND "M" DRILLING COMPANY		
PACKER DEPTH(S) (ft): 10295					
FINAL SURFACE CHOKE (in):					
BOTTOM HOLE CHOKE (in): 2.250					
MUD WEIGHT (lb/gal): 9.00					
MUD VISCOSITY (sec): 120					
ESTIMATED HOLE TEMP. (°F): 250					
ACTUAL HOLE TEMP. (°F): 258 @ 10275.9 ft					
FLUID PROPERTIES FOR RECOVERED MUD & WATER			SAMPLER DATA		
SOURCE	RESISTIVITY	CHLORIDES	Pctg AT SURFACE: _____		
_____	_____ °F	_____ ppm	cu.ft. OF GAS: _____		
_____	_____ °F	_____ ppm	cc OF OIL: _____		
_____	_____ °F	_____ ppm	cc OF WATER: _____		
_____	_____ °F	_____ ppm	cc OF MUD: _____		
_____	_____ °F	_____ ppm	TOTAL LIQUID cc: _____		
_____	_____ °F	_____ ppm			
HYDROCARBON PROPERTIES			CUSHION DATA		
OIL GRAVITY (°API): _____ °F			TYPE AMOUNT WEIGHT		
GAS/OIL RATIO (cu.ft. per bbl): _____			SEAWATER (BBL.) 121.5 8.55		
GAS GRAVITY: _____					
RECOVERED:					
NO FLUID RECOVERED					
MEASURED FROM TESTER VALVE					
REMARKS:					
NO FLOW OR PRESSURE TO SURFACE.....					
LEGAL LOCATION = LAT. 039 DEGREES 53' 36.96" SOUTH					
LONG. 145 DEGREES 58' 42.20" EAST.					
CASING PERFORATIONS = 10429.79' TO 10449.48'.					

TYPE & SIZE MEASURING DEVICE: _____					TICKET NO: 30293300
TIME	CHOKE SIZE	SURFACE PRESSURE PSI	GAS RATE MCF	LIQUID RATE BPD	REMARKS
11-12-85					
2300					MADE UP TOOLS. RAN IN HOLE.
11-13-85					
0930					SET PACKER
1105					OPENED LPR
1110					VERY WEAK BLOW WITH BUBBLES EVERY 55 SECONDS.
1119					SHUT IN AT CHOKE MANIFOLD.
1332					SHUT IN LPR-N
1346					OPENED LPR-N WITH A WEAK BLOW AT SURFACE
1445					RIGGED UP SCHLUMBERGER TO GO IN AND RE-PERFORATE WELL
1740					GUNS UNABLE TO GO PAST 3025 METERS. PULLED OUT OF HOLE WITH GUNS.
2125					RAN IN HOLE WITH 2" GAUGE CUTTER WITH A MEDIUM BLOW AT SURFACE.
11-14-85					
0025					RIG UP, RAN PERFORATING GUNS.
0546					TEST ZONE RE-PERFORATED WITH NO BLOW AT SURFACE
0900					RAN OTIS HP GAUGE FOR GRADIENT SURVEY
1930					RAN IN HOLE WITH OTIS SAMPLERS
2200					RETRIEVED SAMPLERS
2240					PRESSURED UP AND OPENED APR-A REVERSING TOOL
2245					REVERSED OUT SEAWATER CUSHION
11-15-85					
0200					OPENED BY-PASS
0210					UNSEATED PACKER
0225					PULLED OUT OF HOLE
0930					TOOLS OUT OF HOLE.

TICKET NO: 30293300
 CLOCK NO: 0 HOUR: 120



GAUGE NO: 1229
 DEPTH: 10275.9

REF	MINUTES	PRESSURE	AP	$\frac{1 \times \Delta P}{1 \times \Delta t}$	$\log \frac{1 \times \Delta P}{\Delta t}$	REF	MINUTES	PRESSURE	AP	$\frac{1 \times \Delta P}{1 \times \Delta t}$	$\log \frac{1 \times \Delta P}{\Delta t}$
FIRST FLOW											
C	1	0	3296.4								
	2	60	3288.0	-8.4							
	3	120	3288.0	0.0							
	4	180	3288.0	0.0							
	5	240	3288.0	0.0							
	6	300	3290.5	2.5							
	7	360	3290.5	0.0							
<input checked="" type="checkbox"/>	8	417	3292.4	1.9							
	9	420	3313.0	20.6							
	10	480	3316.1	3.1							
	11	540	3316.1	0.0							
	12	600	3316.1	0.0							
	13	660	3316.1	0.0							
	14	720	3314.5	-1.6							
	15	780	3314.5	0.0							
	16	840	3314.5	0.0							
	17	900	3316.1	1.6							
	18	960	3316.1	0.0							
D	19	1014	3319.2	3.1							

LEGEND:
 UNEXPLAINED PRESSURE CHANGE
 REMARKS:

