CSIRO AUSTRALIA

C.S.R.
ROZS
LAUNCESTON
TAS.

HOLE DATA

HOLE DEPTH	75m	HOLE DIA.	16cm
CASING DEPTH	15m	CASING DIA.	15cm
WATER LEVEL	3m	MUD DENSITY	N.D.
DRILLED BY	RIGAN	DRILLER	VIC

TAPE 12 SPEED 30 IPS

EQUIPMENT DATA

SONDE	4		
CABLE	4		
WINCH	4		
CONSOLE	4		
CAL. BOX	4		
CAL. RES.	4		
CAL. SPON.	4		
CAL. GAMMA	4		
CAL. CALIP.	4		
CAL. TEMP.	4		
CAL. DEPTH	4		
CAL. DEVIA.	4		
CAL. DIP	4		
CAL. SONIC	4		
CAL. CAVER	4		
CAL. DENSITY	4		
CAL. NEUTRON	4		
CAL.			
CAL.			
CAL.

82-1746.
WL 5 of 6.
55
77125

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

COMPANY: C.S.R.
BOREHOLE: RO75
AREA: LAUNCESTON
STATE: TAS.

HOLE DATA

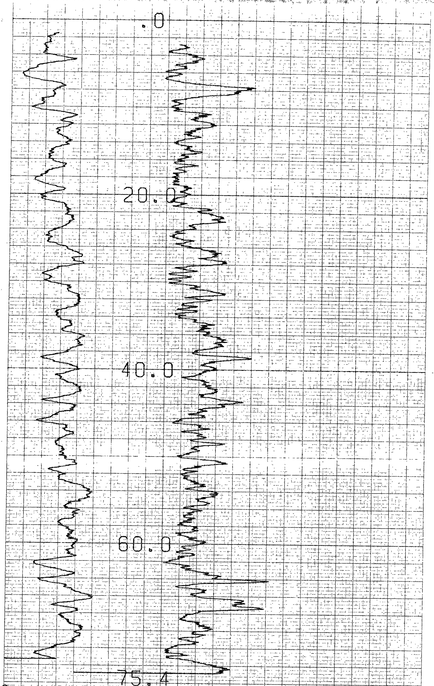
TOTAL DEPTH – DRILLER	78M	BIT SIZE	12cm
TOTAL DEPTH – LOGGER	75.4M	CASING TYPE & SIZE	—
TOTAL THICKNESS LOGGED	75.4M	CASING DEPTH	—
LOGGING SPEED	18M/MIN	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	—
PROBE NO.	9050-242	SOFTWARE LEVEL	V9L1
TAPE/3 TRACK2		SCALE SELECTION	AS OPERATOR CHOSE

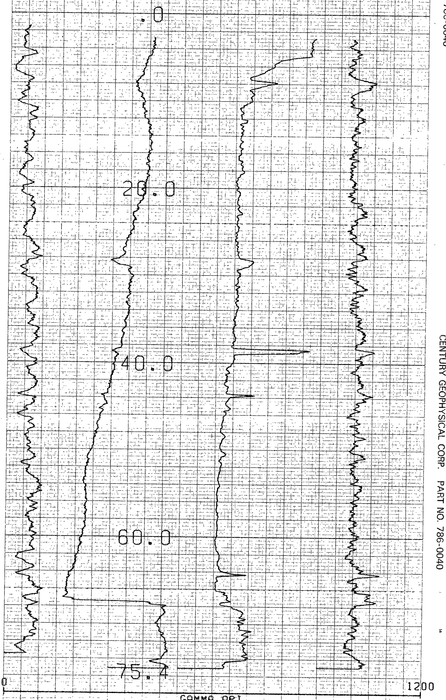
REMARKS:

DATE: 29-03-82
FIELD OFFICE: BRISBANE
RECORDED BY: CREWS
LOCATION: 8038

EQUIPMENT DATA

TOOL MODEL	8SS	8GG	8SS-TC
PROBE DIAMETER	43mm	43mm	43mm
DETECTOR TYPE	NAI	NAI	NAI
DETECTOR SIZE	51mm x 51mm	51mm x 51mm	51mm x 51mm
STD 4 FACTOR	—	—	1.4 x 10⁻⁶
STD BUILTIN	—	—	1.4 x 10⁻⁶
CABLE MODEL NO.	—	—	—
CABLE LENGTH	—	—	—
4 FACTOR	1.5	—	—
BUILTIN	1.5	—	—
TOOL READING	—	—	—
MASTER MOTOR	—	—	—
LOGGING MOTOR	—	—	—
SPECIFIED TYPE	—	—	—
SPECIFIED SIZE	51mm x 3mm	51mm x 3mm	—
SHIELD TYPE	—	—	—
SHIELD NO.	—	—	3778
SHIELD DYNAMICS	—	—	16
SHIELD SPACING	—	—	450
GEL PP REACTIVES	—	—	—
PREAMPLIFIER	—	—	—
PREAMPLIFIER	—	—	—
SENSITIVITY	—	—	—
COUPLING	—	—	—





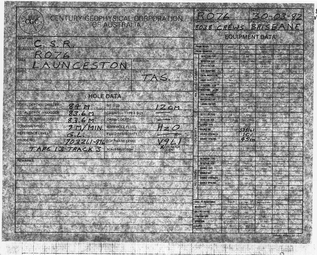
COMPU-LOG V8L2 PLOT 03-29-82

RO75
C.S.R.
LAUNCESTON

HOLE DIAMETER : 12.0
PROBE # 9055A - 242
SENSOR #4 CAL STD CPS = 152
SENSOR #4 CAL RUN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA V8L2 TRUCK # 8038
GREG CREWS APPL.#1005 K

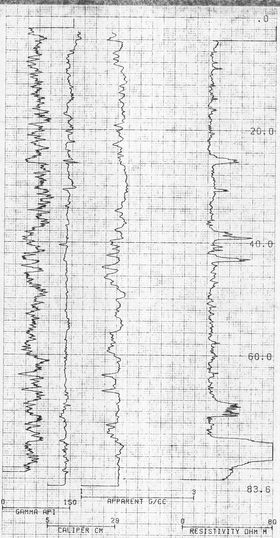
5cm

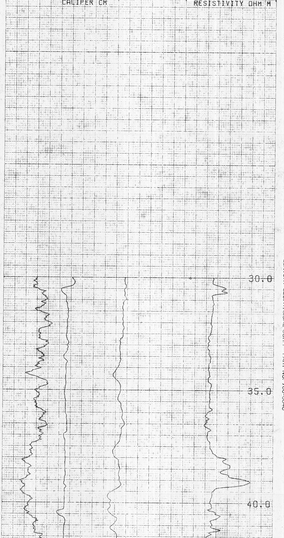
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

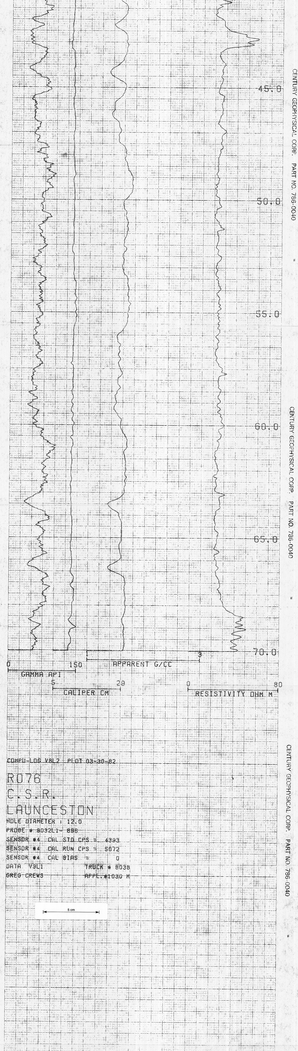


82-744
Inv. Surv.
56

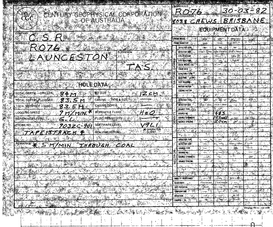
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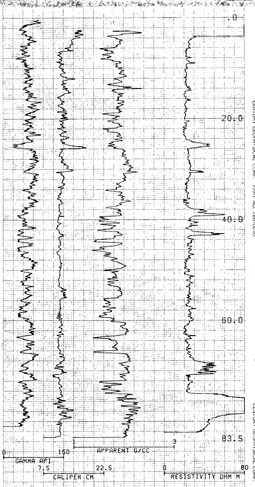


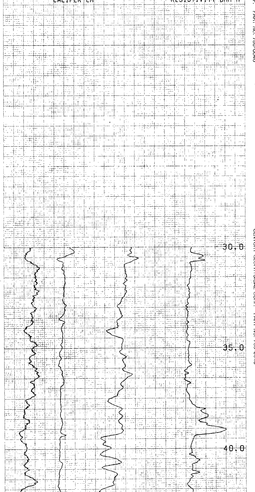




EL-1762
Vic Fuel
57







COMPULOG V8.2 PLOT 03-30-82

R076
C.S.R.
LAUNCESTON

HOLE DIAMETER : 12.0
PROBE # 8032C - 801
SENSOR #4 CAL STD CPS = 3123
SENSOR #4 CAL RUN CPS = 4724
SENSOR #4 CAL BIAS = -3
DATA VOLT TRUCK # 8035
GMCO CMCO APPL.=1000 M

CENTURY GEOPHYSICAL CORP. PART NO. 786-0000

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R076 30303-82

BORE CREW BRISBANE

EQUIPMENT DATA

C.S.R.

R076

LAUNCESTON TAS.

HOLE DATA

SIZE 12¼"

DEPTH 83.5m

DRILLED 83.5m

CASING 7"

MUD H2O

WATER TABLE

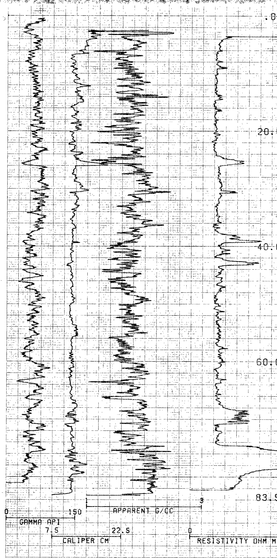
TYPE VIS

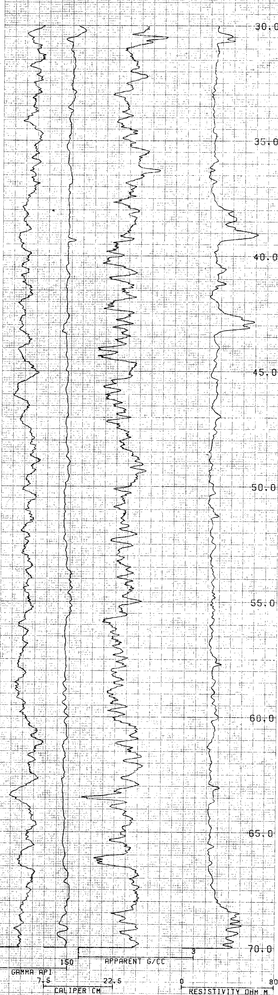
DATE 3-30-82

RUN 1

TIME

REMARKS





COMPU-LOG VOL2 PLOT 03-30-82

R076

C.S.R.

LAUNCESTON

HOLE DIAMETER = 12.0

PROBE # 8032m = 801

SENSOR #4 CAL STG CPS = 4835

SENSOR #4 CAL RUN CPS = 4702

SENSOR #4 CAL 9145 = 0

DATA VALI TRUCK # 8038

CREW CREW3 APPL. #1030 M

CENTURY GEOPHYSICAL CORP. PART NO. 786-0000

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R076 30-03-82
2038 CREWS/BRISBANE
EQUIPMENT DATA

C.S.R.
R076
LAUNCESTON
TAS.

HOLE DATA

TOTAL DEPTH - DRILLER	84m	BIT SIZE	12.0
TOTAL DEPTH - LOGGER	83.9m	CASING - DRILLER	
BOTTOM LOGGED INTERVAL	83.4m	CASING - LOGGER	
LOGGING SPEED	18M/MIN	BOREHOLE FLUID	H20
MAX. REC. TEMP.		FLUID RESISTIVITY	
TIME SINCE CIRC.	9050-242	BOTTOM HOLE TEMP.	19C
	TAPE 14 TRACK 2	MAX. RECORDED	

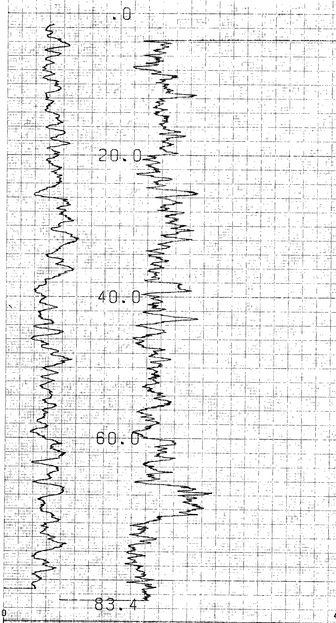
REMARKS

RECORDED BY	
WITNESSED BY	

EQUIPMENT DATA

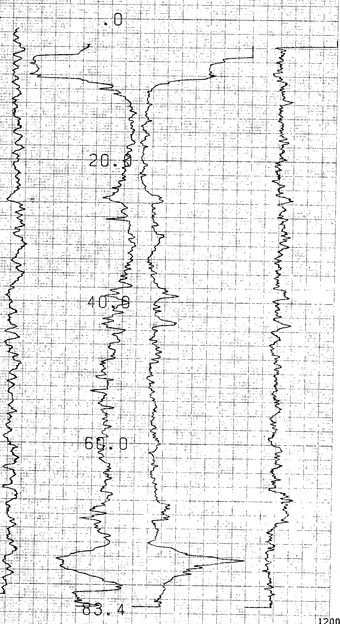
RUN NUMBER	ONE
DATE	30-3-82
TYPE LOG	GR
DEPTH DRILLER	84m
DEPTH LOGGER	83.9m
BTM LOG INTERVAL	83.4m
TOP LOG INTERVAL	SURFACE
CASING DRILLER	
CASING LOGGER	
BIT SIZE	12.0
TYPE FLUID	H20
DENSITY	
VISCOSITY	
PH	
FLUID LOSS	
SOURCE OF SAMPLE	
RM @ MEAS TEMP	
RMF @ MEAS TEMP	
RMC @ MEAS TEMP	
SOURCE RMF RMC	
RM @ BHT	
TIME CIRC	
TIME LOGGER ON BTM	0715
MAX REC TEMP	19C
EQUIP LOCATION	88m
RECORDED BY	
WITNESSED BY	

83-1711
Vol. 596
59
225202



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8L2 PLOT 03-30-82

R076
C.S.R.
LAUNCESTON
HOLE DIAMETER = 12.0
PROBE # 9055A - 242
SENSOR #4 CAL STD CPS = 152
SENSOR #4 CAL RUN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA V8L1 TRUCK # 8038
DREG CREWS APPL.#S K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R077 30-03-82

9038 CREWS BRISBANE

EQUIPMENT DATA

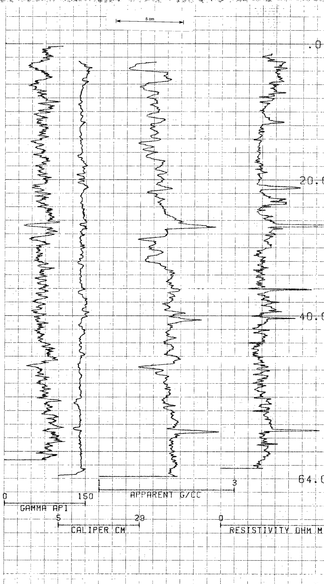
C.S.R.
R077
LAUNCESTON
TAS.

