

**Core Analysis Report Yolla No.1
For
AMOCO Exploration**

Contents:**Volume 1**

Conventional Core Analysis Report
Permeability vs. Porosity
Statistical data for Porosity and permeability Histogram
Statistical data for Grain Density Histogram

Figures:

1. Permeability vs. Porosity
2. Permeability and Porosity Histograms
3. Grain density Histogram

Enclosures:

1. Correlation Coregraph Yolla #1
2. Correlation Coregraph Yolla #1

Volume 2**Plates:**

1. 1862.9m - 1863.2m Yolla #1
2. 1863.5m - 1863.8m Yolla #1
3. 1864.1m - 1864.4m Yolla #1
4. 1864.7m - 1865.0m Yolla #1
5. 1865.3m - 1865.6m Yolla #1

OR-0315

VOL. 1/2

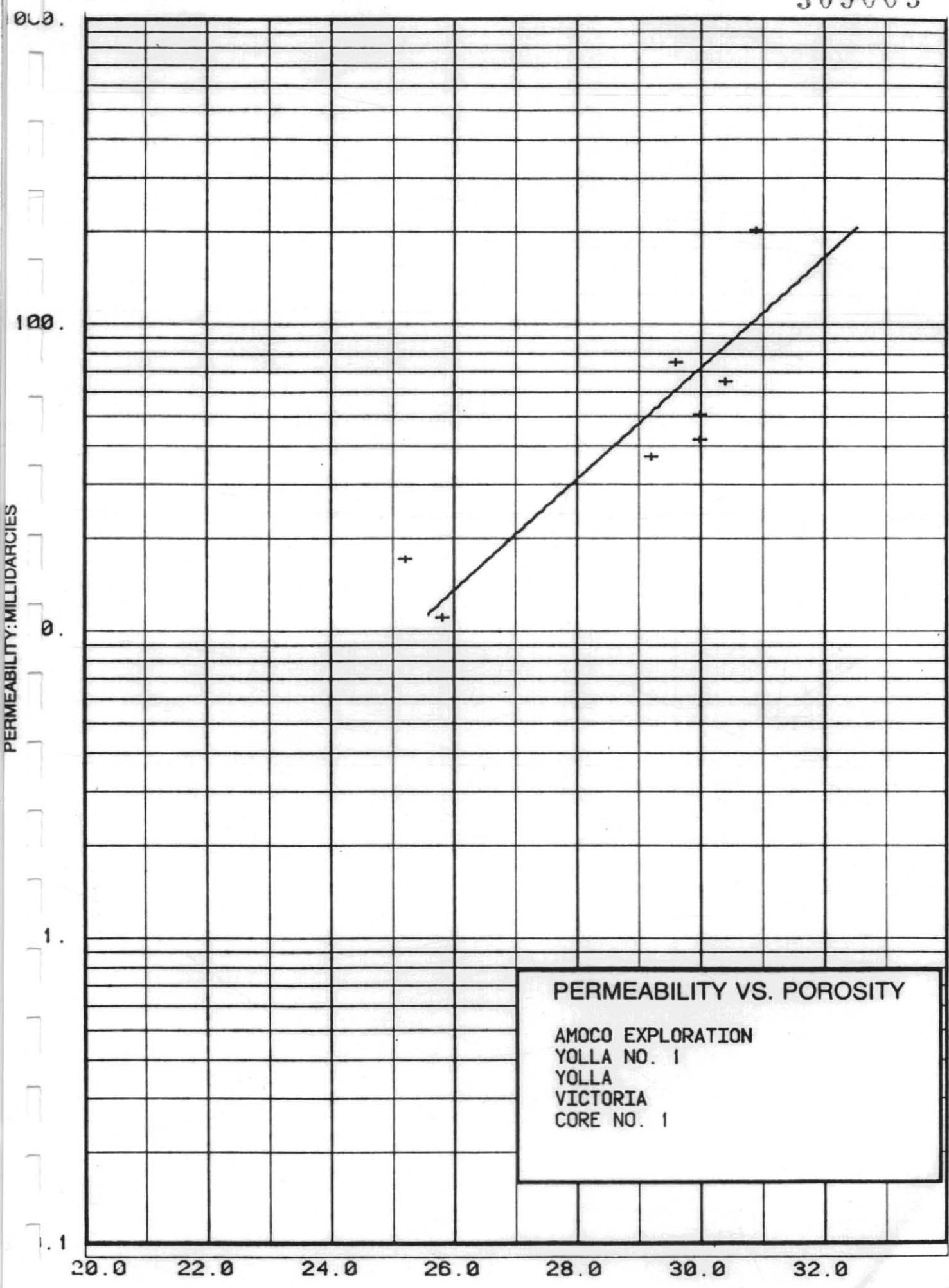
AMOCO EXPLORATION
YOLLA NO. 1
YOLLA
VICTORIA