TICKET NO: 30293300
 CLOCK NO: 30744 HOUR: 120



GAUGE NO: 1231
 DEPTH: 10275.9

REF	MINUTES	PRESSURE	AP	$\frac{1 \times \Delta P}{1 \times \Delta t}$	$\log \frac{1 \times \Delta P}{\Delta t}$	REF	MINUTES	PRESSURE	AP	$\frac{1 \times \Delta P}{1 \times \Delta t}$	$\log \frac{1 \times \Delta P}{\Delta t}$
FIRST FLOW											
C	1	0	3276.7								
	2	60	3266.3	-10.4							
	3	120	3266.9	0.6							
	4	180	3269.4	2.5							
	5	240	3272.3	2.8							
	6	300	3276.7	4.4							
	7	360	3276.7	0.0							
<input checked="" type="checkbox"/>	8	417	3276.7	0.0							
	9	420	3279.2	2.5							
	10	480	3294.3	15.1							
	11	540	3291.5	-2.8							
	12	600	3291.5	0.0							
	13	660	3291.5	0.0							
	14	720	3295.6	4.1							
	15	780	3295.6	0.0							
	16	840	3295.6	0.0							
	17	900	3302.2	6.6							
	18	960	3302.2	0.0							
D	19	1014	3299.4	-2.8							

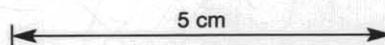
LEGEND:
 UNEXPLAINED PRESSURE CHANGE
REMARKS:

TICKET NO. 30293300

		O.D.	I.D.	LENGTH	DEPTH
1	DRILL PIPE.....	5.000	4.276	228.9	
5	CROSSOVER.....	6.500	2.680	3.6	
6	SUB-SEA TEST TREE.....	10.750	2.680	14.5	
5	CROSSOVER.....	6.500	2.680	1.8	
1	DRILL PIPE.....	5.000	4.276	9475.3	
5	CROSSOVER.....	6.250	2.750	1.0	
69	SURFACE READOUT (NON-HALLIBURTON)	4.625	2.280	2.0	9818.9
5	CROSSOVER.....	6.250	2.875	1.1	
5	CROSSOVER.....	6.375	2.438	1.2	
93	FUL-FLO SAFETY VALVE.....	5.000	2.250	4.8	9823.2
5	CROSSOVER.....	6.125	2.875	1.0	
3	DRILL COLLARS.....	6.438	2.875	93.1	
5	CROSSOVER.....	6.125	2.313	1.0	
10	SLIP JOINT.....	5.000	2.250	18.2	
10	SLIP JOINT.....	5.000	2.250	15.7	
10	SLIP JOINT.....	5.000	2.250	13.2	
5	CROSSOVER.....	6.125	2.875	1.0	
3	DRILL COLLARS.....	6.438	2.875	186.3	
5	CROSSOVER.....	6.125	2.688	0.9	
52	APR-TYPE "A" CIRCULATING VALVE..	5.000	2.250	3.0	10153.4
5	CROSSOVER.....	6.188	2.750	1.1	
3	DRILL COLLARS.....	6.438	2.875	93.1	
5	CROSSOVER.....	6.125	2.313	1.0	
67	LPR-N TESTER VALVE.....	5.000	2.250	16.4	10253.6
64	BUNDLE CARRIER.....	5.375	2.250	8.0	10275.9
15	JAR.....	4.625	2.250	5.2	
57	FUL-FLO HYDRAULIC BYPASS.....	4.625	2.250	7.2	10288.4
5	CROSSOVER.....	4.750	2.438	0.9	
16	VR SAFETY JOINT.....	4.625	2.250	4.1	
71	CASING PACKER.....	7.800	3.000	5.3	10295.0