HOLE DATA

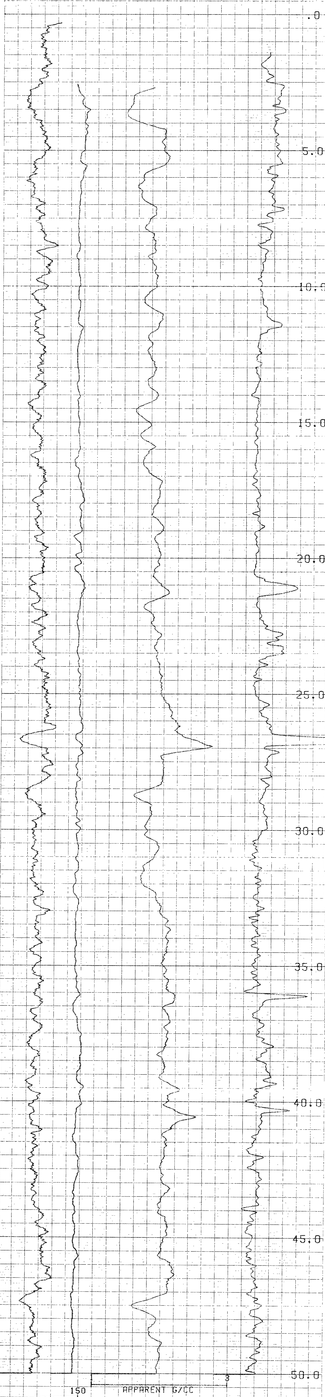
TOTAL DEPTH - DRILLER	66m	BITSIZE	12cm
TOTAL DEPTH - LOGGER	64.0m	CASING DEPTH	
TOTAL DEPTH LOGGED	64.0m	CASING BITSIZE	
LOGGING UNITS	FT/MIN	SURFACE TEMP	40
REFERENCE LEVEL	GL	FLUID DENSITY	
PROBE NO.	9032LL-M	FLUID LEVEL	VBL
TAPE NO.	TRACK 2	RECORDED BY	
REMARKS		WITNESSED BY	

FILMED
No 5 of 5
60

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8.2 PLOT 03-30-82

R077
C.S.R.
LAUNCESTON
HOLE DIAMETER : 12.0
PROBE # 9032LL- 896
SENSOR #4 CAL STD CPS = 4393
SENSOR #4 CAL RUN CPS = 5072
SENSOR #4 CAL BIAS = 0
DATA V8LI TRUCK # 9038
DREG CREWS APPL.#1050 K

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R077 30-03-82
2038 CREWS BRISBANE

EQUIPMENT DATA

TOOL TYPE	3032C	
SERIAL NUMBER	001	
TOOL LENGTH	4.57m	15'
WEIGHT	136kg	300lbs
DIAMETER	12cm	4.75"
MAX TEMP	70°C	158°F
MAX PRESSURE	6.9MPa	1000psi
CENTRALIZER	NONE	
CABLE TYPE	7032C-701	
CABLE LENGTH	1000m	
CABLE STRENGTH	4.5 TONNE	
CABLE WEIGHT	40kg/km	26lbs/1000ft
CABLE DIAMETER	7.9mm	5/16"
CABLE RESISTANCE	6.5Ω/km	2Ω/1000ft
CABLE CONDUCTORS	7	
CABLE INSULATION	TEFLON	
CABLE JACKET	BLACK	
TRUCK	V761	
WINCH	4 DRUM	

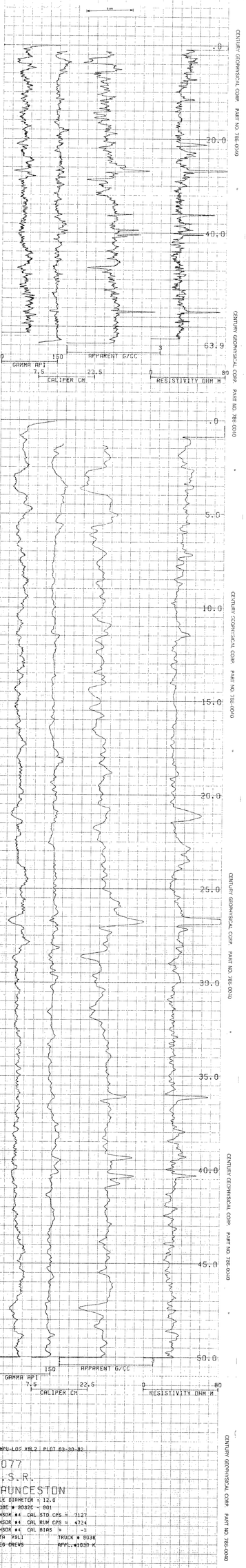
C.S.R.
R077
LAUNCESTON
TAS.

HOLE DATA:

DEPTH - DRILLER	64m	12cm
DEPTH - LOGGER	63.7m	
BOTTOM LOGGED INTERVAL	63.7m	CASING DEPTH
TOP LOGGED INTERVAL	7.9m/WL	H2O
MAX REC TEMP	60°C	FLUID RESISTIVITY

STARTED TRACK 1 OUTWARDS

RECORD WL'S 8/MIN. THROUGH CARBONACEOUS ZONE



COMPU-LOG V8.2 PLOT 03-30-82

R077
C.S.R.
LAUNCESTON

HOLE DIAMETER = 12.0
PROBE # 3032C - 001
SENSOR #4 CAL STD CPS = 7127
SENSOR #4 CAL RUN CPS = 4724
SENSOR #4 CAL BIAS = -1
DATA V8L1 TRUCK # 8038
DREG CREWS APPL. #1038 K

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Vol. 5 only
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CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R077 30-03-82
9038 CREWS BRISBANE

C.S.I.R.
R077
LAUNCESTON TAS.

EQUIPMENT DATA

PROBE NUMBER			
SENSOR #1			
SENSOR #2			
SENSOR #3			
SENSOR #4			
SENSOR #5			
SENSOR #6			
SENSOR #7			
SENSOR #8			
SENSOR #9			
SENSOR #10			
SENSOR #11			
SENSOR #12			
SENSOR #13			
SENSOR #14			
SENSOR #15			
SENSOR #16			
SENSOR #17			
SENSOR #18			
SENSOR #19			
SENSOR #20			
SENSOR #21			
SENSOR #22			
SENSOR #23			
SENSOR #24			
SENSOR #25			
SENSOR #26			
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SENSOR #50			
SENSOR #51			
SENSOR #52			
SENSOR #53			
SENSOR #54			
SENSOR #55			
SENSOR #56			
SENSOR #57			
SENSOR #58			
SENSOR #59			
SENSOR #60			
SENSOR #61			
SENSOR #62			
SENSOR #63			
SENSOR #64			
SPARE SENSOR			
SPARE SENSOR			
SPARE SENSOR

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VOL 5 of 5
63

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

RUN NO.	R077
DATE	30-03-82
UNIT/OPERATOR	8038 CREWS
FIELD OFFICE	BRISBANE

COMPANY C.S.R.
BOREHOLE R077
AREA LAUNCESTON
ELEVATION
STATE TAS

HOLE DATA

TOTAL DEPTH – DRILLER	66M	BIT SIZE	12CM.
TOTAL DEPTH – LOGGER	63.5M	CASING I.D. TYPE & SIZE	
TOTAL METERAGE LOGGED	63.5M	CASING DEPTH	
LOGGING SPEED	18M/MIN	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	°C
PROBE NO	9050-242	SOFTWARE LEVEL	V9L1
	TAPE 15 TRACK 2	SCALE SELECTION	CORRELATION / CLIENT

REMARKS

EQUIPMENT DATA

	RUN 1	RUN 2	RUN 3
PROBE NUMBER			
PROBE DIAMETER			
SENSOR TYPE			
DETECTOR SIZE			
STD. X-SECTION			
CALIB. INTERVAL			
CALIB. SHOTS			
X-SECTION – CAL.			
SCALING – GAMMA			
TYPE READING			
INVERSE FACTOR			
COUNT FACTOR			
DETECTOR TYPE			
DETECTOR SIZE			
SOURCE TYPE			
SOURCE NO.			
SOURCE STRENGTH			
SOURCE SPACING			45cm
DETECTOR TYPE			
DETECTOR SPACING			
SOURCE TYPE			
SOURCE NO.			3778
SOURCE STRENGTH			1C
SOURCE SPACING			45cm
SPOOL OF RESISTANCE			
RESISTIVITY			
SELF POTENTIAL			
STANDARD NO.			
DEVIATION %			
CALIPER			

5cm

.0
20.0
40.0
63.5

0 480
GAMMA API

0 600
N-N CPS

.0
20.0
40.0
63.5

0 1200
GAMMA API

-12 12 0 600
S.P. MV N-N CPS

100 420
RESISTANCE OHMS

COMPU-LOG V8L2 PLOT 03-30-82

R077
C.S.R.
LAUNCESTON
HOLE DIAMETER : 12.0
PROBE # 9055A - 242
SENSOR #4 CAL STD CPS = 152
SENSOR #4 CAL RUN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA V8L2 TRUCK # 8038
GREG CREWS APPL.#1005 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R078 101-04-82
R078 / NEWSEARCH BANE

C.S.R.
R078
LAUNCESTON
TAS.

HOLE DATA

TOTAL DEPTH – DRILLER	102 m	BIT SIZE	12cm
TOTAL DEPTH – LOGGER	102.0m	CASING – TYPE & WT.	
TOTAL METHANE LOGGED	102.0m	CASING DEPTH	
LOGGING SPEED	7 m/min	DRILLING FLUID	H2O
METHANE LEVEL	nil	FLUID DENSITY	
PROBE NO.	8032C-80	SOLENOID LEVEL	V761
		SOLENOID DELAY	

TAPE IS TRACK 3

RECORDED

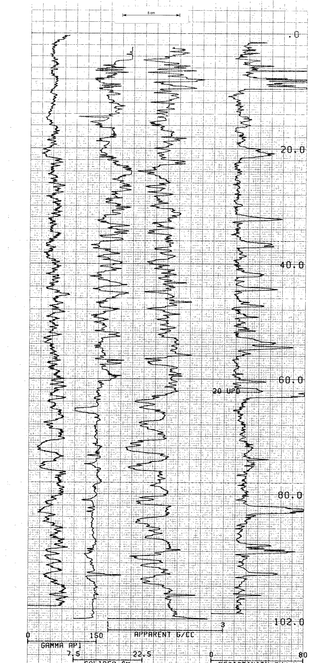
4.5 m/min. THROUGH COAL

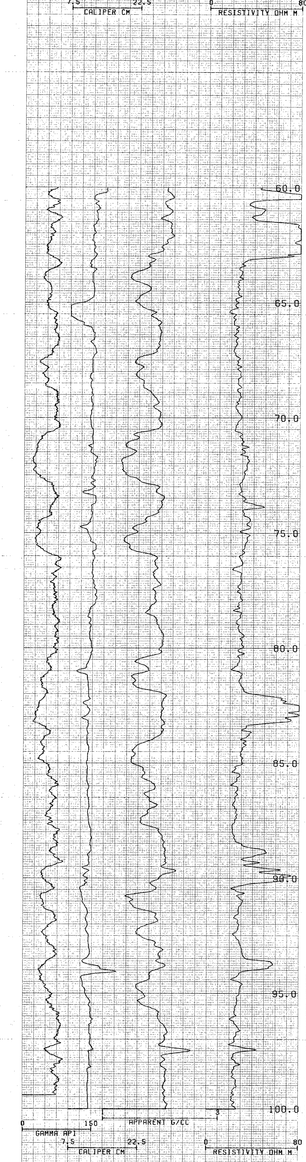
EQUIPMENT DATA

PROBE TYPE	8032C	8038	8038
PROBE NO.	80	38	38
DETECTOR	80	38	38
DET. LENGTH	1.5m	1.5m	1.5m
DET. SPACING	0.5m	0.5m	0.5m
DET. PRESSURE	1000 psi	1000 psi	1000 psi
DET. FILL	Argon	Argon	Argon
DET. VOLTAGE	1100	1100	1100
GAMMA – CPS	1	1	1
GAMMA – API	7.5	7.5	7.5
CALIPER	22.5	22.5	22.5
RESISTIVITY	80	80	80
SPONTANEOUS POTENTIAL			
TEMPERATURE			
DENSITY			
DENSITY STANDOFF			
NEUTRON			
SONIC			
SONIC STANDOFF			
SONIC SPACING			
SONIC TIMING			
CABLE	7032C	7032C	7032C
CABLE LENGTH	1000m	1000m	1000m
CABLE DIAMETER	0.71cm	0.71cm	0.71cm
CABLE WEIGHT	0.3 kg/m	0.3 kg/m	0.3 kg/m
CABLE STRENGTH	1000 kg	1000 kg	1000 kg
CABLE RESISTANCE	1.5 ohm/m	1.5 ohm/m	1.5 ohm/m
CABLE CAPACITANCE	0.1 uF/m	0.1 uF/m	0.1 uF/m
CABLE INSULATION	1 Gohm	1 Gohm	1 Gohm
CABLE CONDUCTORS	7	7	7
CABLE SHIELDING	Yes	Yes	Yes
CABLE JACKET	Yes	Yes	Yes
CABLE ARMOUR	Yes	Yes	Yes
CABLE TERMINATION	7032C	7032C	7032C
CABLE HEAD	7032C	7032C	7032C
CABLE SPLICE	7032C	7032C	7032C
CABLE SWIVEL	7032C	7032C	7032C
CABLE CLAMP	7032C	7032C	7032C
CABLE GUARD	7032C	7032C	7032C
CABLE PROTECTOR	7032C	7032C	7032C
CABLE SHEAVE	7032C	7032C	7032C
CABLE DRUM	7032C	7032C	7032C
CABLE SLIP RING	7032C	7032C	7032C
CABLE BRUSH	7032C	7032C	7032C
CABLE CONNECTOR	7032C	7032C	7032C
CABLE ADAPTER	7032C	7032C	7032C
CABLE EXTENSION	7032C	7032C	7032C
CABLE REDUCER	7032C	7032C	7032C
CABLE EXPANDER	7032C	7032C	7032C
CABLE CONTRACTOR	7032C	7032C	7032C
CABLE ELONGATOR	7032C	7032C	7032C
CABLE COMPRESSOR	7032C	7032C	7032C
CABLE TENSIONER	7032C	7032C	7032C
CABLE RELEASER	7032C	7032C	7032C
CABLE CUTTER	7032C	7032C	7032C
CABLE SPLICER	7032C	7032C	7032C
CABLE TERMINATOR	7032C	7032C	7032C
CABLE HEAD	7032C	7032C	7032C
CABLE SPLICE	7032C	7032C	7032C
CABLE SWIVEL	7032C	7032C	7032C
CABLE CLAMP	7032C	7032C	7032C
CABLE GUARD	7032C	7032C	7032C
CABLE PROTECTOR	7032C	7032C	7032C
CABLE SHEAVE	7032C	7032C	7032C
CABLE DRUM	7032C	7032C	7032C
CABLE SLIP RING	7032C	7032C	7032C
CABLE BRUSH	7032C	7032C	7032C
CABLE CONNECTOR	7032C	7032C	7032C
CABLE ADAPTER	7032C	7032C	7032C
CABLE EXTENSION	7032C	7032C	7032C
CABLE REDUCER	7032C	7032C	7032C
CABLE EXPANDER	7032C	7032C	7032C
CABLE CONTRACTOR	7032C	7032C	7032C
CABLE ELONGATOR	7032C	7032C	7032C
CABLE COMPRESSOR	7032C	7032C	7032C
CABLE TENSIONER	7032C	7032C	7032C
CABLE RELEASER	7032C	7032C	7032C
CABLE CUTTER	7032C	7032C	7032C
CABLE SPLICER	7032C	7032C	7032C
CABLE TERMINATOR	7032C	7032C	7032C

T1-764.
No 54.
64

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040





COMPU-LOG V8L2 PLOT 04-01-82

R078
C.S.R.
LAUNCESTON

HOLE DIAMETER = 12.0
PROBE # 8032C - 80
SENSOR #4 CHL STD CPS = 7127
SENSOR #4 CHL RUN CPS = 4724
SENSOR #4 CHL BIAS = -1
DATA V8L2 TRUCK # 8038
DREG CREW3 APPL. #1000 M

CSIRO DIVISION OF PETROLEUM GEOMECHANICS
CSIRO DIVISION OF APPLIED GEOMECHANICS
DIVISION OF AUSTRALIA

R079 : 1 : 02-09-82
2038 CAGS BRISBANE
(COUNTRY DATA)

C.S.R.
R079
LAUNCESTON
TAS.