DATE : 17/7/85
FORMATION :
DRLG. FLUID:
LOCATION : BASS BASIN

FILE NO : ADCA 85013
LABORATORY: ADELAIDE
ANALYSTS : RM:OOI
ELEVATION :

CONVENTIONAL CORE ANALYSIS

SAMPLE NUMBER	DEPTH FEET	PERM MD HORIZ K _a	FLD POR	He POR	OILZ PORE	WTRZ PORE	GRAIN DEN M	DESCRIPTION
CORE NO. 1								
1	6055.0	75.	31.1	29.6	12.5	84.8	2.65	LEAD SLEEVE
2	6056.0	17.	23.1	25.2	11.1	81.3	2.70	SST BRN/GY VFG FRM SBANG-SBRND WL SRT ABD ORG DETR MAT CARB SPK V SLTY MIC MIC
3	6057.0	11.	31.2	25.8	4.3	90.6	2.65	SST BRN/GY VFG FRM SBANG-SBRND WL SRT CARB INCL V SLTY MIC MIC I/P
4	6058.0	65.	28.7	30.4	5.6	88.3	2.65	SST BRN VFG FRM SBANG-SBRND WL SRT OCC CARB SPK SLTY MIC MIC
5	6059.0	51.	27.7	30.0	5.0	88.5	2.74	SST BRN VFG FRM SBANG-SBRND WL SRT OCC CARB SPK SLTY MIC MIC I/P
6	6060.0	37.	31.0	29.2	3.7	90.5	2.65	SST LTGY/BRN VFG FRM SBANG-SBRND WL SRT MNR CARB INCL V SLTY MIC MIC I/P
7	6061.0	42.	28.0	30.0	4.6	86.2	2.65	SST LTBRN/GY VFG FRM SBANG-SBRND WL SRT MNR CARB INCL SLTY MIC MIC
8	6062.0	204.	29.8	30.9	4.2	79.9	2.65	LEAD SLEEVE
9	6063.0		26.1		4.1	71.8		BROKEN CORE
9A	6063.0		31.0		2.8	87.7		BROKEN CORE



PERMEABILITY VS. POROSITY
AMOCO EXPLORATION
YOLLA NO. 1
YOLLA VICTORIA
CORE NO. 1

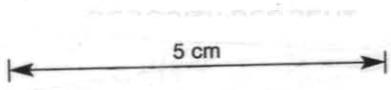


FIGURE 1.