CONTINUED

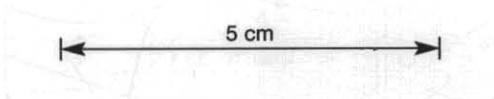
EQUIPMENT DATA



TICKET NO. 30293300

		O.D.	I.D.	LENGTH	DEPTH
1	 DRILL PIPE.....	5.000	4.276	91.6	
5	 CROSSOVER.....	6.375	2.813	1.7	
TOTAL DEPTH					10865.0

EQUIPMENT DATA

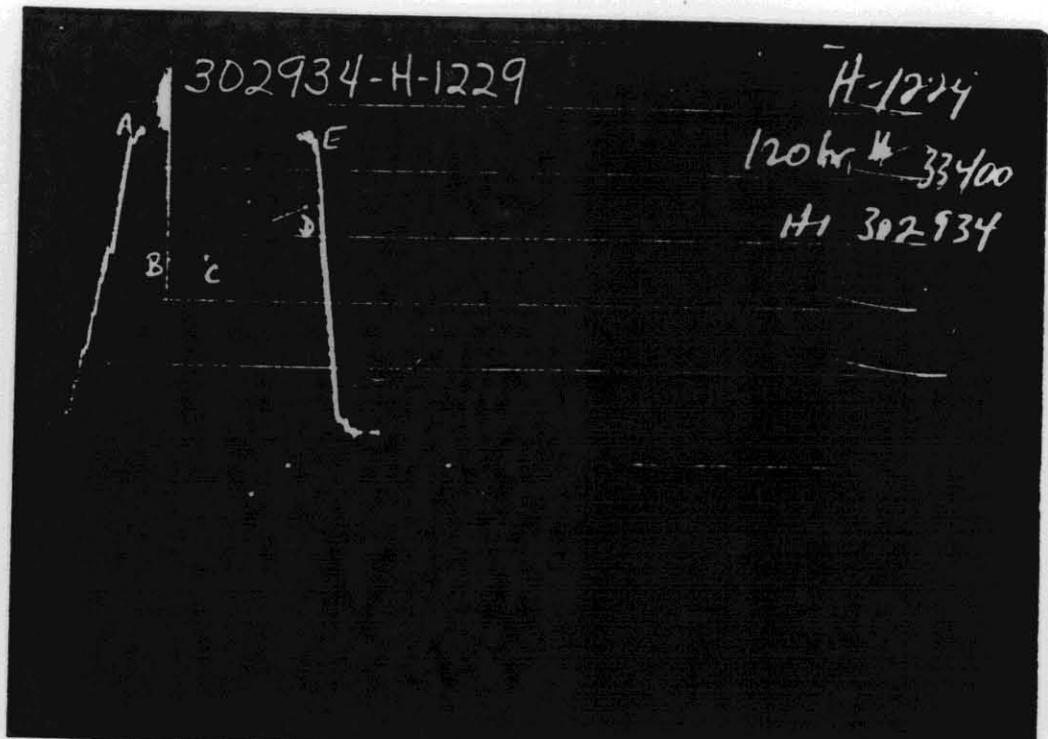


TP-14 TILMAN
 LEASE NAME
 WELL NO. 1
 TEST NO. 2-A
 9848.8 -
 TESTED INTERVAL
 ANOCO AUSTRALIA PETROLEUM COMPANY
 LEASE OWNER/COMPANY NAME
 LEGAL LOCATION
 SEC. - TWP. - RANG.
 SEE REMARKS
 FIELD AREA
 BGS5 STRAIGHT
 COUNTY OFFSHORE (BGL)
 STATE TASMANIA, AUST.



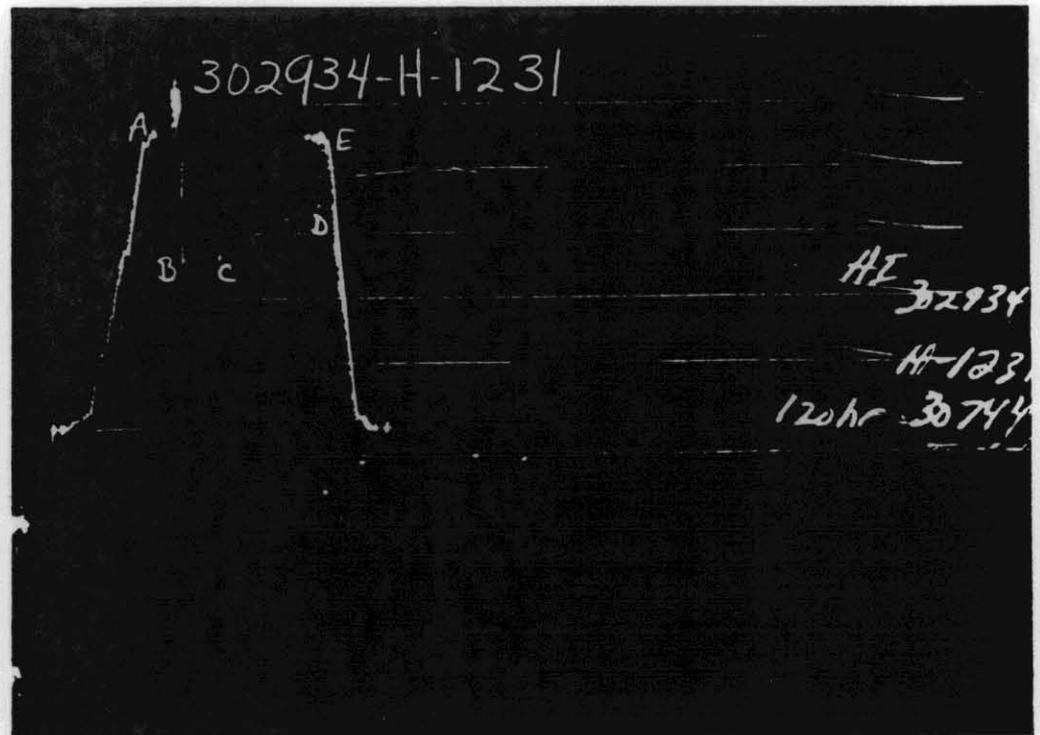
TICKET NO. 30293400
 03-DEC-85
 PERTH

FORMATION TESTING SERVICE REPORT



GAUGE NO: 1229 DEPTH: 9829.8 BLANKED OFF: NO HOUR OF CLOCK: 120

ID	DESCRIPTION	PRESSURE		TIME		TYPE
		REPORTED	CALCULATED	REPORTED	CALCULATED	
A	INITIAL HYDROSTATIC	4531	4908.9			
B	INITIAL FIRST FLOW	2601	2603.0	300	300	F
C	FINAL FIRST FLOW		2642.8			
C	INITIAL FIRST CLOSED-IN		2642.8	692	692	C
D	FINAL FIRST CLOSED-IN		3436.5			
E	FINAL HYDROSTATIC	4475	4487.7			