HOLE DATA

DATE	11/8/82	CASING	122m
TIME STARTED	1400	DRILLER	
TIME FINISHED	1800	RIG	
TOTAL DEPTH	114m	ELEVATION	
WATER DEPTH		DRILLING CONTRACTOR	
HOLE DIAMETER	152mm	MUD TYPE	WATER
CASING DEPTH	122m	MUD WEIGHT	
CASING DIAMETER	152mm	MUD VISCOSITY	
		MUD PH	
		FLUID LOSS	

TAPES TRACK 1 — RUN NUMBER — RUN 1

TRACK 1	GAMMA RAY	TRACK 2	CALIPER
TRACK 3	RESISTIVITY	TRACK 4	

LOGGING UNIT	2038	LOGGING ENGINEER	
OPERATOR		WITNESS	
RECORDED BY			

MAX. TEMP.		MAX. REC. TEMP.	
EQUIP. LOCATION		RECORDED BY	

SONDE TYPE		SONDE SERIAL NO.	
GAMMA RAY TYPE		GAMMA RAY SERIAL NO.	
CALIPER TYPE		CALIPER SERIAL NO.	
RESISTIVITY TYPE		RESISTIVITY SERIAL NO.	

SONDE CENTRALIZER		CABLE TYPE	
CABLE LENGTH		CABLE SERIAL NO.	
CABLE HEAD TENSION		CABLE SPEED	

CALIPER CALIBRATION		RESISTIVITY CALIBRATION	
GAMMA RAY CALIBRATION			

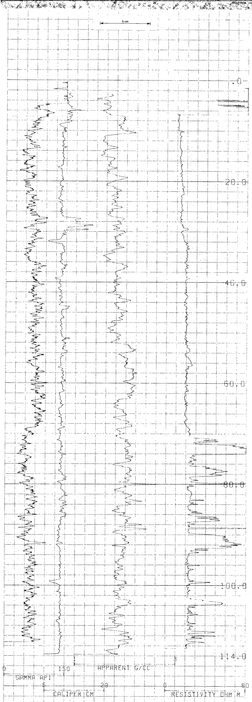
REMARKS			

LOGGED INTERVAL			
CASING SHOE			
CASING COLLAR			
BOTTOM OF HOLE			

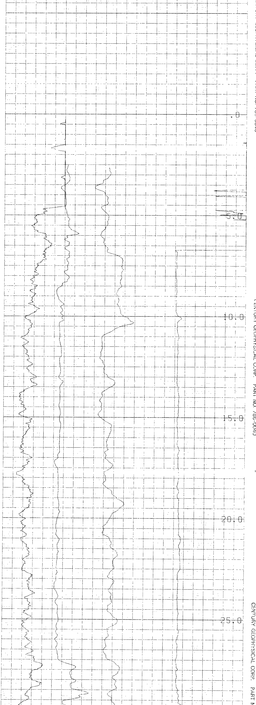
TIME SINCE CIRCULATION			
TIME ON BOTTOM			

UNIT NUMBER			
RECORDED BY			
WITNESSED BY			

CENTURY GEOPHYSICAL CORP. PART NO. 700-0000



CENTURY GEOPHYSICAL CORP. PART NO. 700-0000



COMPILED V6.2 PLOT 04-02-82

R079
C.S.R.
LAUNCESTON
HOLE DIRECTION (123)

PROBE # 8032(1-88)
SENSOR #4 CAL SEN CPS = 4393
SENSOR #4 CAL RUN CPS = 9672
SENSOR #4 CAL BIAS 7
DATA 9361 TRUCK # 8038
SHOT CREW APPL#8030-K

CENTURY GEOPHYSICAL

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

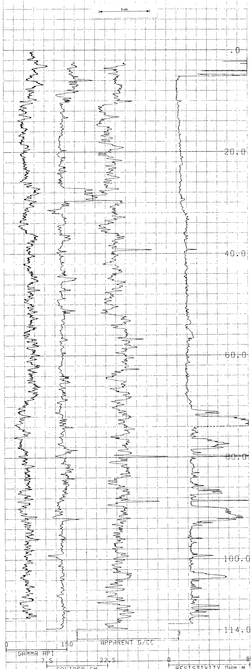
R079 LAUNCESTON TAS

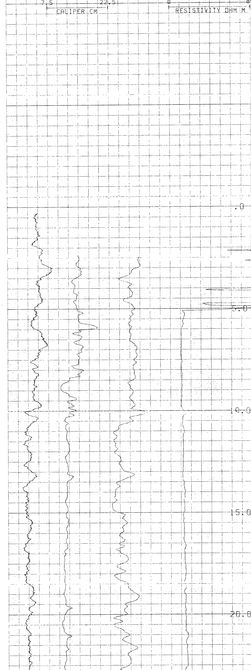
HOLE DATA

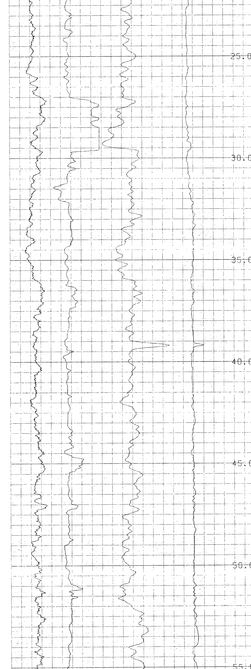
DRILLING DATA

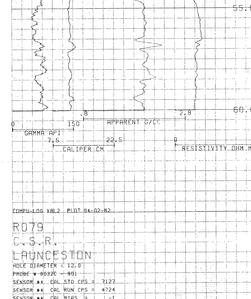
EQUIPMENT DATA

R079 DR-04-82 C.S.R. LAUNCESTON TAS









TIMPU-LOG V8.2 PLOT 04-02-82

R079
C.S.R.
LAUNCESTON
HOLE DIAMETER = 12.0
PROBE = 4032E (-M)
SEASON ## CAL STD CPS = 3127
SEASON ## CAL NUM CPS = 4724
SEASON ## CAL DIRS = -1
DATE 1982 TRUCK # 4038
GEOL-CREWS APPL. #4030 M

CENTURY GEOPHYSICAL CORP. PART NO. 780-0040

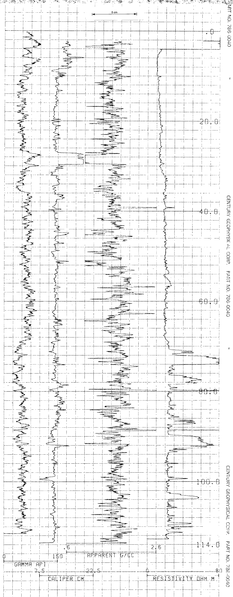
BGTH No. 6/82
8231 CSIRO BRISBANE

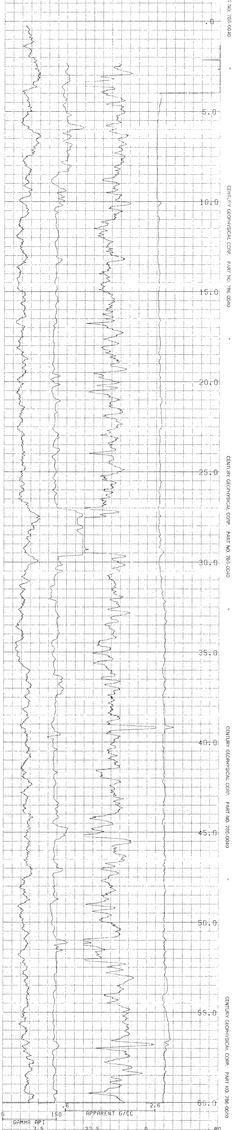
CSIRO
RD73
LAUNCESTON
TAS.

HOLE DATA
DRILLER
DRILL RIG
DRILLING METHOD
HOLE DIA
CASING DIA
CASING DEPTH
DRILLING FLUID
DATE DRILLED
CASING SHOE
TOTAL DEPTH
CORE DIA
CORE TRACK 2

12cm
H2O
V750

COMPUTER DATA
RUN NO.
DATE
TIME
TOOL
SPEED
SAMPLE
TOP
BASE
CASING
CORE
REMARKS





COMPU-LOG VER.2 / PLOT 04-02-82

RD73
C.S.I.R.
LAUNCESTON
HOLE DIAMETER = 12.0"
PROBE # 8830M - 901
SENSOR #1 CAL STD CPS = 4825
SENSOR #2 CAL RUN CPS = 4750
SENSOR #3 CAL RING = 0
DATE 1981 TRUCK # 8135
OMEGA-CM/M2 PIPE WT/FT =

COMPU-LOG 300-500-0020 PART NO. 300-500-0020

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R079 9208-32
2038 CREWSER/SBANE

C.S.R.
R079
LAUNCESTON
TAS.

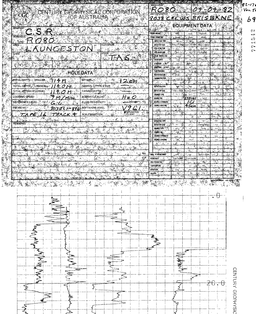
HOLE DATA

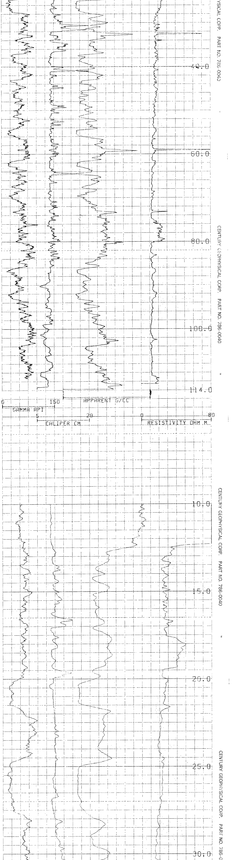
TOTAL DEPTH	114m	BITSIZE	12M
CASING DEPTH	110.0M	CASING TYPE & WALL	
STATIC WATER LEVEL	109.0M	CASING DIA	
LOGGING SPEED	18 m/MIN	SAMPLE INTERVAL	1M
REFERENCE LEVEL	GL	FLUID RESISTIVITY	
PROBE No.	9050-242	SOFTWARE LEVEL	V8.1
TRACK	TRACK 3	CALIBRATION	

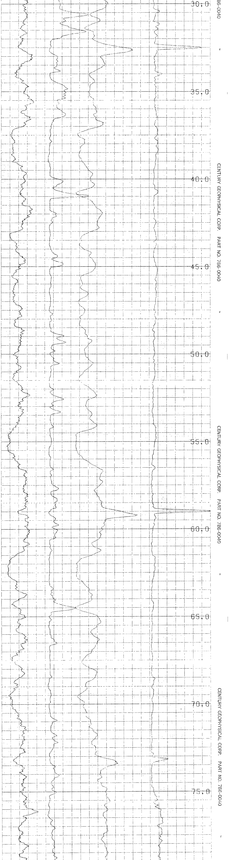
REMARKS

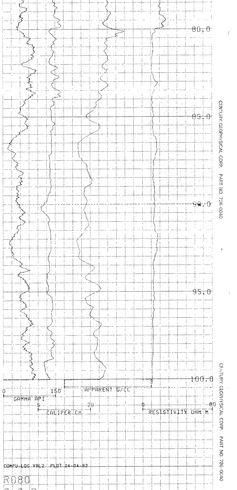
EQUIPMENT DATA

PROBE NUMBER			
GAMMA			
GAMMA			
GAMMA









COMPU-LOG VOL2 - PLOT 24-04-92

ROBO

C.S.R.

LAUNCESTON

HOLE DIMENSION - TIGHT

PROBE ♦ 8332L1-898

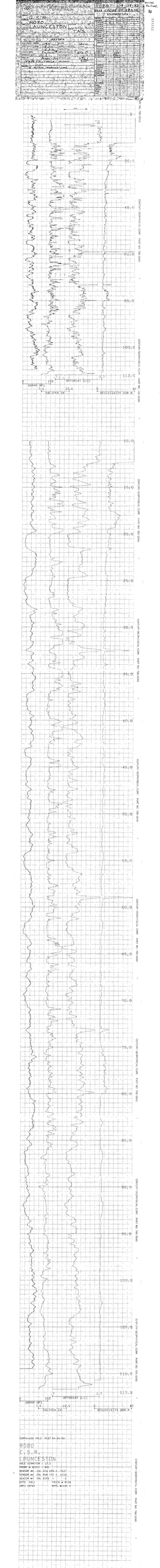
SENSOR ♦♦ GRL.STD.CPS = 4284

SENSOR ♦♦ GRL.NOR.CPS = 9372

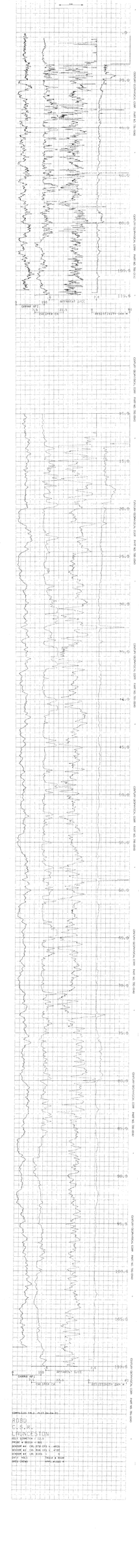
SENSOR ♦♦ GRL.RHR % = 0

DATA WAS TAKEN ♦ WITH

GMEG CREWS APPR. 4YEARS


RD80
LAUNCESTON
CSR
MUD DATA
RESISTIVITY CURVE
SP CURVE
CALIPER CURVE
GAMMA RAY CURVE
DEPTH IN FEET
0
20.0
40.0
60.0
80.0
100.0
112.0
SPONT. POT.
CALIPER CM
RESISTIVITY OHM M
APPARENT RES
GAMMA API


RDSO
LAUNCESTON
TAS.
RDSO
RDSO CIRCULATION
RDSO
LAUNCESTON
TAS.