PERMEABILITY VS POROSITY

COMPANY: AMOCO EXPLORATION
FIELD : YOLLA

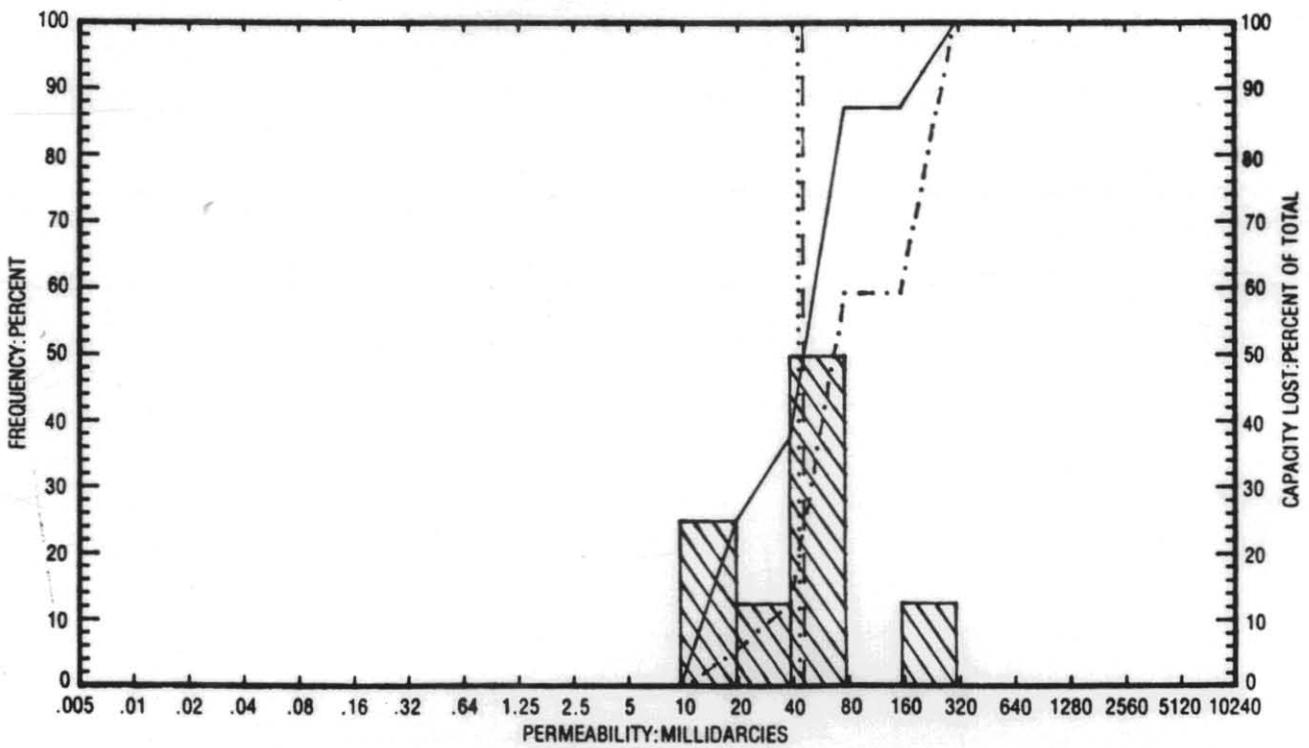
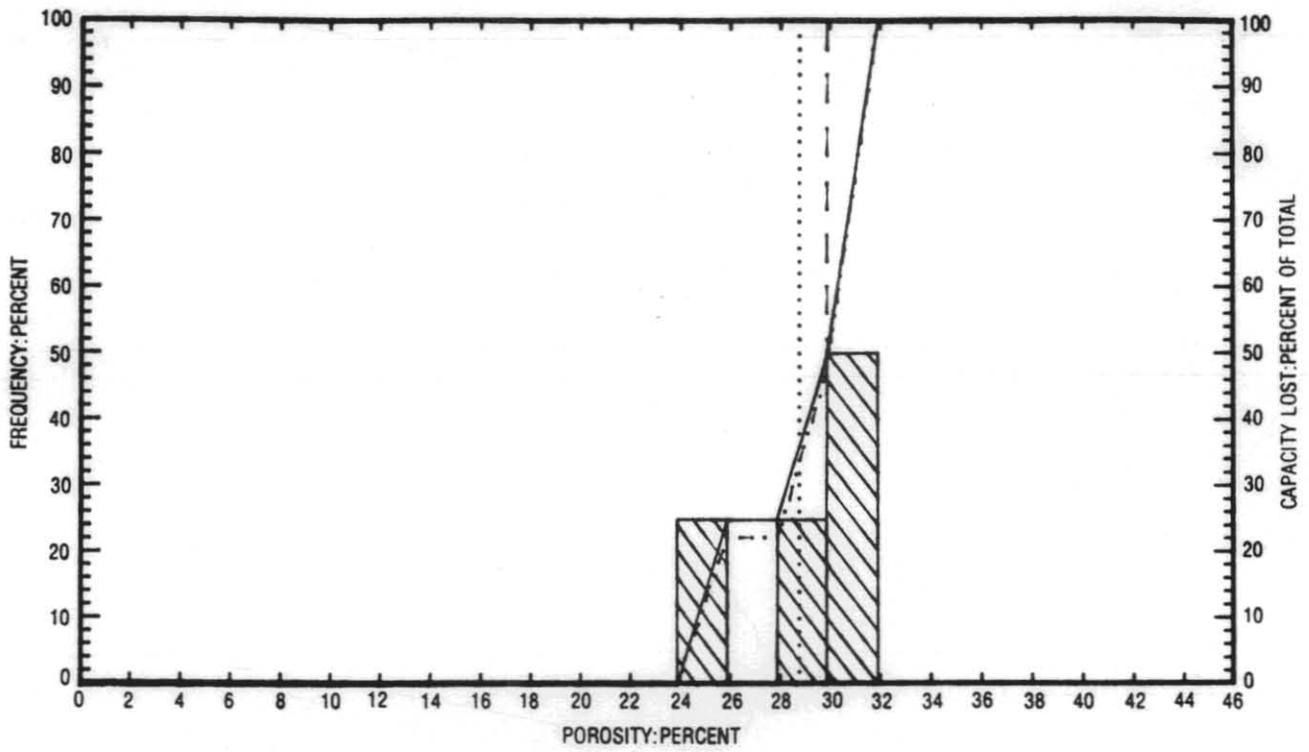
WELL : YOLLA NO. 1
COUNTY, STATE: VICTORIA

AIR PERMEABILITY : MD - HORIZONTAL (UNCORRECTED FOR SLIPPAGE)
POROSITY : PERCENT (HELIUM)

DEPTH INTERVAL	RANGE & SYMBOL	PERMEABILITY		POROSITY		POROSITY AVERAGE	PERMEABILITY AVERAGES		
		MINIMUM	MAXIMUM	MIN.	MAX.		ARITHMETIC	HARMONIC	GEOMETRIC
6055.0 - 6099.8	1 (+)	11.000	204.0	25.2	30.9	28.9	63.	32.	44.