GAUGE NO: 1231 DEPTH: 9829.8 BLANKED OFF: NO HOUR OF CLOCK: 120

ID	DESCRIPTION	PRESSURE		TIME		TYPE
		REPORTED	CALCULATED	REPORTED	CALCULATED	
A	INITIAL HYDROSTATIC	4528	4908.4			
B	INITIAL FIRST FLOW	2590	2590.3			
C	FINAL FIRST FLOW		2627.8	300	300	F
C	INITIAL FIRST CLOSED-IN		2627.8			
D	FINAL FIRST CLOSED-IN		3415.5	692	692	C
E	FINAL HYDROSTATIC	4478	4492.6			

EQUIPMENT & HOLE DATA		TICKET NUMBER: 30293400	
FORMATION TESTED: _____		DATE: 11-18-85 TEST NO: 2-A	
NET PAY (ft): _____		TYPE DST: CASED HOLE W/LPR	
GROSS TESTED FOOTAGE: _____		HALLIBURTON CAMP: PERTH	
ALL DEPTHS MEASURED FROM: RKB		TESTER: J. P. MC GARRY	
CASING PERFS. (ft): NONE REPORTED		WITNESS: _____	
HOLE OR CASING SIZE (in): 9.625		DRILLING CONTRACTOR: DIAMOND "M" EXPLORATION	
ELEVATION (ft): 73.0			
TOTAL DEPTH (ft): NOT REPORTED			
PACKER DEPTH(S) (ft): 9849			
FINAL SURFACE CHOKE (in): _____			
BOTTOM HOLE CHOKE (in): _____			
MUD WEIGHT (lb/gal): 9.00			
MUD VISCOSITY (sec): 120			
ESTIMATED HOLE TEMP. (°F): 245			
ACTUAL HOLE TEMP. (°F): 248 @ 9829.8 ft			
FLUID PROPERTIES FOR RECOVERED MUD & WATER		SAMPLER DATA	
SOURCE	RESISTIVITY	CHLORIDES	Pctg AT SURFACE: _____
_____	● °F	ppm	cu.ft. OF GAS: _____
_____	● °F	ppm	cc OF OIL: _____
_____	● °F	ppm	cc OF WATER: _____
_____	● °F	ppm	cc OF MUD: _____
_____	● °F	ppm	TOTAL LIQUID cc: _____
_____	● °F	ppm	
_____	● °F	ppm	
HYDROCARBON PROPERTIES		CUSHION DATA	
OIL GRAVITY (°API): _____ @ _____ °F		TYPE	AMOUNT
GAS/OIL RATIO (cu.ft. per bbl): _____		SEAWATER (ABL.)	WEIGHT
GAS GRAVITY: _____		_____	99.0 8.55
RECOVERED:			
REMARKS:			
LEGAL LOCATION - LAT. 039 DEGREES 53' 36.96" SOUTH			
LONG. 145 DEGREES 58' 42.20" EAST.			
THE BOTTOM OF THE TESTED INTERVAL (TOTAL DEPTH) WAS NOT REPORTED.			

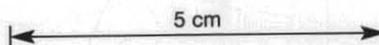
MEASURED FROM TESTER VALVE

TICKET NO. 30293400

		O.D.	I.D.	LENGTH	DEPTH	
1		DRILL PIPE.....	5.000	4.276	228.9	
5		CROSSOVER.....	6.500	2.880	3.6	
6		SUB-SEA TEST TREE.....	10.750	2.880	14.5	
5		CROSSOVER.....	6.500	2.880	1.8	
1		DRILL PIPE.....	5.000	4.276	9029.5	
5		CROSSOVER.....	6.250	2.750	1.0	
69		SURFACE READOUT (NON-HALLIBURTON)	4.625	2.280	2.0	9367.9
5		CROSSOVER.....	6.250	2.875	1.1	
5		CROSSOVER.....	6.375	2.438	1.2	
93		FUL-FLO SAFETY VALVE.....	5.000	2.250	4.8	9372.3
5		CROSSOVER.....	6.125	2.875	1.0	
3		DRILL COLLARS.....	6.438	2.875	93.1	
5		CROSSOVER.....	6.125	2.313	1.0	
10		SLIP JOINT.....	5.000	2.250	18.2	
10		SLIP JOINT.....	5.000	2.250	15.7	
10		SLIP JOINT.....	5.000	2.250	13.2	
5		CROSSOVER.....	6.125	2.875	1.0	
3		DRILL COLLARS.....	6.438	2.875	186.3	
5		CROSSOVER.....	6.125	2.688	0.9	
52		APR-TYPE "A" CIRCULATING VALVE..	5.000	2.250	3.0	9707.3
5		CROSSOVER.....	6.188	2.750	1.0	
3		DRILL COLLARS.....	6.438	2.875	93.1	
5		CROSSOVER.....	6.125	2.313	1.0	
67		LPR-M TESTER VALVE.....	5.000	2.250	16.4	9807.5
84		BUNDLE CARRIER.....	5.375	2.250	8.0	9829.8
15		JAR.....	4.625	2.250	5.2	
57		FUL-FLO HYDRAULIC BYPASS.....	4.625	2.250	7.2	9842.2
5		CROSSOVER.....	4.750	2.438	0.8	
16		VR SAFETY JOINT.....	4.625	2.250	4.1	
71		CASING PACKER.....	7.800	3.000	5.3	9848.8