RDSO
CIRCULATION
RDSO
LAUNCESTON
TAS.

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R080 04-04-82
7038 CREW: BRISBANE

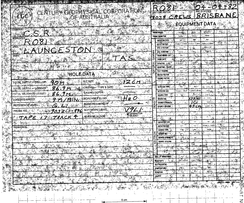
C.S.R.
R080
LAUNCESTON
TAS.

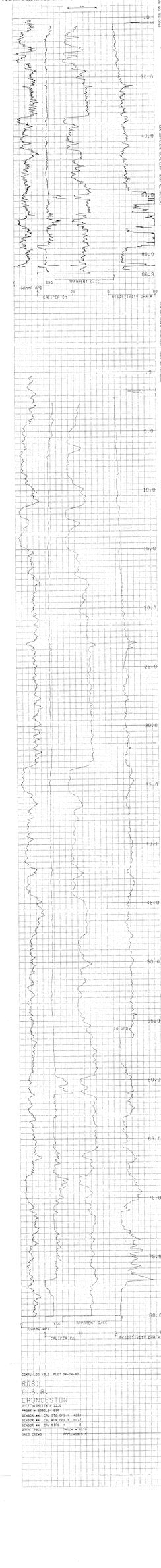
HOLE DATA

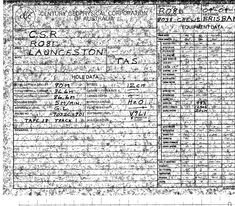
TOTAL DEPTH - DRILLER	111m	DATE	1200
TOTAL DEPTH - LOGGER	111.0m	CASING - TYPE & SIZE	
TOTAL RECORDED LOGGED	111.0m	CASING DEPTH	
BOREHOLE FLUID	SEA WATER	RUN NO. ON LOG	1
REFERENCE LEVEL	GL	FLUID RESISTIVITY	
LOGGING	7038	OPERATOR/LEVEL	VTJ
TAPE 17 TRACK 3		SOURCE STRENGTH	

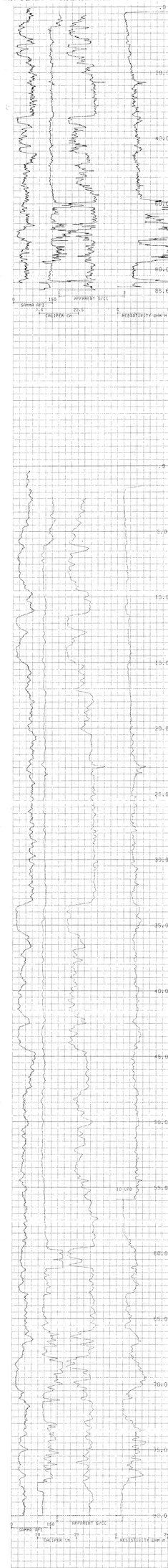
EQUIPMENT DATA

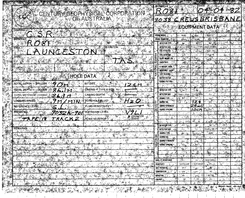
TOOL NAME			
NORMAL SPD			
LOG SPD			
TAPE NUM			
TRACK			
DATA NUM			
DATA FILE			
OPERATOR			
CONSOLE			
SAMPLE			
COMP. PANEL			
COMP. SERIAL			
DETECTOR			
DETECTOR			
DETECTOR

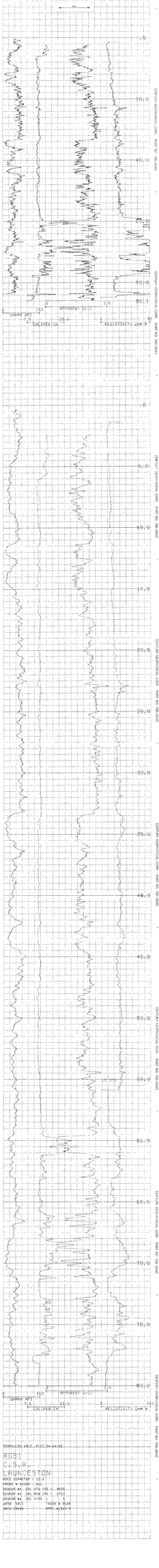

AUSTRALIAN GEOPHYSICAL CONTRACTORS PTY. LTD.
ROSE CREEK BRISBANE
RD81
C.S.R.
LAUNCESTON
TAS.
WELLDATA
TAPE 17 TRACK 4


CENTURY GEOPHYSICAL CORP. PART NO. 780-0043
CENTURY GEOPHYSICAL CORP. PART NO. 780-0040
CENTURY GEOPHYSICAL CORP. PART NO. 780-0041
CENTURY GEOPHYSICAL CORP. PART NO. 780-0042
CENTURY GEOPHYSICAL CORP. PART NO. 780-0045
CENTURY GEOPHYSICAL CORP. PART NO. 780-0046
CENTURY GEOPHYSICAL CORP. PART NO. 780-0047
CENTURY GEOPHYSICAL CORP. PART NO. 780-0048
CENTURY GEOPHYSICAL CORP. PART NO. 780-0049
CENTURY GEOPHYSICAL CORP. PART NO. 780-0050
GAMMA API
CALIPER CM
APPARENT RESISTIVITY OHM M
RESISTIVITY OHM M
10 UPS
RD81
C.S.R.
LAUNCESTON
HOLE DIAMETER = 12.5
PROBE = 8050/1-1686
SEASON #4 CAL STD CPS = 4282
SEASON #4 CAL BKM CPS = 5572
SEASON #4 CAL BIAS = 0
DATE 9/83
TRUCK # 8026
SHED CREWS
RUN: 1 WIDTH 4"


RD81
C.S.R.
LAUNCESTON
TAS.
HOLE DATA
TOTAL DEPTH 130.0 m
CASING DEPTH 24.0 m
DIAMETER 311mm
WATER TABLE UNKNOWN
H&O
VTol
RD81 CIRCULATION BANE
COMMENTS


GAMMA API
APPARENT RES
CALIPER CM
RESISTIVITY OHM M
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
COMPU-LOG VER.3 PLOT 04-04-90
RD81
C.S.R.
LAUNCESTON
HOLE STARTED (CLST)
PROBE # 8032C - 8DS
SENSOR #1 - CAL STA CPS # 3127
SENSOR #2 - CAL RHK CPS # 4324
SENSOR #3 - CAL 910Ω Ω 1
DATA VOL 1 FILE # RD81
DATA CHK'D APPL #1000 #
CENTURY


R081
C.S.R.
LAUNCESTON
TAS.
HOLE DATA
EQUIPMENT DATA


CENTURY GEOPHYSICAL CORP. PART NO. 780-0040
GAMMA API
CALIPER CM
RESISTIVITY OHM M
DIFFERENT
SHORT
LONG
R081
C.S.R.
LAUNCESTON

CENTURY GEOPHYSICAL CORPORATION
OF AUSTRALIA

R081 04-04-82
R081/CREWS BRISBANE

EQUIPMENT DATA

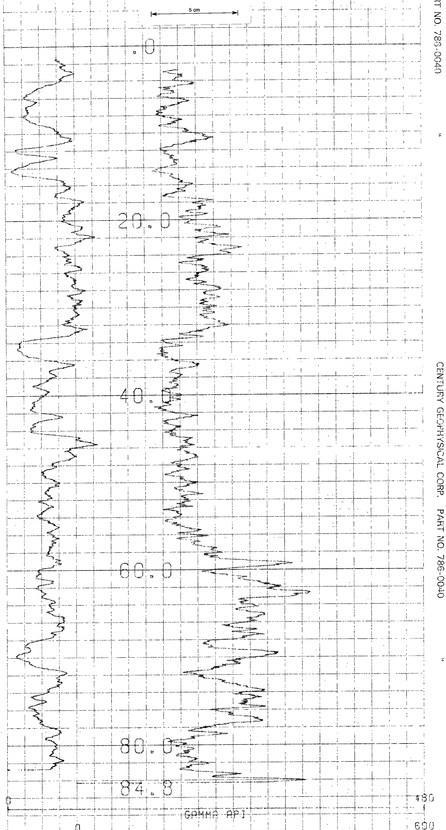
C.S.R.
R081
LAUNCESTON
TAS.

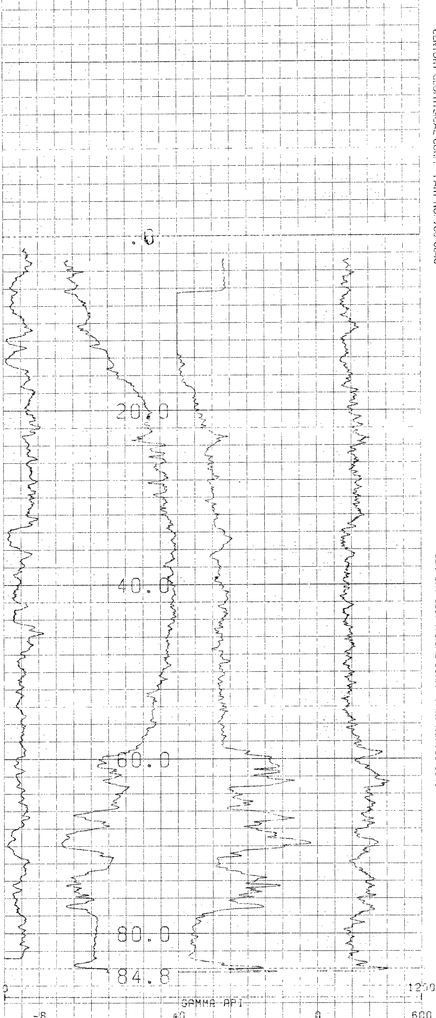
HOLE DATA

70m
84.8m
84.8m
19M/MIN
GL
7050-242
TAPE 18 TRACK 3

12cm
H2O
V7L1

4TH
GL
45cm





COMPU-LOG V8L2 PLOT 04-04-82

R081
C.S.R.
LAUNCESTON
HOLE DIAMETER = 12.0
PROBE # 9055P - 242
SENSOR #4 CAL STD CPS = 152
SENSOR #4 CAL RUN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA V8L2 TRUCK # 6038
GR69 CREWS PPPL.#1005 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 783-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

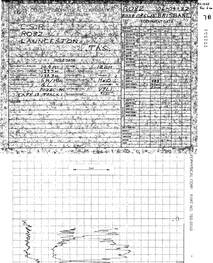
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

83-1786
Vic GMF
76

7151619


ROSZ
LAUNCH CONDITIONS
BLOCK 1
BLOCK 2
BLOCK 3
BLOCK 4
BLOCK 5
BLOCK 6
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BLOCK 8
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BLOCK 11
BLOCK 12
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CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

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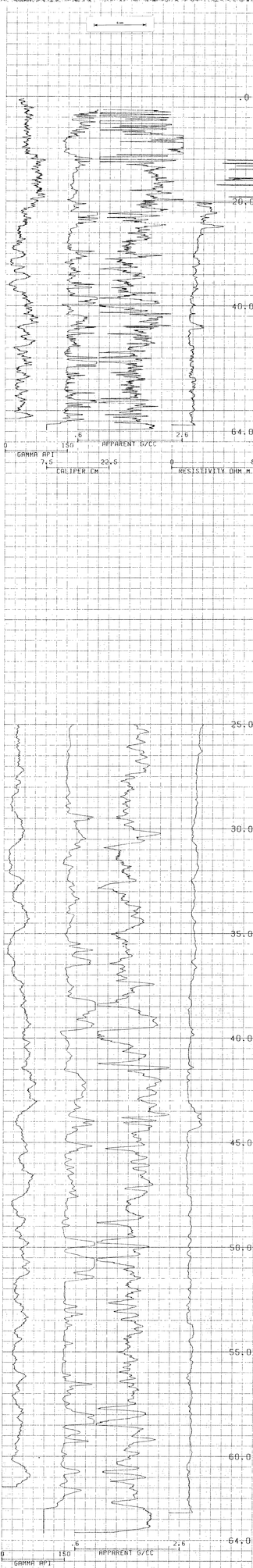
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LAUNCESTON TAS.

HOLE DATA

DRILLER'S DEPTH	18.4m	CASING	12cm
DRILLER'S LOGGED	64.0m	CASING - DRILLED	
LOGGING DEPTH	64.0m	CASING - WEIGHT	
LOGGING MEDIA	FLUID	SALINITY	H2O
BOREHOLE FLUID	GEL	RESISTIVITY	
LOGGING UNIT	7022A-801	SONDE UNIT	V9L1
TAPE/S TRACK 2			

REMARKS



COMPU-LOG V8L2 PLOT 04-06-82

R082

C.S.R.