EQUATION OF REDUCED LINE RELATING PERMEABILITY(K) TO POROSITY :
 $\text{LOG}(K) = (\text{SLOPE})(\text{POROSITY}) + \text{LOG OF INTERCEPT}$
 $K = \text{ANTILOG}((\text{SLOPE})(\text{POROSITY}) + \text{LOG OF INTERCEPT})$

RANGE	EQUATION OF THE LINE
1	PERM = ANTILOG((0.1813)(POROSITY) + -3.5899)



PERMEABILITY AND POROSITY HISTOGRAMS

AMOCO EXPLORATION
 YOLLA NO. 1
 YOLLA
 VICTORIA
 CORE NO. 1

LEGEND
 ARITHMETIC MEAN POROSITY
 GEOMETRIC MEAN PERMEABILITY
 MEDIAN VALUE
 CUMULATIVE FREQUENCY
 CUMULATIVE CAPACITY LOST
 (Note: The legend uses various line styles to represent these metrics, including dotted, dashed, and solid lines.)

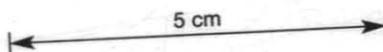


FIGURE 2.

STATISTICAL DATA FOR POROSITY AND PERMEABILITY HISTOGRAM

COMPANY: AMOCO EXPLORATION
FIELD : YOLLA

WELL : YOLLA NO. 1
COUNTY, STATE: VICTORIA

AIR PERMEABILITY : MD. (HORIZONTAL) RANGE USED 0.000 TO 204.
POROSITY : PERCENT (HELIUM) RANGE USED 0.0 TO 46.0

(PERMEABILITY UNCORRECTED FOR SLIPPAGE)

DEPTH LIMITS : 6055.0 - 6099.8 INTERVAL LENGTH : 44.8
FEET ANALYZED IN ZONE : 8.0 LITHOLOGY EXCLUDED : NONE

DATA SUMMARY

POROSITY AVERAGE	PERMEABILITY AVERAGES		
	ARITHMETIC	HARMONIC	GEOMETRIC
28.9	63.	32.	44.

STATISTICAL DATA FOR POROSITY AND PERMEABILITY HISTOGRAM

COMPANY: AMOCO EXPLORATION
FIELD : YOLLA

WELL : YOLLA NO. 1
COUNTY, STATE: VICTORIA

GROUPING BY POROSITY RANGES

POROSITY RANGE	FEET IN RANGE	AVERAGE POROSITY	AVERAGE PERM. (GEOM.)	(ARITH)	FREQUENCY (PERCENT)	CUMULATIVE FREQUENCY (%)
24.0 - 26.0	2.0	25.5	14.	14.	25.0	25.0
28.0 - 30.0	2.0	29.4	53.	56.	25.0	50.0
30.0 - 32.0	4.0	30.3	73.	91.	50.0	100.0

TOTAL NUMBER OF FEET = 8.0

STATISTICAL DATA FOR POROSITY AND PERMEABILITY HISTOGRAM

COMPANY: AMOCO EXPLORATION
FIELD : YOLLA

WELL : YOLLA NO. 1
COUNTY, STATE: VICTORIA

GROUPING BY PERMEABILITY RANGES

PERMEABILITY RANGE	FEET IN RANGE	AVERAGE PERM. (GEOM.)	AVERAGE PERM. (ARITH)	AVERAGE POROSITY	FREQUENCY (PERCENT)	CUMULATIVE FREQUENCY (%)
10.- 20.	2.0	14.	14.	25.5	25.0	25.0
20.- 40.	1.0	37.	37.	29.2	12.5	37.5
40.- 80.	4.0	57.	58.	30.0	50.0	87.5
160.- 320.	1.0	204.	204.	30.9	12.5	100.0

TOTAL NUMBER OF FEET = 8.0

STATISTICAL DATA FOR POROSITY AND PERMEABILITY HISTOGRAM

COMPANY: AMOCO EXPLORATION
FIELD : YOLLA

WELL : YOLLA NO. 1
COUNTY, STATE: VICTORIA

POROSITY-FEET OF STORAGE CAPACITY LOST FOR SELECTED POROSITY CUT OFF

POROSITY CUT OFF	FEET LOST	CAPACITY LOST (%)	FEET REMAINING	CAPACITY REMAINING (%)	ARITH MEAN	MEDIAN
0.0	0.0	0.0	8.0	100.0	28.9	30.0
2.0	0.0	0.0	8.0	100.0	28.9	30.0
4.0	0.0	0.0	8.0	100.0	28.9	30.0
6.0	0.0	0.0	8.0	100.0	28.9	30.0
8.0	0.0	0.0	8.0	100.0	28.9	30.0
10.0	0.0	0.0	8.0	100.0	28.9	30.0
12.0	0.0	0.0	8.0	100.0	28.9	30.0
14.0	0.0	0.0	8.0	100.0	28.9	30.0
16.0	0.0	0.0	8.0	100.0	28.9	30.0
18.0	0.0	0.0	8.0	100.0	28.9	30.0
20.0	0.0	0.0	8.0	100.0	28.9	30.0
22.0	0.0	0.0	8.0	100.0	28.9	30.0
24.0	0.0	0.0	8.0	100.0	28.9	30.0
26.0	2.0	22.1	6.0	77.9	30.0	30.5
28.0	2.0	22.1	6.0	77.9	30.0	30.5
30.0	4.0	47.5	4.0	52.5	30.3	31.0
32.0	8.0	100.0	0.0	0.0		