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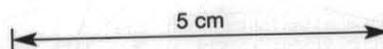
EQUIPMENT DATA



TICKET NO. 30293400

		O.D.	I.D.	LENGTH	DEPTH
1	 DRILL PIPE.....	5.000	4.276	31.6	
5	 CROSSOVER.....	6.375	2.819	1.7	
TOTAL DEPTH					

EQUIPMENT DATA



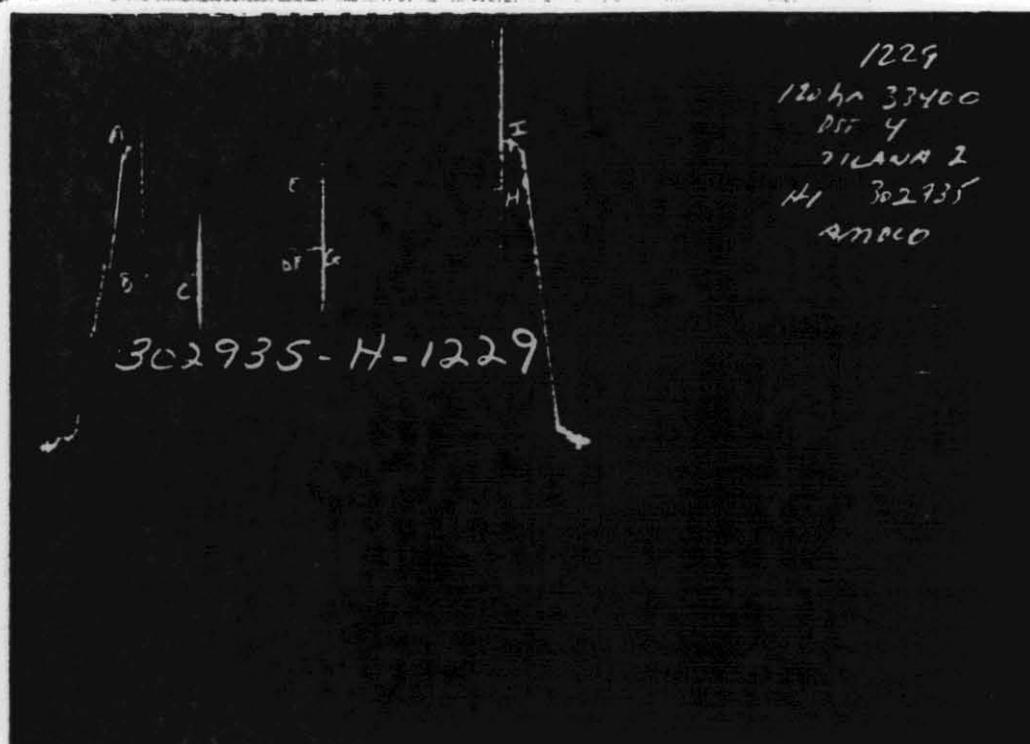
TP/1A TILANA
 LEASE NAME
 WELL NO. 1
 TEST NO. 2-B
 9848.8 -
 TESTED INTERVAL
 AMOCO AUSTRALIA PETROLEUM COMPANY
 LEASE OWNER/COMPANY NAME
 LEGAL LOCATION
 SEC. - TWP. - RANG.
 SEE REMARKS
 FIELD AREA
 BRSS STRAIT
 COUNTY
 OFFSHORE (OR)
 STATE TERRITORY, AUST.