LAUNCESTON

HOLE DIAMETER = 12.0
PROBE # 80320 - 901
SENSOR #4 CAL STD CPS = 4826
SENSOR #4 CAL RUN CPS = 4772
SENSOR #4 CAL BIAS = 0
DATA V9L1 TRUCK # 8038
OREG CREWS APPL.#1030-K

82-1986.
Vol. Book
80
77153

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

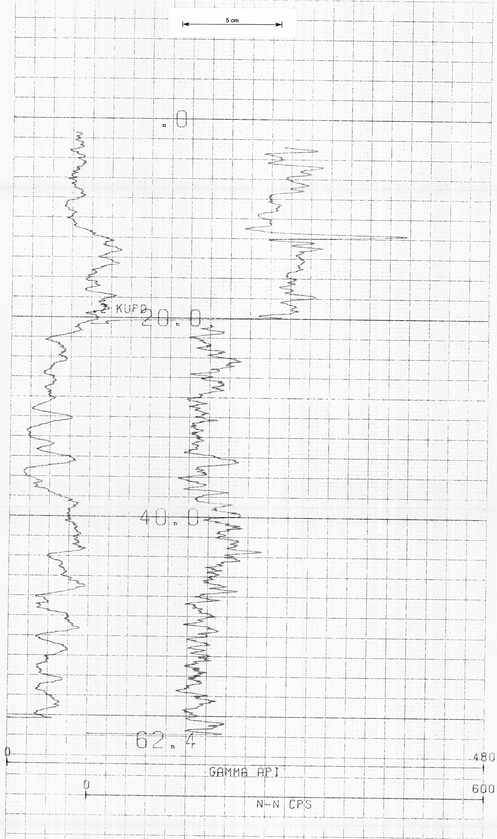
COMPANY	C.S.R.
WELL	R082
FIELD	LAUNCESTON
STATE	TAS
RUN	ONE
DATE	04-04-82
LOCATION	8038 CREWS BRISBANE

EQUIPMENT DATA

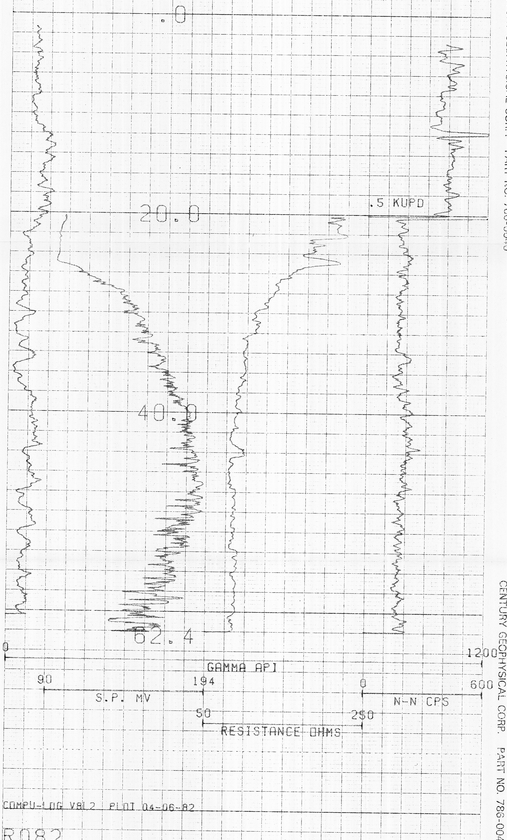
HOLE DATA

TOTAL DEPTH—DRILLER	144M	BIT SIZE	12CM
TOTAL DEPTH—LOGGER	62.4M	CASING—TYPE & SIZE	—
TOTAL WEIGHT (LOGGER)	62.4M	CASING DEPTH	—
LOGGING SPEED	18M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	GL	FLUID RESISTIVITY	— @ — °C
PROBE NO.	9050-242	SOFTWARE LEVEL	V8L1
TAPE 17	TRACK 3	SCALE SELECTION	AT OPERATOR'S DISCRETION

REMARKS



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8L2 PLOT 04-06-82

R082

C.S.R.

LAUNCESTON

HOLE DIAMETER : 12.0

PROBE # 9055A - 242

SENSOR #4 CAL STD CPS = 152

SENSOR #4 CAL RUN CPS = 153

SENSOR #4 CAL BIAS = 0

DATA V8L2 TRUCK # 8038

CREW CREWS APPL.#1005 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION
TYLER, TEXAS U.S.A.

R083 5-24-82
2332 2 AXIS BHC ACNL

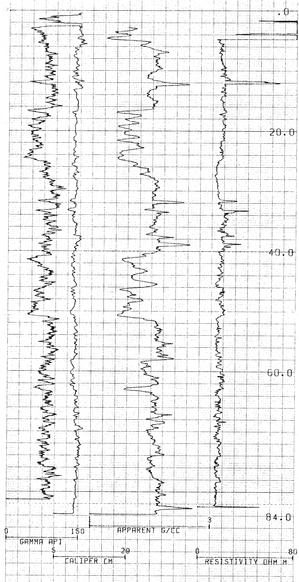
C.S.R.
R083
LAUNCESTON TAS.

EQUIPMENT DATA

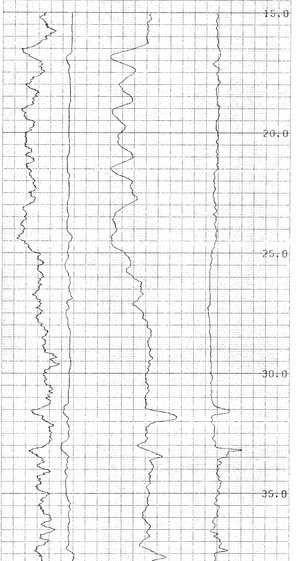
HOLE DATA

24 FT	12CH
8.5 FT	
14.0 FT	
9.0 PPG MUD	H2O
6.0"	1200
TOZELIN	VIS
TAPE 28 TRACK	

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

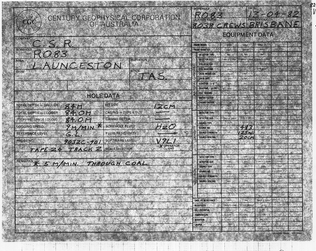


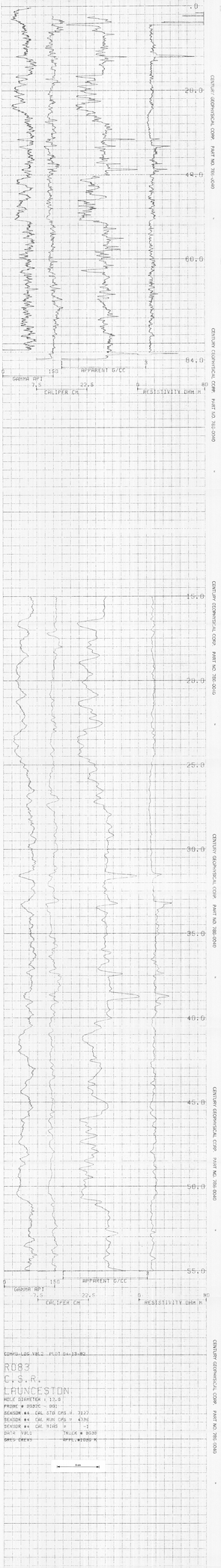
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG VOL.2 PLOT 04-13-82

R083
C.S.R.
LAUNCESTON
HOLE DIAMETER : 15.0
PROBE # 2032.1+ 896
SENSOR #4 CAL STD CPS = 4303
SENSOR #4 CAL RUN CPS = 4785
SENSOR #4 CAL BIAS = 0
BATH VOLT TRUCK # B538
CREW CHIEFS APPL. #1030 #

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040


CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA
R083
COST CENTRE/TASK
EQUIPMENT DATA
C.S.R.
R083
LAUNCESTON
TAS.
HOLE DATA
TRACK 2
6.5 m/min THROUGH COAL


0
20.0
40.0
60.0
84.0
GAMMA API
7.5
150
APPARENT D/CC
CALIPER CM
22.5
0
80
RESISTIVITY OHM m
CENTURY GEOPHYSICAL CORP PART NO. 786-0040
CENTURY GEOPHYSICAL CORP PART NO. 786-0040
15.0
20.0
25.0
30.0
35.0
40.0
45.0
50.0
55.0
CENTURY GEOPHYSICAL CORP PART NO. 786-0040
CENTURY GEOPHYSICAL CORP PART NO. 786-0040
COMPULOG V8.2 PLOT 04-13-82
R083
C.S.R.
LAUNCESTON
HOLE DIAMETER = 15.0
PROBE # 0030C - 900
SENSOR #4 CAL STR CPS = 7122
SENSOR #4 CAL MIN CPS = 4396
SENSOR #4 CAL BIAS = -1
DATA VOL1
TRUCK # R038
OPR: WILSON K
CENTURY GEOPHYSICAL CORP PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION
TULSA, OKLAHOMA
AUSTRALIA

R083
C.S.R.
LAUNCESTON
TAS.

HOLE DATA

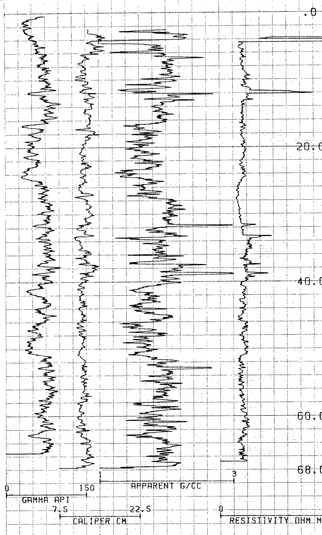
DEPTH DRILLER	61.0m
DEPTH LOGGER	61.0m
CASING	6.0m
CASING	152mm
FLUID IN HOLE	WATER
FLUID LEVEL	1.0m
TYPE LOG	TRACK 3

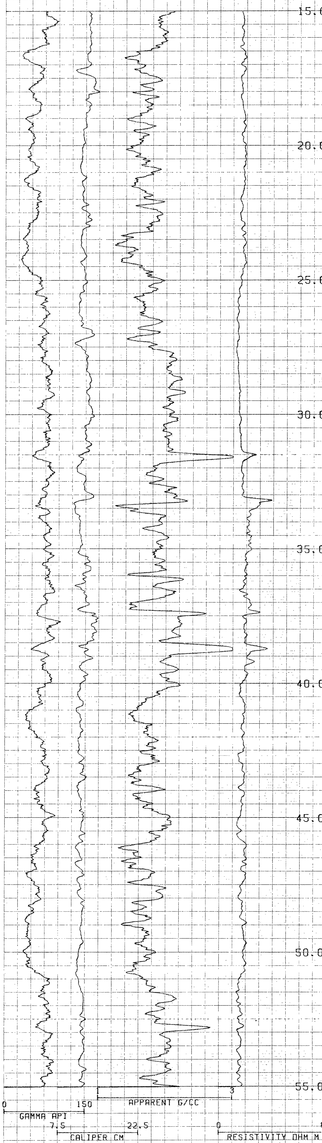
R083 C.S.R. LAUNCESTON TAS

EQUIPMENT DATA

TRUCK	8038
PROBE	9032A
SONDE	901
CENTRALIZER	YES
CABLE	1.5K
CABLE	7/16"
RECORDED BY	GREG CREWS
WITNESSED BY	

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040





COMPU-LOG V8.2 PLOT 04-13-82

R083
C.S.R.
LAUNCESTON

HOLE DIAMETER : 12.0
PROBE # 9032A - 901
SENSOR #4 CAL STD CPS = 4825
SENSOR #4 CAL RUN CPS = 4747
SENSOR #4 CAL BIAS = 0
DATA V8.1 TRUCK # 8038
GREG CREWS APPL.#1080 K

1cm

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R083 13-04-82

2629 GAC/CSIRO MARINE

EQUIPMENT DATA

C.S.R.

R083

LAUNCESTON TAS

HOLE DATA

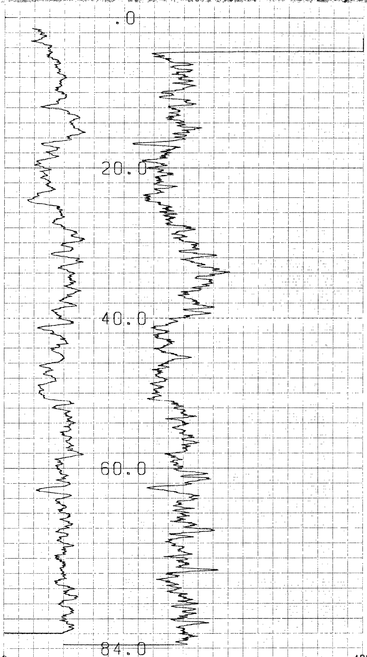
TOTAL DEPTH - DRILLER	84m	MUD	228
TOTAL DEPTH - LOGGER	84.0m	CASING SIZE & WEIGHT	
TOTAL LITHOLOGY DRILLED	84.0M	CASING DEPTH	
CASING SHOE		BOREHOLE FLUID	H2O
MEASURED FROM	6.0	BOREHOLE CONDITIONS	
FROM KB	9050-242		V961

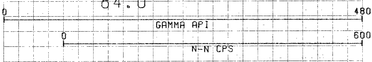
TAPE # 6 TRACK 45

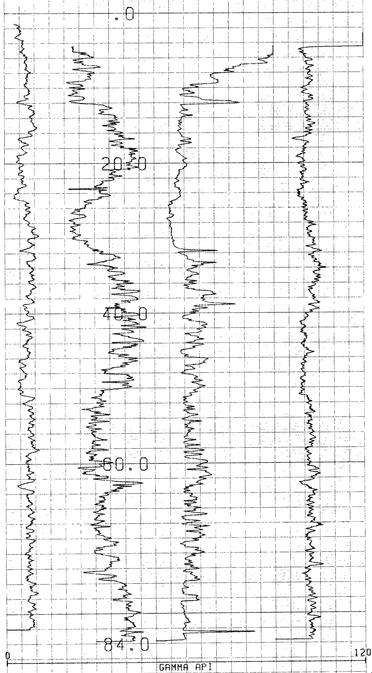
REMARKS

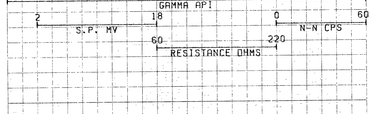
1244 Ms Cook. 84.

77157









COMPU-LOG V8L2 PLOT 04-13-82

R083

C.S.R.

LAUNCESTON

HOLE DIAMETER = 12.0

PROBE # 9055R - 242

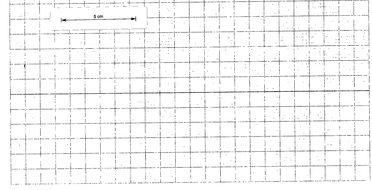
SENSOR #4 CAL STD CPS = 152

SENSOR #4 CAL NUM CPS = 153

SENSOR #4 CAL BIAS = 0

DATA V8L1 TRUCK # 8038

GMEG CREWS APPL.#5 K



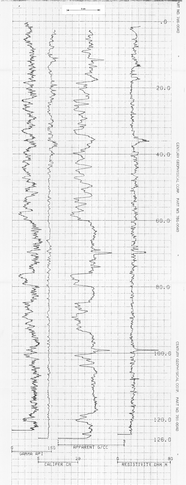
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

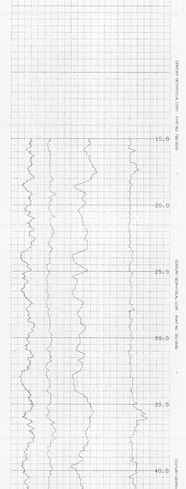
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

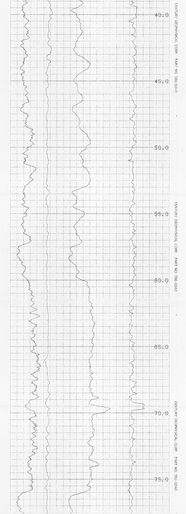
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

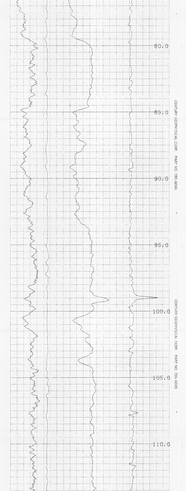
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

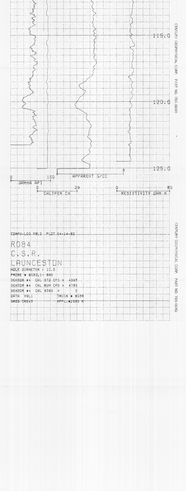

RD84
C.S.I.R.
LAUNCESTON
HOLE DIAMETER = 115
PROBE N WIDTH = 800
SOUTH N CAL RES (Ω) = 6547
SOUTH N CAL RES (Ω) = 6781
SOUTH N CAL RES (Ω) =
DATE (ALL) TWIN N WIDTH
SWEEP CIRCLE APPLI WIDTH N
GAMMA API
CALIPER CM
APPARENT S/CC
RESISTIVITY OHM.M