TOTAL STORAGE CAPACITY IN POROSITY-FEET = 231.1

STATISTICAL DATA FOR POROSITY AND PERMEABILITY HISTOGRAM

COMPANY: AMOCO EXPLORATION
FIELD : YOLLA

WELL : YOLLA NO. 1
COUNTY, STATE: VICTORIA

MILLIDARCY-FEET OF FLOW CAPACITY LOST FOR SELECTED PERMEABILITY CUT OFF

PERMEABILITY CUT OFF	FEET LOST	CAPACITY LOST (%)	FEET REMAINING	CAPACITY REMAINING (%)	GEOM MEAN	MEDIAN
0.005	0.0	0.0	8.0	100.0	44.26	47.57
0.010	0.0	0.0	8.0	100.0	44.26	47.57
0.020	0.0	0.0	8.0	100.0	44.26	47.57
0.039	0.0	0.0	8.0	100.0	44.26	47.57
0.078	0.0	0.0	8.0	100.0	44.26	47.57
0.156	0.0	0.0	8.0	100.0	44.26	47.57
0.312	0.0	0.0	8.0	100.0	44.26	47.57
0.625	0.0	0.0	8.0	100.0	44.26	47.57
1.250	0.0	0.0	8.0	100.0	44.26	47.57
2.500	0.0	0.0	8.0	100.0	44.26	47.57
5.	0.0	0.0	8.0	100.0	44.26	47.57
10.	0.0	0.0	8.0	100.0	44.26	47.57
20.	2.0	5.6	6.0	94.4	65.48	56.57
40.	3.0	12.9	5.0	87.1	73.40	61.69
80.	7.0	59.4	1.0	40.6	204.00	226.27
160.	7.0	59.4	1.0	40.6	204.00	226.27
320.	8.0	100.0	0.0	0.0		

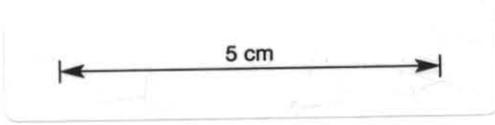
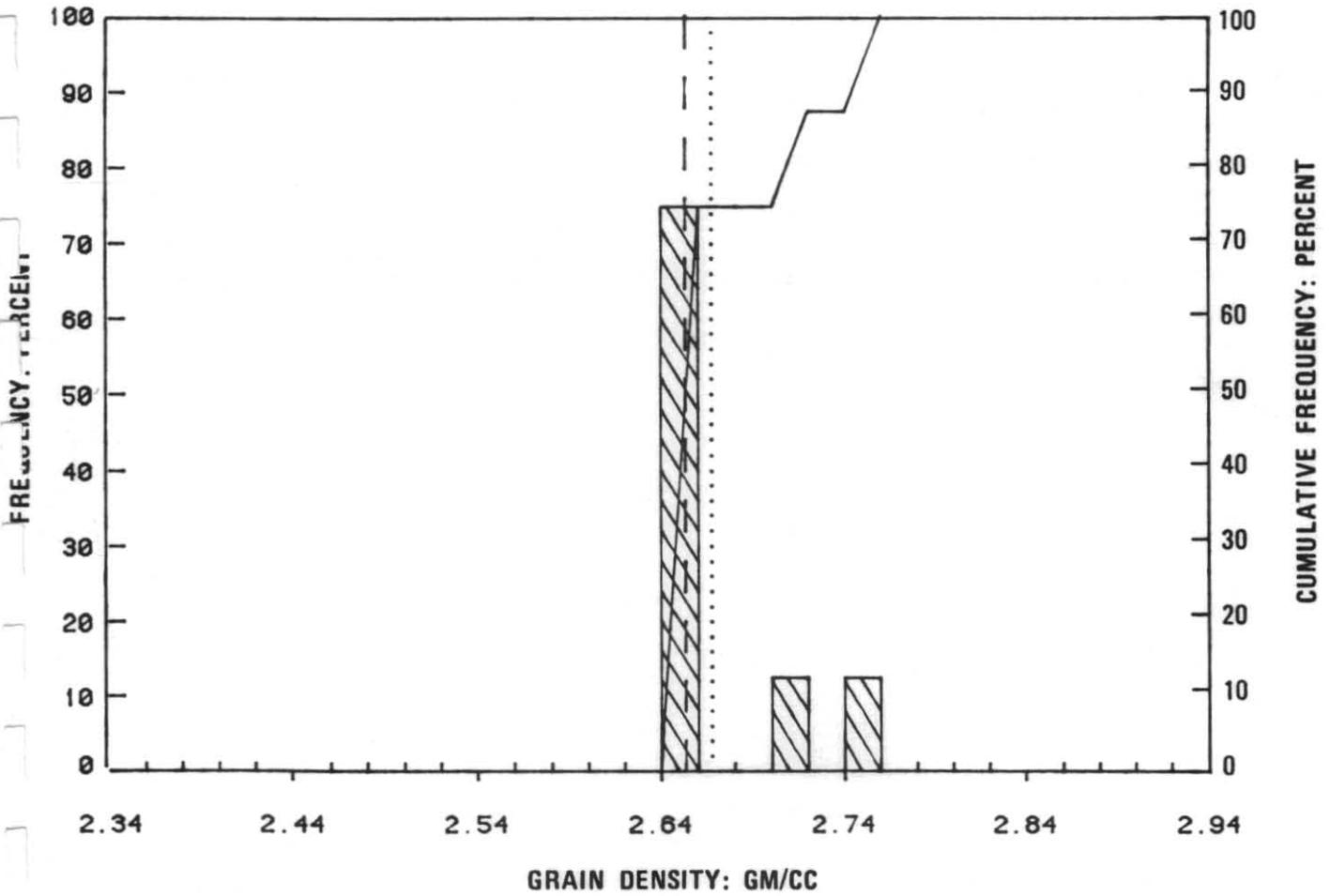
TOTAL FLOW CAPACITY IN MILLIDARCY-FEET (ARITHMETIC) = 502.00