TICKET NO. 90299500
 04-DEC-85
 PERTH

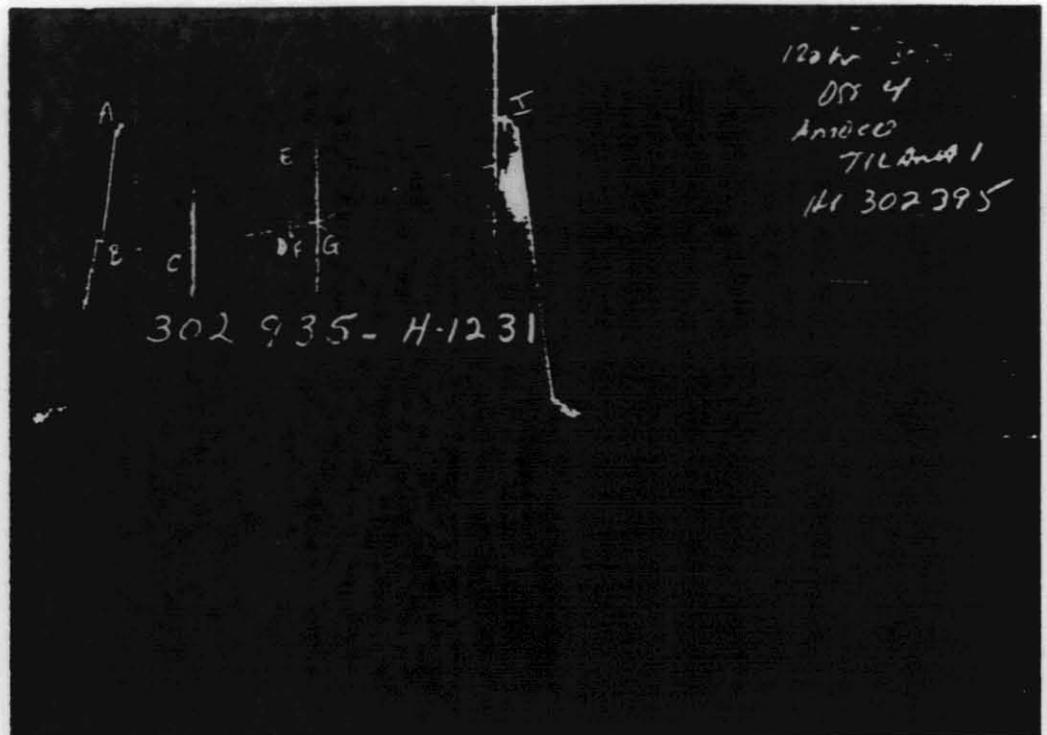
FORMATION TESTING SERVICE REPORT

321139

GAUGE NO: 1229 DEPTH: 9829.8 BLANKED OFF: NO HOUR OF CLOCK: 120

ID	DESCRIPTION	PRESSURE		TIME		TYPE
		REPORTED	CALCULATED	REPORTED	CALCULATED	
A	INITIAL HYDROSTATIC	4494	4515.3			
B	MIN. PSI AFTER PK. SET		2575.1			
C	GUNS FIRED (FIRST INTVL)	2558	2590.3			
D	END FLOW	2893	2898.2	657	656	F
D	START CIP	2893	2898.2			
E	FINAL CIP	3723	3789.4	29	31	C
F	INITIAL SECOND FLOW	2893	2902.8			
G	FINAL SECOND FLOW		2985.8	202	202	F
G	GUNS FIRED (2ND INTVL)		2985.8			
H	END OF THIRD FLOW	3822	3839.1	1277	1276	F
I	FINAL HYDROSTATIC	4494	4515.0			

321140

GAUGE NO: 1231 DEPTH: 9829.8 BLANKED OFF: NO HOUR OF CLOCK: 120

ID	DESCRIPTION	PRESSURE		TIME		TYPE
		REPORTED	CALCULATED	REPORTED	CALCULATED	
A	INITIAL HYDROSTATIC	4516	4524.8			
B	MIN. PSI AFTER PK. SET		2588.5			
C	GUNS FIRED (FIRST INTVL)	2584	2602.6			
D	END FLOW	2907	2903.2	657	656	F
D	START CIP	2907	2903.2			
E	FINAL CIP	3775	3787.4	29	31	C
F	INITIAL SECOND FLOW	2907	2906.6			
G	FINAL SECOND FLOW		2985.4	202	202	F
G	GUNS FIRED (2ND INTVL)		2985.4			
H	END OF THIRD FLOW	3825	3828.6	1277	1276	F
I	FINAL HYDROSTATIC	4516	4524.5			

EQUIPMENT & HOLE DATA			TICKET NUMBER: 30293500		
FORMATION TESTED: SEE REMARKS			DATE: 11-21-85 TEST NO: 2-B		
NET PAY (ft): 33.0			TYPE DST: CASED HOLE W/LPR		
GROSS TESTED FOOTAGE: _____			HALLIBURTON CAMP: _____		
ALL DEPTHS MEASURED FROM: RKB			PERTH		
CASING PERFS. (ft): SEE REMARKS			TESTER: J.P. MC GARRY		
HOLE OR CASING SIZE (in): 9.625			WITNESS: J. GUILDRY		
ELEVATION (ft): 73.0			DRILLING CONTRACTOR: _____		
TOTAL DEPTH (ft): EZSV SET @ 222			DIAMOND "M" EPDCH		
PACKER DEPTH(S) (ft): 9849					
FINAL SURFACE CHOKE (in): _____					
BOTTOM HOLE CHOKE (in): _____					
MUD WEIGHT (lb/gal): 9.00					
MUD VISCOSITY (sec): 120					
ESTIMATED HOLE TEMP. (°F): 250					
ACTUAL HOLE TEMP. (°F): _____ ° _____ ft					
FLUID PROPERTIES FOR RECOVERED MUD & WATER			SAMPLER DATA		
SOURCE	RESISTIVITY	CHLORIDES	Pctg AT SURFACE: _____		
_____	_____ °F	_____ ppm	cu.ft. OF GAS: _____		
_____	_____ °F	_____ ppm	cc OF OIL: _____		
_____	_____ °F	_____ ppm	cc OF WATER: _____		
_____	_____ °F	_____ ppm	cc OF MUD: _____		
_____	_____ °F	_____ ppm	TOTAL LIQUID cc: _____		
_____	_____ °F	_____ ppm			
HYDROCARBON PROPERTIES			CUSHION DATA		
OIL GRAVITY (°API): _____ °F			TYPE	AMOUNT	WEIGHT
GAS/OIL RATIO (cu.ft. per bbl): _____			SEAWATER (BBL)	99.0	8.55
GAS GRAVITY: _____					
RECOVERED:					
2539.95' OF GAS CUT MUD					
MEASURED FROM TESTER VALVE					
REMARKS:					
WELL PERFORATED WITH 1750 PSI UNDERBALANCE					
TWO ZONES TESTED PERFS. @ 10,075.45 TO 10,088.58'					
9,980 TO 10,000.00'					
NO FLOW TO SURFACE					
FORMATION TESTED: EASTERN VIEW COAL MEASURES					
LEGAL LOCATION: LAT. 039 DEGREES 53' 36.96" SOUTH, LONG. 145 DEGREES 58' 42.20" EAST					