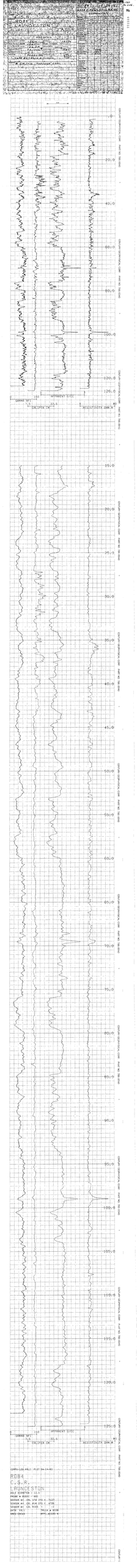

GAMMA API
CALIPER CM
APPARENT S/CC
RESISTIVITY OHM.M


GAMMA API
CALIPER CM
APPARENT S/CC
RESISTIVITY OHM.M

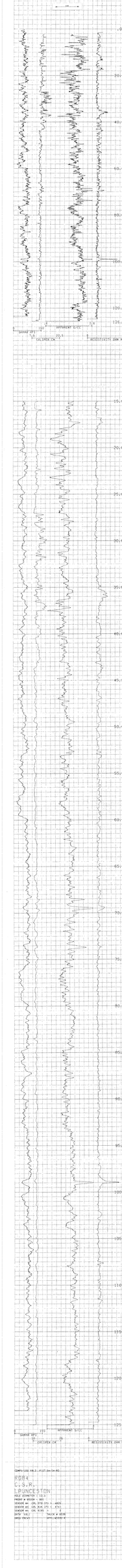

GAMMA API
CALIPER CM
APPARENT S/CC
RESISTIVITY OHM.M


GAMMA API
CALIPER CM
APPARENT S/CC
RESISTIVITY OHM.M


GAMMA API
CALIPER CM
APPARENT S/CC
RESISTIVITY OHM.M


RG84
C-3-R.
LAUNCESTON
LOG OF BORE
BORE CONSTRUCTION
GEOPHYSICAL LOGS
CALIPER CM
RESISTIVITY OHM M
SPONTANEOUS POTENTIAL MV
GAMMA API
0
20.0
40.0
60.0
80.0
100.0
120.0
126.0
15.0
20.0
25.0
30.0
35.0
40.0
45.0
50.0
55.0
60.0
65.0
70.0
75.0
80.0
85.0
90.0
95.0
100.0
105.0
110.0
115.0
120.0
125.0


ROSS
CLARENCE
PUNCESTON
C.S.I.R.O.


ROSS
CLARENCE
PUNCESTON
C.S.I.R.O.
APPARENT RES.
CALIPER CM
RESISTIVITY OHM M

CENTURY GEOPHYSICAL CORPORATION
TULSA, OKLAHOMA

R084
C.S.R.
LAUNCESTON
TAS.

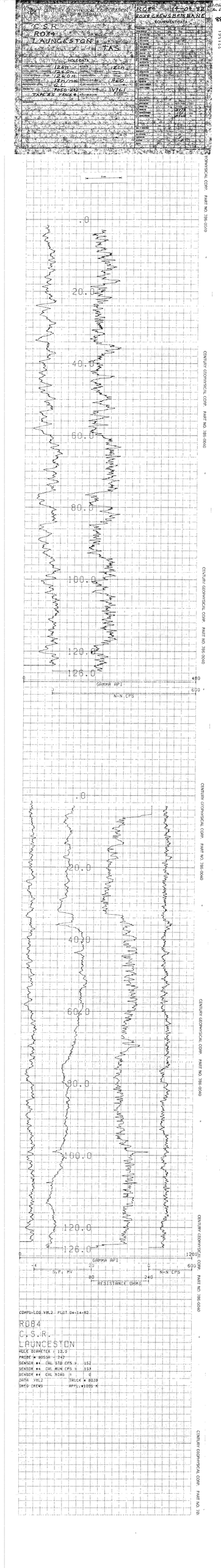
HOLE DATA

DRL. MEAS. FROM	12ft	ELEV.	1161
DRILLER'S DEPTH	126.0ft	DATE	—
LOGGER'S DEPTH	126.0ft	SRC. OF SAMPLES	—
CASING DEPTH	13ft/13ft	TYPE FLUID	H2O
BIT SIZE	6"	DENSITY	—
TYPE LOG	TOOD-ZED	VISC.	—
	TAPE 25 TRACK 4		

R084 C.S.R. LAUNCESTON TAS.

COMMENTS/DATA

RUN NO.	1
DATE	4-14-82
TYPE LOG	TOOD-ZED
DEPTH-DRILLER	126.0ft
DEPTH-LOGGER	126.0ft
BTM. LOG INTERVAL	126.0ft
TOP LOG INTERVAL	13ft/13ft
CASING-DRILLER	6"
CASING-LOGGER	—
BIT SIZE	6"
TYPE FLUID	H2O
DENSITY	—
VISC.	—
PH	—
FLUID LOSS	—
SOURCE OF SAMPLE	—
RM @ MEAS. TEMP.	—
RMF @ MEAS. TEMP.	—
RMC @ MEAS. TEMP.	—
SOURCE RMF/RMC	—
RM @ BHT	—
TIME SINCE CIRC.	—
MAX. REC. TEMP.	—
EQUIP. LOCATION	—
RECORDED BY	—
WITNESSED BY	—



COMPU-LOG VOL.2 PLOT 04-14-82

R084
C.S.R.
LAUNCESTON

HOLE DIAMETER = 12.0
PROBE # 8055R - 242
SENSOR #4 CAL STD CPS = .152
SENSOR #4 CAL RUN CPS = .153
SENSOR #4 CAL VOLS = 0
DATA VOLT THICK # 8038
SMPD CREWS APPL.#1005 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 78

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C.S.R.
RO85
LAUNCESTON
TAS.

RO85 16-04-92
ROSE CREWS BRISBANE

HOLE DATA

TOTAL DEPTH - DRILLER	102m	HOLE DIA	12CM
TOTAL DEPTH - LOGGER	102.0M	CASING - DRILLER	
CSG. SHOE DEPTH	102.0M	CASING DEPTH	
DEPTH CONTROL	T.P.(M)	CASING DIA	
RECORDED BY		FLUID RESISTIVITY	
WITNESSED BY		FLUID TEMPERATURE	
RUN NO.	1	TIME SINCE CIRC.	

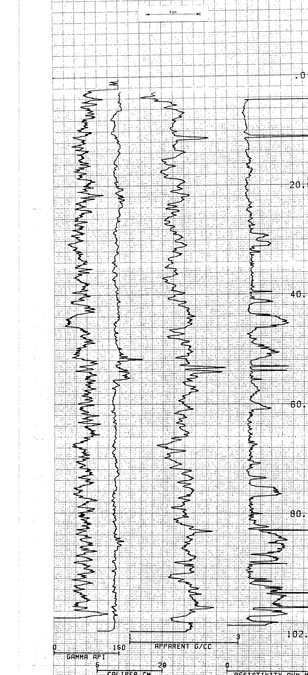
GAM 102.0-0.0M
TAPE 26 TRACK 1

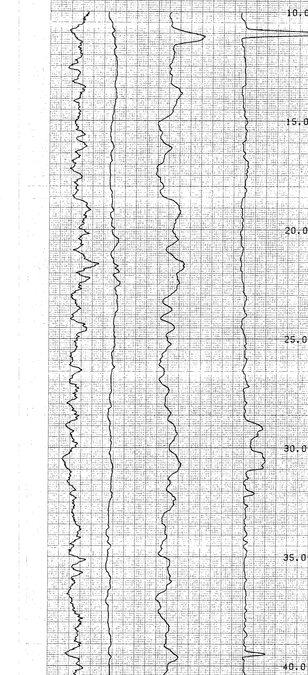
EQUIPMENT DATA

PROBE NO.	1		
SONDE NO.	1		
CABLE NO.	1		
SPACING	1		
MAX. TEMP.	1		
MAX. PRESS.	1		
CENTRALIZER	1		
SINKER BAR	1		
SINKER BAR WT.	1		
CABLE TYPE	1		
CABLE LENGTH	1		
CABLE WT.	1		
CABLE DIA.	1		
CABLE HEAD	1		
CABLE HEAD WT.	1		
CABLE HEAD DIA.	1		
WEIGHTS	1		
WEIGHTS WT.	1		
WEIGHTS DIA.	1		
TOOL LENGTH	1		
TOOL WT.	1		
TOOL DIA.	1		
TOOL TYPE	1		
TOOL SERIAL NO.	1		
TOOL CALIBRATION	1		
TOOL CALIBRATION DATE	1		
TOOL CALIBRATION BY	1		
TOOL CALIBRATION NO.	1		
TOOL CALIBRATION TYPE	1		
TOOL CALIBRATION UNITS	1		
TOOL CALIBRATION VALUE	1		
TOOL CALIBRATION ERROR	1		
TOOL CALIBRATION NOTES	1		

REMARKS

CENTURY GEOPHYSICAL CORP. PART NO. 785-0040





COMPU-LOG VOL.2 PLOT 04-16-92

RO85
C.S.R.
LAUNCESTON
HOLE DIAMETER = 12.0
PROBE # 8032:1= 998
SENSOR #4 CAL STD CPS = 4895
SENSOR #4 CAL RUN CPS = 4786
SENSOR #4 CAL BIAS = 0.
DATA: VOL1 TRUCK # 8038
GEO CREWS APPL:#34 K

1-1744.
No Data.
90

595644

CENTURY GEOPHYSICAL CORPORATION
TULSA, OKLAHOMA U.S.A.

R085 15-APR-82
ROSE CRES BRISBANE
EQUIPMENT DATA

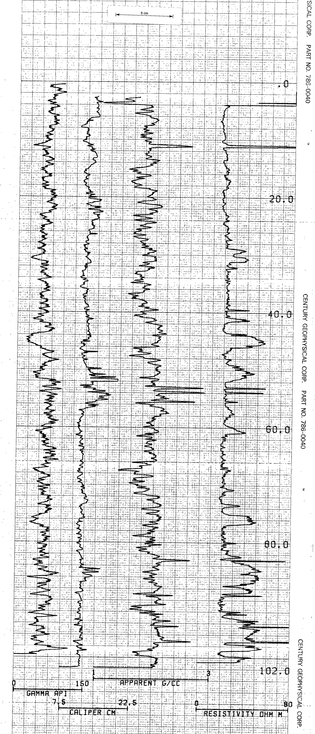
C.S.R.
R085
LAUNCESTON TAS.

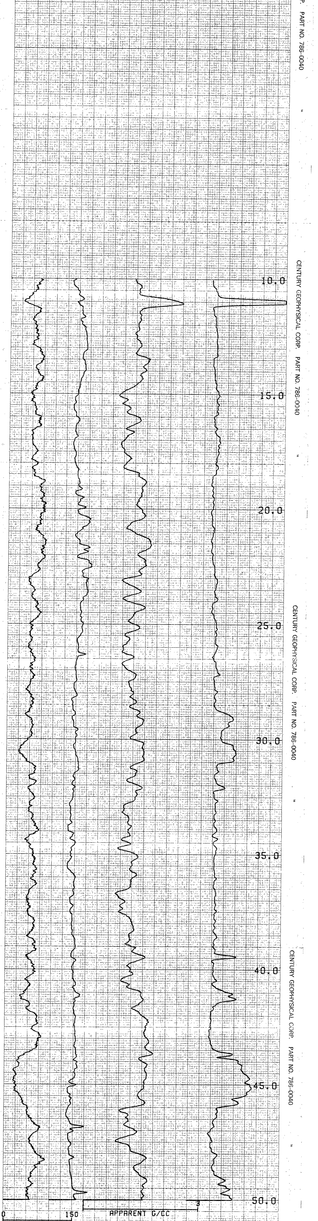
HOLE DATA

DRILLER'S DEPTH	102.0m	CASING	12.0m
LOGGER'S DEPTH	102.0m	CASING TYPE	—
DRILLING FLUID	FW/MIN	BOREHOLE FLUID	H2O
RESISTIVITY CAL	—	FLUID RESISTIVITY	—
PROBE NO.	8032C-301	BIT DIAMETER (MM)	VALI

TAKE OFF TRACK AT 95.0m IN COAL

R.F. THROUGH LIGNEOUS ZONE





COMPU-LOG Vol.2 PLOT 04-15-82

R085
C.S.R.
LAUNCESTON

HOLE DIAMETER = 12.0
PROBE # = 8032C - 801
SENSOR #4 CAL STD CPS = 7127
SENSOR #4 CAL RUN CPS = 4728
SENSOR #4 CAL BIAS = -1
DATA: VALI TRUCK # 8038
DREG CREWS APPL. 40.00 M

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C.S.R.
ROAD
LAUNCESTON
TAS.

HOLE DATA

TOTAL DEPTH - DRILLER	102m
TOTAL DEPTH - LOGGER	102.0m
CASING DEPTH - LOGGER	102.0m
BOTTOM LOGGED INTERVAL	102.0m
LOGGING SPEED	7m/min
MAXIMUM RECORDED TEMP.	64
RECORDED AT	9:22 A.M.
TAPE 24 TRACK 3	

BIT SIZE	12cm
CASING / TYPE & SIZE	
CASING DEPTH	
SURFACE TEMP.	18
FLUID RESISTIVITY	
DATE RUN	13-04-82
TIME	1:30 P.M.
RECORDED BY	
WITNESSED BY	

ROAD
ROSE CREWS/BRISBANE

EQUIPMENT DATA

TOOL TYPE			
PROBE			
SENSOR			
SENSOR			
SENSOR

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R085 15-04-82
8038 CREWS BRISBANE

EQUIPMENT DATA

PROBE TYPE	9055A-242		
SONDE			
CABLE			
WINCH			
RECORDER			
SHOT FILTER			
SPEC. FILTER			
SPEC. GAIN			
SPEC. TIME			
GAMMA FILTER			
GAMMA GAIN			
GAMMA TIME			
CALIPER			
CAL. RUN			
CAL. STD.			
CAL. BIAS			
CABLE SPEED			
CABLE LENGTH			
CABLE DIAM.			
CABLE WEIGHT			
CABLE STRENGTH			
CABLE RESIST.			
CABLE CAPACITY			
CABLE TYPE			
CABLE CONDUCTORS			
CABLE INSULATION			
CABLE JACKET			
CABLE SHIELD			
CABLE TERMINATION			
CABLE HEAD			
CABLE CONNECTOR			
CABLE SOCKET			
CABLE SWIVEL			
CABLE CLAMP			
CABLE GRIP			
CABLE SEAL			
CABLE GLAND			
CABLE BOOT			
CABLE SLEEVE			
CABLE TAPE			
CABLE PAINT			
CABLE MARKER			
CABLE REEL			
CABLE DRUM			
CABLE FRAME			
CABLE GUIDE			
CABLE PULLEY			
CABLE SHEAVE			
CABLE BEARING			
CABLE SHAFT			
CABLE KEY			
CABLE WASHER			
CABLE NUT			
CABLE BOLT			
CABLE SCREW			
CABLE NAIL			
CABLE STAPLE			
CABLE HOOK			
CABLE EYE			
CABLE RING			
CABLE CHAIN			
CABLE LINK			
CABLE SWIVEL			
CABLE CLAMP			
CABLE GRIP			
CABLE SEAL			
CABLE GLAND			
CABLE BOOT			
CABLE SLEEVE			
CABLE TAPE			
CABLE PAINT			
CABLE MARKER			
CABLE REEL			
CABLE DRUM			
CABLE FRAME			
CABLE GUIDE			
CABLE PULLEY			
CABLE SHEAVE			
CABLE BEARING			
CABLE SHAFT			
CABLE KEY			
CABLE WASHER			
CABLE NUT			
CABLE BOLT			
CABLE SCREW			
CABLE NAIL			
CABLE STAPLE			
CABLE HOOK			
CABLE EYE			
CABLE RING			
CABLE CHAIN			
CABLE LINK			