CORE LABORATORIES, INC. *Petroleum Reservoir Engineering*

COMPANY	AMOCO EXPLORATION	FILE NO.	ADCA 85013
WELL	YOLLA NO. 1	DATE	22/7
FIELD	YOLLA	FORMATION	ELEV.
COUNTRY	VICTORIA	DRLG. FLD.	CORES
LOCATION	BASS BASIN		

GRAIN DENSITY HISTOGRAM



LEGEND	
ARITHMETIC MEAN GRAIN DENSITY
MEDIAN VALUE	-----
CUMULATIVE FREQUENCY	————

FIGURE 3.

STATISTICAL DATA FOR GRAIN DENSITY HISTOGRAM

COMPANY: AMOCO EXPLORATION
FIELD : YOLLA

WELL : YOLLA NO. 1
COUNTRY : VICTORIA

GRAIN DENSITY : gm/cc (MEASURED) RANGE USED 2.34 TO 2.94

DEPTH LIMITS : 6055.0 - 6099.8 INTERVAL LENGTH : 44.8
FEET ANALYZED IN ZONE : 10.0 LITHOLOGY EXCLUDED : NONE

DATA SUMMARY

GRAIN DENSITY
ARITHMETIC MEAN

2.67

GRAIN DENSITY
MEDIAN

2.65

STATISTICAL DATA FOR GRAIN DENSITY HISTOGRAM

COMPANY: AMOCO EXPLORATION
FIELD : YOLLA

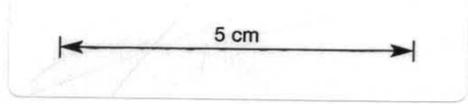
WELL : YOLLA NO. 1
COUNTRY : VICTORIA

GROUPING BY GRAIN DENSITY RANGES

GRAIN DENSITY RANGE	FEET IN RANGE	AVERAGE DENSITY	FREQUENCY (PERCENT)	CUMULATIVE FREQUENCY (%)
2.64 - 2.66	6.0	2.65	75.0	75.0
2.70 - 2.72	1.0	2.70	12.5	87.5
2.74 - 2.76	1.0	2.74	12.5	100.0

TOTAL NUMBER OF FEET = 8.0

ENCLOSURE 1.
MATERIALS CODE NO 7520-551



CORE LABORATORIES, INC.