TYPE & SIZE MEASURING DEVICE:					TICKET NO: 30293500
TIME	CHOKE SIZE	SURFACE PRESSURE PSI	GAS RATE MCF	LIQUID RATE BPD	REMARKS
11-18-85					
1200					MADE UP TOOLS. WENT IN HOLE
2220					SET PACKER
2350					OPENED LPR-N TESTER
11-19-85					WENT IN HOLE WITH SCHLUMBERGER
					GUNS
0654					PERFORATED INTERVAL 10,075.45-
					10,088.58'
					WEAK BLOW
0655					NO INDICATION OF FLOW
0730					PULLED OUT OF HOLE WITH
					PERFORATING GUN-OBSERVED WELL
1751					CLOSED TOOL
1820					OPENED TOOL
2142					PERFORATED TO INTERVAL FROM
					9,980.95 TO 10,000'
					NO CHANGE IN BLOW. NO BLOW
					AT SURFACE
					PULLED OUT OF HOLE WITH
					PERFORATING GUN
11-20-85					
0200					DTIS RUN HP-GAUGE
0900					INTERMITTENT BLOW
1130					VERY WEAK BLOW
1859					PRESSURED UP TO OPEN APR-A
					REVERSE TOOL-REVERSED OUT
1900					CLOSED TOOL
2000					OPENED BYPASS
2008					UNSEATED PACKER
2030					PULLED OUT OF HOLE
11-21-85					
0430					TOOLS OUT OF HOLE

TICKET NO: 30293500

CLOCK NO: 0 HOUR: 120



GAUGE NO: 1229

DEPTH: 9829.8

REF	MINUTES	PRESSURE	AP	$\frac{1 \Delta P}{1 \Delta t}$	$\log \frac{1 \Delta P}{\Delta t}$	REF	MINUTES	PRESSURE	AP	$\frac{1 \Delta P}{1 \Delta t}$	$\log \frac{1 \Delta P}{\Delta t}$
FIRST FLOW						THIRD FLOW - CONTINUED					
C	1	0	2590.3			6	600	9520.5	77.9		
	2	60	2618.9	28.6		7	720	9587.2	66.6		
	3	120	2638.8	19.9		8	840	9655.2	68.0		
	4	180	2670.5	31.7		9	960	9713.9	58.7		
	5	240	2700.0	29.5		10	1080	9777.9	64.0		
	6	300	2729.5	29.5		11	1200	9811.6	33.7		
	7	360	2777.3	47.8		H	12	1276	9899.1	27.5	
	8	420	2801.9	24.5							
	9	480	2812.8	10.9							
	10	540	2840.4	27.7							
	11	600	2877.1	36.7							
D	12	656	2898.2	21.1							
FIRST CLOSED-IN											
D	1	0	2898.2								
	2	3	3018.5	120.2	3.0	2.340					
	3	6	3167.0	268.8	6.0	2.041					
	4	9	3335.1	436.9	8.9	1.866					
	5	12	3436.7	536.5	12.0	1.798					
	6	15	3515.1	616.9	14.7	1.648					
	7	18	3584.3	686.1	17.6	1.571					
	8	21	3635.6	737.4	20.4	1.506					
	9	24	3693.9	795.7	23.1	1.453					
	10	27	3727.6	829.4	26.0	1.401					
	11	29	3758.8	860.6	28.0	1.370					
E	12	31	3789.4	891.1	29.6	1.345					
SECOND FLOW											
F	1	0	2902.8								
	2	20	2901.5	-1.2							
	3	40	2904.3	2.8							
	4	60	2913.0	8.7							
	5	80	2920.8	7.8							
	6	100	2928.9	8.1							
	7	120	2953.8	24.9							
	8	140	2964.9	11.2							
	9	160	2977.4	12.4							
	10	180	2978.6	1.2							
G	11	202	2985.8	7.2							
THIRD FLOW											
G	1	0	2985.8								
	2	120	3112.3	126.6							
	3	240	3224.3	111.9							
	4	360	3338.4	114.1							
	5	480	3442.6	104.2							

REMARKS:

TICKET NO: 30293500

CLOCK NO: 30744 HOUR: 120



GAUGE NO: 1231

DEPTH: 9829.8

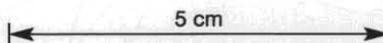
REF	MINUTES	PRESSURE	AP	$\frac{1 \pm \Delta P}{1 \pm \Delta t}$	$\log \frac{1 \pm \Delta P}{\Delta t}$	REF	MINUTES	PRESSURE	AP	$\frac{1 \pm \Delta P}{1 \pm \Delta t}$	$\log \frac{1 \pm \Delta P}{\Delta t}$	
FIRST FLOW						THIRD FLOW - CONTINUED						
C	1	0	2602.6			6	600	3510.5	68.9			
	2	60	2632.3	29.7		7	720	3577.5	67.0			
	3	120	2654.4	22.2		8	840	3645.8	68.3			
	4	180	2682.2	27.8		9	960	3702.4	56.6			
	5	240	2713.8	31.6		10	1080	3772.9	70.5			
	6	300	2740.4	26.6		11	1200	3801.5	28.6			
	7	360	2787.5	47.2		H	12	1276	3828.6	27.0		
	8	420	2807.9	20.3								
	9	480	2820.7	12.8								
	10	540	2844.4	23.7								
	11	600	2881.0	36.6								
	D	12	656	2903.2	22.2							
FIRST CLOSED-IN												
D	1	0	2903.2									
	2	3	3078.4	175.2	3.1	2.329						
	3	6	3177.4	274.3	6.0	2.040						
	4	9	3309.8	406.6	9.0	1.863						
	5	12	3409.5	506.3	11.8	1.743						
	6	15	3494.0	590.9	14.8	1.646						
	7	18	3560.7	657.5	17.6	1.571						
	8	21	3633.3	730.2	20.4	1.507						
	9	24	3678.6	775.4	23.1	1.452						
	10	27	3729.2	826.1	26.0	1.402						
	11	29	3751.5	848.4	27.8	1.373						
E	12	31	3787.4	884.2	29.6	1.345						
SECOND FLOW												
F	1	0	2906.6									
	2	20	2909.1	2.5								
	3	40	2917.2	8.1								
	4	60	2924.1	6.9								
	5	80	2926.3	2.2								
	6	100	2931.3	5.0								
	7	120	2950.0	18.8								
	8	140	2961.3	11.3								
	9	160	2964.1	2.8								
	10	180	2972.5	8.4								
	G	11	202	2985.4	12.8							
THIRD FLOW												
G	1	0	2985.4									
	2	120	3105.9	120.5								
	3	240	3226.0	120.2								
	4	360	3332.7	106.7								
	5	480	3441.8	108.9								

REMARKS:

		O.D.	I.D.	LENGTH	DEPTH
1	 DRILL PIPE.....	5.000	4.276	228.9	
5	 CROSSOVER.....	6.500	2.880	3.6	
6	 SUB-SEA TEST TREE.....	10.750	2.880	14.5	
5	 CROSSOVER.....	6.500	2.880	1.8	
1	 DRILL PIPE.....	5.000	4.276	9029.5	
5	 CROSSOVER.....	6.250	2.750	1.0	
69	 SURFACE READOUT (NON-HALLIBURTON)	4.625	2.280	2.0	9967.9
5	 CROSSOVER.....	6.250	2.875	1.1	
5	 CROSSOVER.....	6.375	2.438	1.2	
93	 FULL-FLOW SAFETY VALVE.....	5.000	2.250	4.8	9972.3
5	 CROSSOVER.....	6.125	2.875	1.0	
3	 DRILL COLLARS.....	6.438	2.875	93.1	
5	 CROSSOVER.....	6.125	2.313	1.0	
10	 SLIP JOINT.....	5.000	2.250	18.2	
10	 SLIP JOINT.....	5.000	2.250	15.7	
10	 SLIP JOINT.....	5.000	2.250	13.2	
5	 CROSSOVER.....	6.125	2.875	1.0	
3	 DRILL COLLARS.....	6.438	2.875	186.3	
5	 CROSSOVER.....	6.125	2.688	0.9	
52	 APR-TYPE "A" CIRCULATING VALVE..	5.000	2.250	3.0	9707.3
5	 CROSSOVER.....	6.188	2.750	1.1	
3	 DRILL COLLARS.....	6.438	2.875	93.1	
5	 CROSSOVER.....	6.125	2.313	1.0	
67	 LPR-M TESTER VALVE.....	5.000	2.250	16.4	9807.5
84	 BUNDLE CARRIER.....	5.375	2.250	8.0	9829.8
15	 JAR.....	4.625	2.250	5.2	
57	 FULL-FLOW HYDRAULIC BYPASS.....	4.625	2.250	7.2	9842.2
5	 CROSSOVER.....	4.750	2.438	0.9	
16	 VR SAFETY JOINT.....	4.625	2.250	4.1	
71	 CASING PACKER.....	7.800	3.000	5.3	9848.8

CONTINUED

EQUIPMENT DATA



321146

699

TICKET NO. 30293500

		O.D.	I.D.	LENGTH	DEPTH
1	 DRILL PIPE.....	5.000	4.276	31.6	
5	 CROSSOVER.....	6.275	2.813	1.7	
TOTAL DEPTH					

EQUIPMENT DATA

5 cm