CLIENT C.S.R.
AGENCY
WELL R085
FIELD LAUNCESTON
COUNTY
STATE TAS.
LOCATION
OTHER SERVICES

HOLE DATA

TOTAL DEPTH — DRILLER	102M	MUD WT.	12CH
TOTAL DEPTH — LOGGER	102.0M	CASING SIZE & WGT.	
CASING SHOE — LOGGER	102.0M	CASING DEPTH	
LEVEL MEASURED FROM	RIM/GL.	KB/DF/GL ELEV.	H2O
PERMANENT DATUM	GL.	FLUID RESISTIVITY	
RECORDED BY	9055A-242	NORTHING/EASTING	V91.1
WITNESSED BY	TAPE 6 TRACK 8	MISCELLANEOUS	

REMARKS

RUN NO. 1
TIME CIRC. 4 HRS
MAX. REC. TEMP. 18°C
EST. CEMENT TOP
EQUIP. NO. 8038
LOCATION
RECORDED BY CREWS
WITNESSED BY

BIT SIZE	12.25		
TYPE FLUID	H2O		
DENSITY			
VISCOSITY			
PH			
FLUID LOSS			
SOURCE OF SAMPLE			
RM @ MEAS. TEMP.			
RMF @ MEAS. TEMP.			
RMC @ MEAS. TEMP.			
SOURCE OF RMF			
SOURCE OF RMC			
RM @ BHT			
TIME SINCE CIRC.	4 HRS		
MAX. REC. TEMP.	18°C		
EQUIP. LOCATION			
RECORDED BY	CREWS		
WITNESSED BY			

82-1761.
Vers. Cont.
92

2215163

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

.0
20.0
40.0
60.0
80.0
102.0

0 480
GAMMA API
0 600
N-N CPS

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

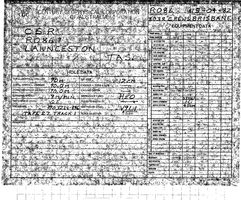
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102.0

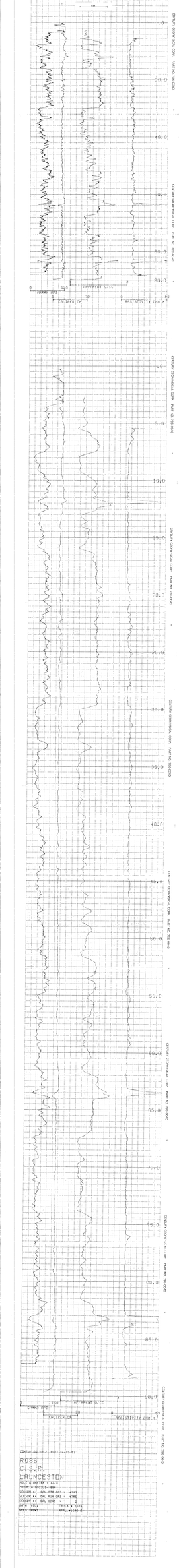
0 1200
GAMMA API
-34 S.P. MV 0
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N-N CPS
80 240
RESISTANCE OHMS

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8.2 PLOT 04-18-82

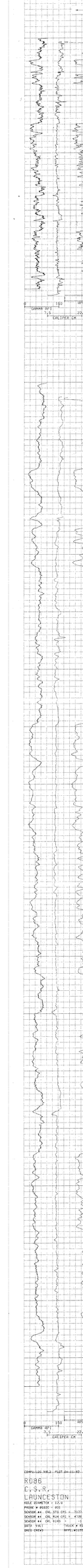
R085
C.S.R.
LAUNCESTON
HOLE DIAMETER = 12.0
PROBE = 9055A - 242
SENSOR #4 CAL STD CPS = 152
SENSOR #4 CAL RUN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA VALI TRUCK # 8038
GREG CREWS APPL.#1005-K

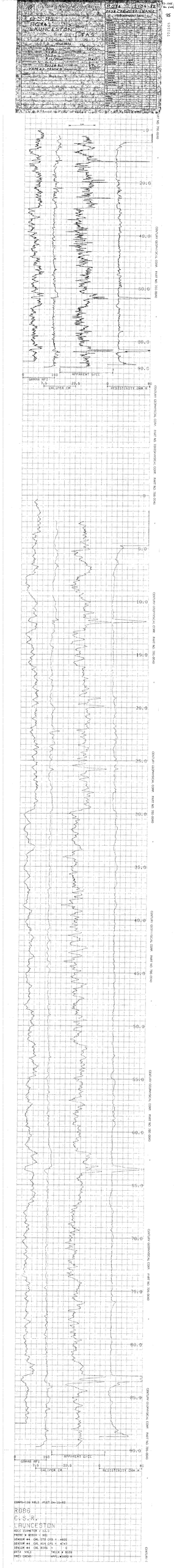

ROBE
C.S.R.
LAUNCESTON
TASMANIA


CENTURY GEOPHYSICAL CORP. PART NO. 7512-0000
APPARENT RES.
CHG/VOLT CM
RESISTIVITY UNIT Ω
CENTURY GEOPHYSICAL CORP. PART NO. 7512-0000
CENTURY GEOPHYSICAL CORP. PART NO. 7512-0000
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CENTURY GEOPHYSICAL CORP. PART NO. 7512-0000
CENTURY GEOPHYSICAL CORP. PART NO. 7512-0000
APPARENT RES.
CHG/VOLT CM
RESISTIVITY UNIT Ω
CENTURY GEOPHYSICAL CORP. PART NO. 7512-0000
ROBE
C.S.R.
LAUNCESTON


ROSS SEARLE
ROSS CAVE BRISBANE
CORE
LAUNCESTON
TAS
HOLE DATA:
SIZE
DEPTH
CASING
CORE SIZE
STATE OF HOLE

94


UPPARENT D/C
GAMMA API
CALIPER CM
RESISTIVITY OHM M
DENSITY COMPENSATED LOG
PAGE NO. 1A1-0000
PAGE NO. 1A2-0000
PAGE NO. 1A3-0000
PAGE NO. 1A4-0000
PAGE NO. 1A5-0000
PAGE NO. 1A6-0000
PAGE NO. 1A7-0000
PAGE NO. 1A8-0000
PAGE NO. 1A9-0000
COMPU-LOG WELL PLOT 24-11-92
ROSS
D.S.R.
LAUNCESTON
HOLE DIAMETER - 12.4
PROBE # 8022 - 001
SENSOR #4 CAL STD CPS = 7127
SENSOR #4 CAL RUN CPS = 4786
SENSOR #4 CAL VOLTS = 5.450
DATE 1987
DATE CHKD
PROBE # 8338
SPPL:#1370 #


G.S.R.
ROSS
LAUNCESTON
TAS.
DATE 15.10.82
TIME ON BOTTOM (DATE)
95
71-117
to 124
FIELD
OFFICE
ROTARY
TOOLS
CABLE
TYPE
WEIGHT
SIZE
TYPE
TRACK
CASING
SIZE
TYPE
DEPTH
DRILLER
LOGGER
BOTTOM DRILLER
LOGGER
TOP LOG INTERVAL
BOTTOM LOG INTERVAL
CASING DRILLER
LOGGER
BIT SIZE
TYPE FLUID
DENSITY
VISCOSITY
PH
FLUID LOSS
SOURCE OF SAMPLE
RM @ MEAS. TEMP.
RMF @ MEAS. TEMP.
RMC @ MEAS. TEMP.
SOURCE OF RMF
SOURCE OF RMC
RM @ BHT
TIME SINCE CIRC.
MAX. REC. TEMP.
EQUIP. LOCATION
RECORDED BY
WITNESSED BY
RUN NO.
TYPE LOG
DEPTH-DRILLER
DEPTH-LOGGER
BTM. LOG INTERVAL
TOP LOG INTERVAL
CASING-DRILLER
CASING-LOGGER
BIT SIZE
TYPE FLUID IN HOLE
DENSITY
VISCOSITY
PH
FLUID LOSS
SOURCE OF SAMPLE
RM @ MEAS. TEMP.
RMF @ MEAS. TEMP.
RMC @ MEAS. TEMP.
SOURCE RMF
SOURCE RMC
RM @ BHT
TIME CIRC. (HRS)
MAX. REC. TEMP.
EQUIP. LOCATION
RECORDED BY
WITNESSED BY
GAMMA RAY
CALIPER
RESISTIVITY
SPONTANEOUS POTENTIAL

CENTURY GEOPHYSICAL CORPORATION
AUSTRALASIA

R086 15-04-82
8038 CREWS BRISBANE
EQUIPMENT DATA

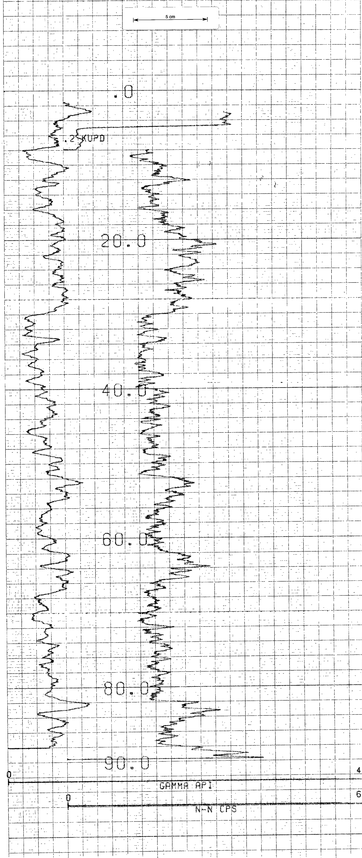
C.S.R.
R086
LAUNCESTON
TAS

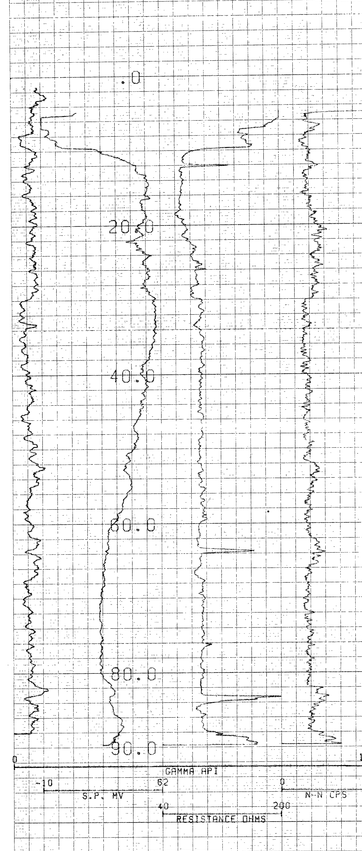
HOLE DATA

TOTAL DEPTH - Driller	70m	CASING	12cm Ø
TOTAL DEPTH - Logger	70.0m	CASING TYPE & DEPTH	
BOTTOM LOGGED INTERVAL	70.0m	MUD TYPE	WBO
MAXIMUM RECORDED TEMP.	6.4	FLUID RESISTIVITY	
RECORDED BY	7450-242	WITNESSED BY	V8L1

TAPE # 2.7 TRACK # LOGGING RUN

772-1744.
Vol. 6 of 6.
96
772-1744



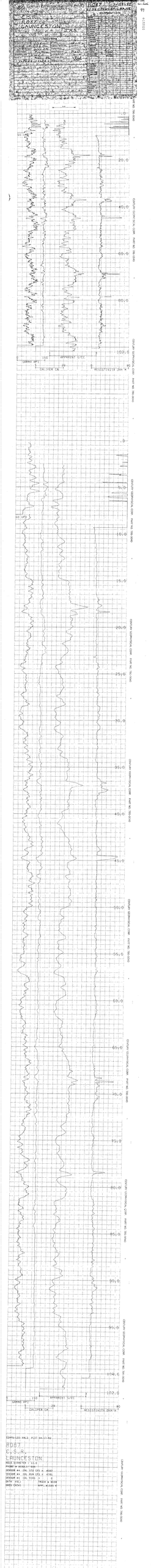


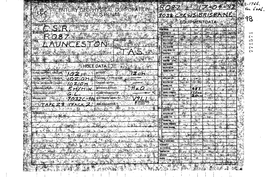
COMPU-LOG V8L2 PLOT 04-16-82

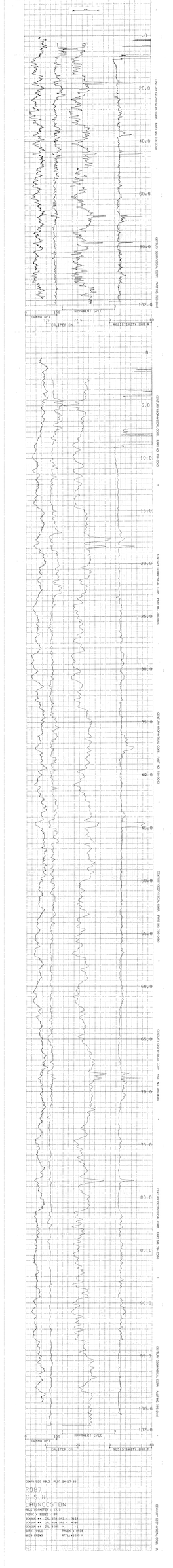
R086
C.S.R.
LAUNCESTON

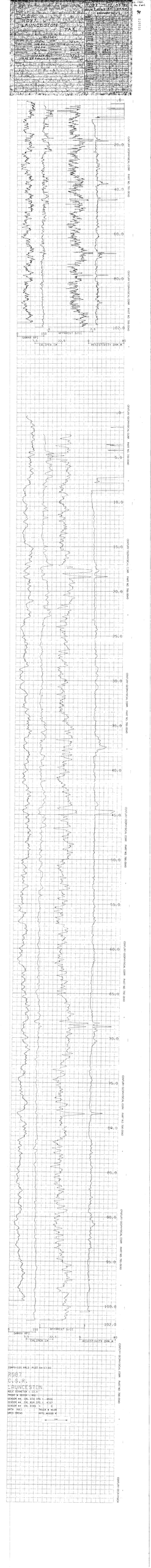
HOLE DIAMETER : 12.0
PROBE # 8038A - 242
SENSOR #4 CAL STD CPS = 152
SENSOR #4 CAL MIN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA V8L1 TRUCK # 8038
GREG CREWS APPL.#5 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040


RD87
RECEIVED
LAUNCESTON
TASMANIA
GAMMA RAY
CALIPER CM
RESISTIVITY OHM M
APPARENT SIZE
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C.S.R.
LAUNCESTON
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SENSOR #2 CAL 1000 CPS = 7.5
SENSOR #3 CAL 3185 CPS = 1.0
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CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C.S.R.
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FOR: CREWS BRISBANE