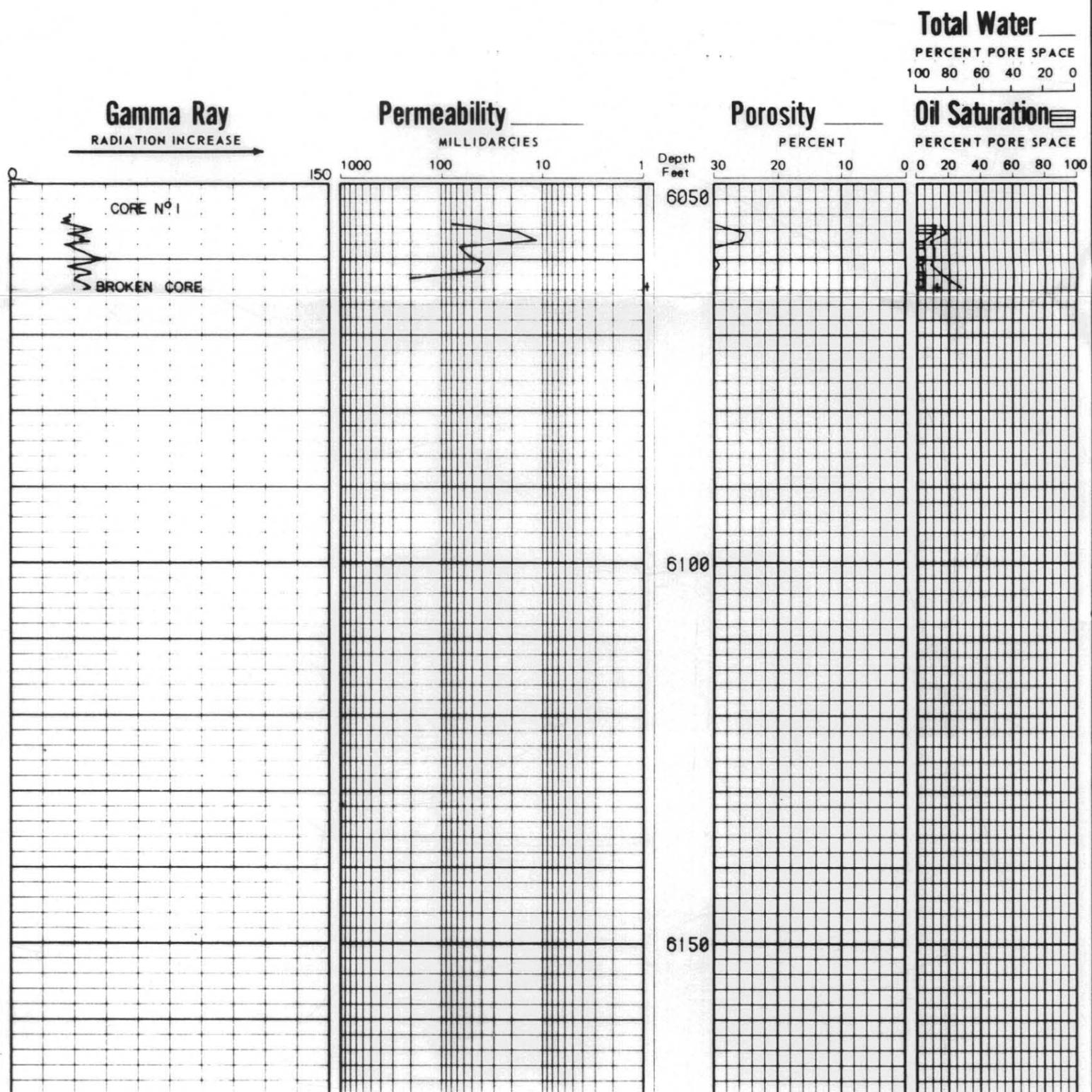
Petroleum Reservoir Engineering

COMPANY AMOCO EXPLORATION FILE NO. ADCA 85013
 WELL YOLLA NO. 1 DATE 17/7/85
 FIELD YOLLA FORMATION _____ ELEV. _____
 COUNTY VICTORIA STATE _____ DRLG. FLD. _____ CORES _____
 LOCATION BASS BASIN

CORRELATION COREGRAPH

These analyses, opinions or interpretations are based on observations and material supplied by the client to whom, and for whose exclusive and confidential use, this report is made. The interpretations or opinions expressed represent the best judgment of Core Laboratories, Inc., (all errors or omissions excepted); but Core Laboratories, Inc., and its officers and employees, assume no responsibility and make no warranty or representations as to the productivity, proper operation, or profitability of any oil, gas or other mineral well or sand in connection with which such report is used or relied upon.

VERTICAL SCALE: 1:200 FEET



OR-0315 VOL 1.



CORE LABORATORIES, INC.

Petroleum Reservoir Engineering

COMPANY AMOCO EXPLORATION FILE NO. ADCA 85013
 WELL YOLLA NO.1 DATE 17/7/85
 FIELD YOLLA FORMATION _____ ELEV. _____
 COUNTY VICTORIA STATE _____ DRLG. FLD. _____ CORES _____
 LOCATION BASS BASIN

CORRELATION COREGRAPH

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VERTICAL SCALE: 1" = 500

Gamma Ray

RADIATION INCREASE

Permeability

MILLIDARCIES

Porosity

PERCENT

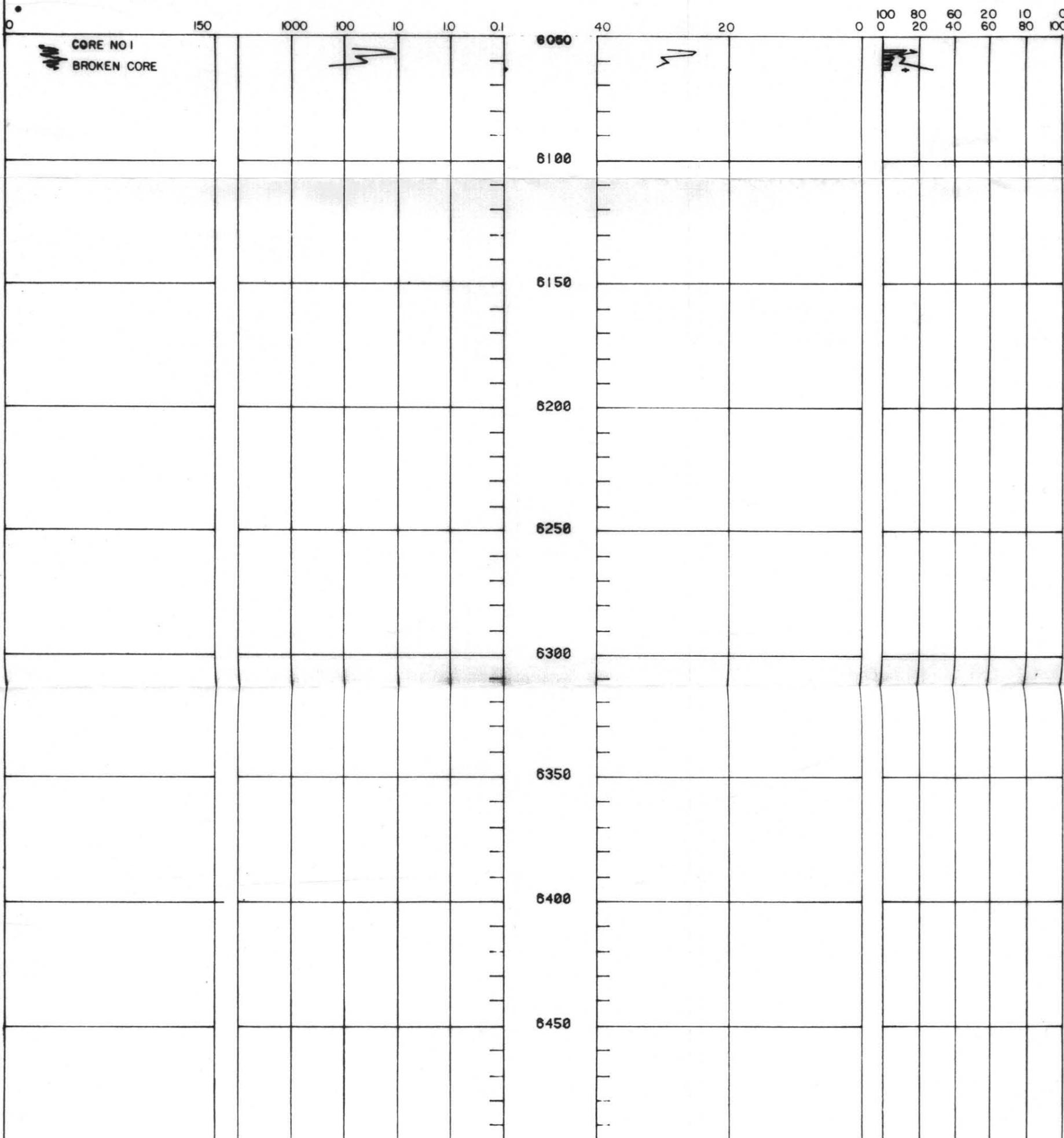
Total Water

PERCENT PORE SPACE

100 80 60 40 20 0

Oil Saturation

PERCENT PORE SPACE

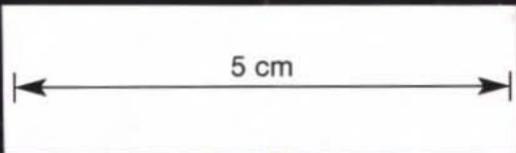


309016

AMOCO AUSTRALIA

YOLLA NO 1

CORE NO 1



AMOCO AUSTRALIA

YOLLA NO 1

CORE NO 1



1862.9M

POR 29.6

PERM 75

5 cm

1863.2M

POR 25.2

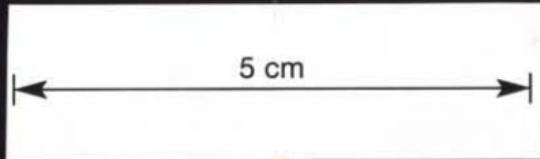
PERM 17



AMOCO AUSTRALIA

YOLLA NO 1

CORE NO 1



AMOCO AUSTRALIA

YOLLA NO 1

CORE NO 1

309017



1863.5M

POR 25.8

PERM 11



1863.8M

POR 30.4

PERM 65



AMOCO AUSTRALIA

YOLLA NO 1

CORE NO 1

1864.1 M

POR 30.0

PERM 51

5 cm

AMOCO AUSTRALIA

YOLLA NO 1

CORE NO 1

1864.4 M

POR 29.2

PERM 37

309018



AMOCO AUSTRALIA

YOLLA NO 1

CORE NO 1

1864.7M POR 30.0 PERM 42

AMOCO AUSTRALIA

YOLLA NO 1

CORE NO 1

1865.0M POR 30.9 PERM 204

309019

5 cm



AMOCO AUSTRALIA

YOLLA NO 1

CORE NO 1

1865.3 M

POR

PERM

AMOCO AUSTRALIA

YOLLA NO 1

CORE NO 1

1865.6 M

POR

PERM

309020

5 cm