EQUIPMENT DATA

HOLE DATA

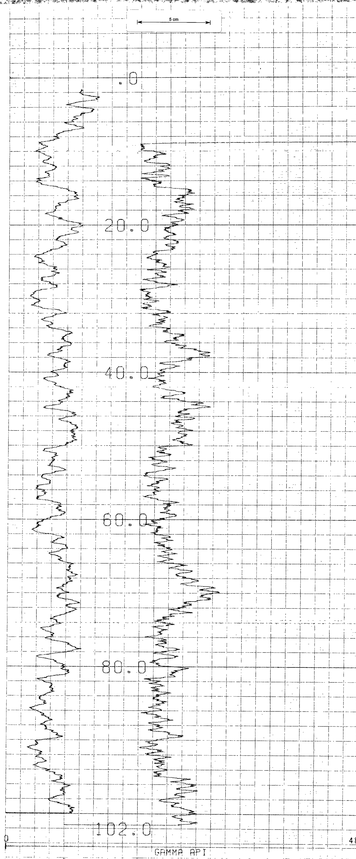
DRILLER'S DEPTH	102 m	BIT SIZE	12cm
LOGGER'S DEPTH	102.0m	CASING TYPE & SIZE	
TOTAL DEPTH LOGGED	102.0m	CASING DEPTH	
LOGGING SPEED	18m/MIN.	BOREHOLE FLUID	H2O
DIFFERENCE LEVEL	0 m	FLUID RESISTIVITY	
RIG NO.	9050-242	SOFTWARE LEVEL	V8L1

TAPE 28 TRACK 4 | SCALE 1:200 | SCALE 1:1000

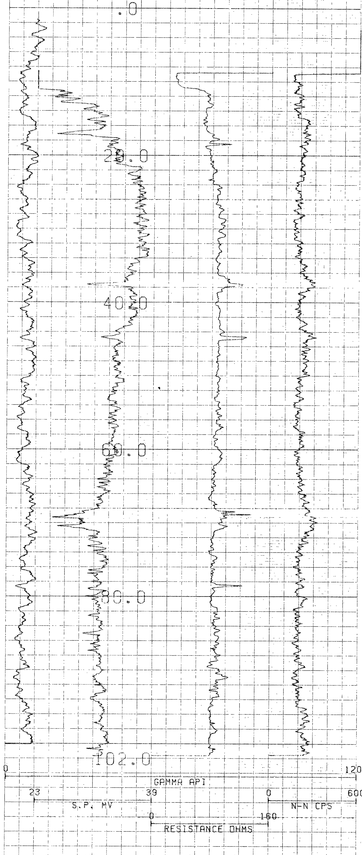
REMARKS

SONDE NO.	3778	
SONDE DIAMETER	10"	
SAND STAND	15cm	

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8L2 | PLOT 04-17-82

R087
C.S.R.
LAUNCESTON
HOLE DIAMETER = 12.0
PROBE # 9055B - 242
SENSOR #4 CAL STD CPS = 153
SENSOR #4 CAL RUN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA V8L2 TRUCK # 8038
DRLD CREWS APPL. #1005 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C.S.R.
R.037
LAUNCESTON
TAS.

HOLE DATA

Total depth - Driller	1017	Casing	12CM
Total depth - Logger	1016FT	Casing depth - Driller	none
Total depth - Logger	1062M	Casing depth - Logger	
Bit record	8 1/2INCH	Fluid in hole	H2O
Date	8-11-74	Fluid level	120FT
Max. rec. temp. deg. F. or deg. C.	74DEG.F.	Time since circ.	17HR

RUN NO. 1

R.037 17-03-212
R.037 FLOW BRISBANE

EQUIPMENT DATA

Tool Type	Serial No.	Location	Size
GAMMA RAY	1		
CALIPER	1		
NEUTRON	1		
DENSITY	1		
SONIC	1		
RESISTIVITY	1		
TEMP.	1		
FLUID RES.	1		
CABLE			

Truck No.			
Unit No.			
Cable No.			
Cable Length	1100		
Depth Counter No.	1		
Depth Wheel No.	1		

RECORDED BY
WITNESSED BY

REMARKS

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C.S.R.
R087
LAUNCESTON
Situated in Parish of FAST

R087 12-04-82
MORE REVERSIBLE BANE

EQUIPMENT DATA

HOLE DATA

DATE 10.8.82
LOG DATE 10.8.82
RECORDED BY TUNNY
WITNESS Mr. L.
RUN NO. ONE
TAPE NO. 7826.780
TYPE FLUID WTR

SOURCE OF SAMPLE R.S.TUNN/TASMAN COAL

CENTURY GEOPHYSICAL CORP PART NO. 780-0040

0
20.0
40.0
60.0
80.0
100.0
108.0

GAMMA API
0 150
APPARENT DIA"
CALIPER CM
6 22.5
RESISTIVITY OHM M
0 80

CENTURY GEOPHYSICAL CORP PART NO. 780-0040

30.0
35.0
40.0
45.0
50.0
55.0
60.0
65.0
70.0
75.0
80.0
85.0
90.0
95.0
100.0

GAMMA API
0 150
APPARENT DIA"
CALIPER CM
6 22.5
RESISTIVITY OHM M
0 80

CENTURY GEOPHYSICAL CORP PART NO. 780-0040

FINAL LOG VR 2 PLOT RAIOE-#2

R089
C.S.R.
LAUNCESTON
HOLE DIAMETER = 12.0
PROBE = 9032C - 901
SENSOR #4 CAL STD OHMS = 7127
SENSOR #4 CAL RUN OHMS = 4734
SENSOR #4 CAL RING = -1
DEPTH REF. TRUCK = 9028
DEPTH CHKD BY WITNESS =

CENTURY GEOPHYSICAL

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R087 18-04-91
R087 CSG/BRISBANE

C.S.R.
R087
LAUNCESTON
TAS.

EQUIPMENT DATA

RECEIVER			
TRANSMITTER			
TRANSFORMER			
CABLE			
CABLE REEL			
CABLE REEL			
CABLE REEL

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R087 19-04-82
2038 CREWS BRISBANE

EQUIPMENT DATA

C.S.R.
R087
LAUNCESTON
TAS.

HOLE DATA

TOTAL DEPTH DRILLER	108m	CASING	12cm
TOTAL DEPTH LOGGER	108.0m	CASING DEPTH	
TOTAL DEPTH LOGGED	108.0m	CASING SHOE	
DRILLING SPEED	12m/min	MAGNETIC DECLINATION	H2O
FLUID LEVEL	G.L.	FLUID DENSITY	
TRUCK No.	2038 2A	EQUIPMENT LOCATION	VAN
TAPE 27 TRUCK K		LOGGED INTERVAL	

REMARKS

82-7444
Van Lond.
104

7716/77

PART NO. 786-0040

CENTURY GEOPHYSICAL CORP.

5 cm

0
20.0
40.0
60.0
80.0
100.0
108.0

GAMMA API
0 180
N-N CPS
0 60

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R090 18-04-82
Hole No. Date
8038 CREWS BRISBANE
Logging Unit Crew Base

EQUIPMENT DATA

TOOL NAME			
TOOL NUMBER			
SENSOR No.			
SENSOR SPACING			
SENSOR OFFSET			
TIME CONSTANT			
TEMP. RANGE

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R090 18-04-82
8038 CREWS BRISBANE

EQUIPMENT DATA

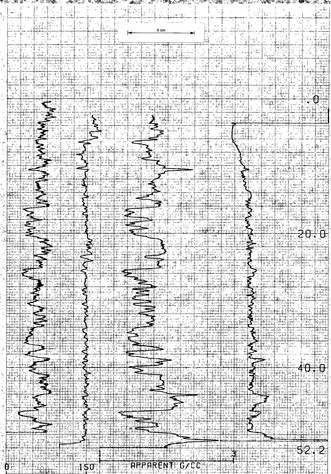
PROBE NUMBER			
PROBE TYPE	TEL		
BOOSTER SN			
BOOSTER TYPE			
LOGGING CABLE			
CABLE LENGTH			
SONDE SN			
SONDE TYPE			
SONDE O.D.			
SONDE WEIGHT			
SONDE CENTRES			
SONDE TYPE			
BOOSTER SN			
BOOSTER TYPE			
BOOSTER O.D.			
BOOSTER WEIGHT			
BOOSTER CENTRES			
BOOSTER TYPE			
NO. OF MAGNETS			
MAGNET TYPE			
MAGNET O.D.			
MAGNET WEIGHT			
MAGNET CENTRES			
MAGNET TYPE			

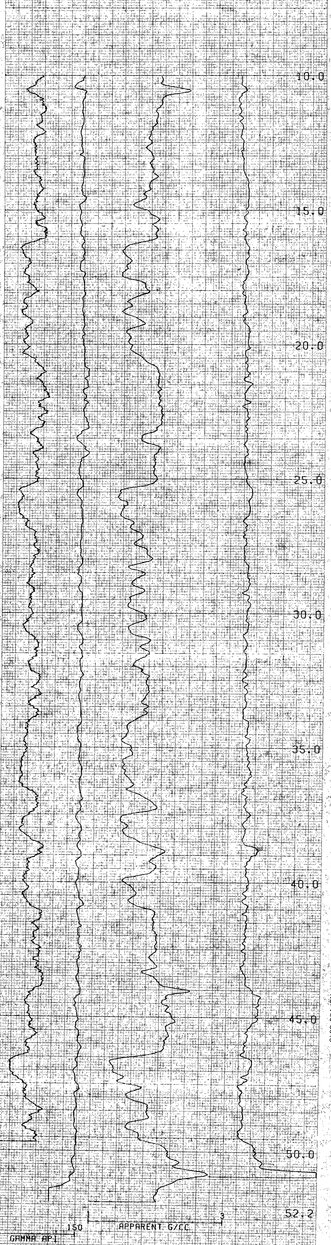
CLIENT: C.S.R.
AREA: R090
LAUNCESTON
STATE: TAS.

HOLE DATA

TOTAL DEPTH - DRILLER	52m	BIT SIZE	12cm
TOTAL DEPTH - LOGGER	52.2m	CASING I.D. PIPE & SIZE	
TRUE VERTICAL DEPTH	52.2M	CASING DEPTH	
LOGGING METHOD	5 MAIN	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	22 @ 20°C
PROBE No.	7032C-701	NORTHING LEVEL	V761
	TAPE 20, TRACK 2	MEASUREMENT	FROM GL

REMARKS:





COMPU-LOG V8.2 PLOT 04-18-82

R090
C.S.R.
LAUNCESTON

HOLE DIAMETER = 12.0
PROBE # 8032C - 68F
SENSOR #4 CAL STD CPS = 3127
SENSOR #4 CAL RUN CPS = 4736
SENSOR #4 CAL BIAS = -1
DATA VALI TRUCK # 8038
DMCD CHENG APPL. #1030 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

RO70 - 18-04-82
9038 CREWS BRISBANE

EQUIPMENT DATA

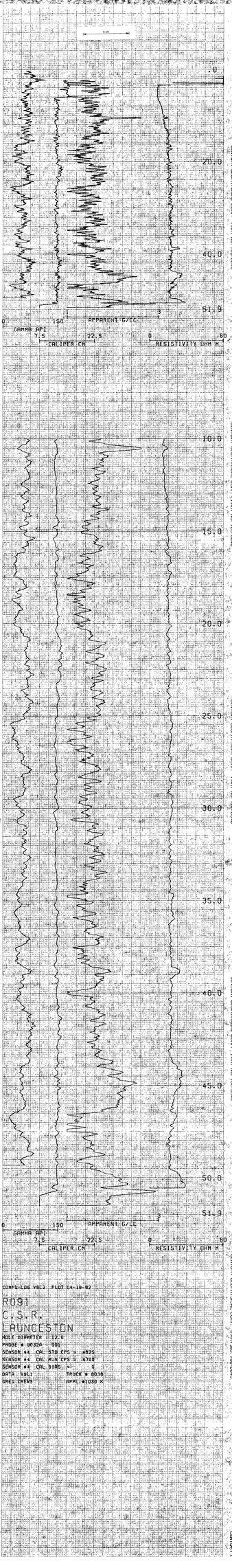
	RUN 1	RUN 2	RUN 3
PROBE SERIAL NO.	9032A-901		
DETECTOR TYPE	SCINT		
DETECTOR SIZE	1.5"x 1.5"dia		
H.V. VOLTAGE	1100		
H.V. RANGE	LOW		
TIME CONSTANT	1.0		
S'PLATE - A/F	.020"		
S'PLATE - LOW	.020"		
TEST RANGE	2000		
SOURCE SIZE	10 mCi		
DETECTOR TYPE	Tc		
DETECTOR SIZE	1.5dia x 3dia		
SOURCE TYPE	Cs137		
SOURCE MA	12.5		
SOURCE SPACING	10cm		
DETECTOR TYPE			
DETECTOR SIZE			
SOURCE TYPE			
SOURCE MA			
SOURCE SPACING			
TRACK TRACKING			
SLIP CONTROL			
SLIP SPACING			
SAMPLE			

COMPANY: C.S.R.
BOREHOLE: RO70
AREA: LAUNCESTON
LOCATION: TAS

HOLE DATA

TOTAL DEPTH – DRILLER	52m	BIT SIZE	12cm
TOTAL DEPTH – LOGGER	51.9m	CASING – TYPE & SIZE	—
TOTAL METERAGE LOGGED	51.9m	CASING DEPTH	—
LOGGING SPEED	7m/MIN. G.L.	SURFACE LEVEL (A.H.D.)	120
REFERENCE LEVEL		FLUID RESISTIVITY	
PROBE NO.	9032A-901	NORTHING LEVEL	V761
	TAPE 30 TRACK 2	WELL DEVIATION	

REMARKS: ?



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CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

COMPANY	C.S.R.
BOREHOLE	R090
AREA	LAUNCESTON
SHIRE	
STATE	TAS.
ELEVATION	

BOREHOLE RECORD: R090 — 18-04-82
FIELD OFFICE: 9038 CREWS — BRISBANE

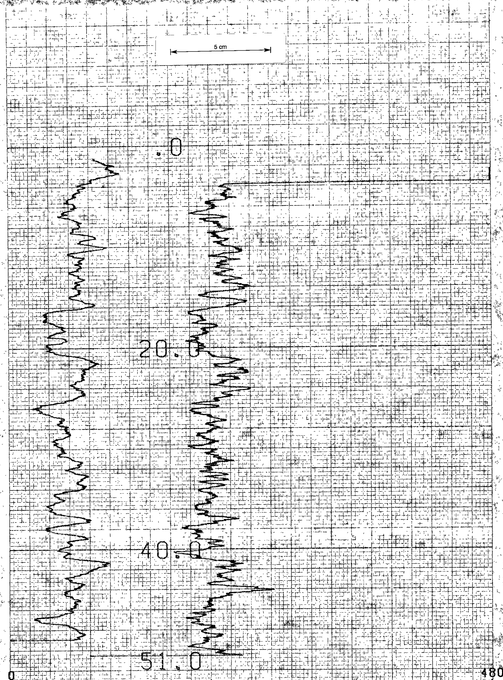
EQUIPMENT DATA

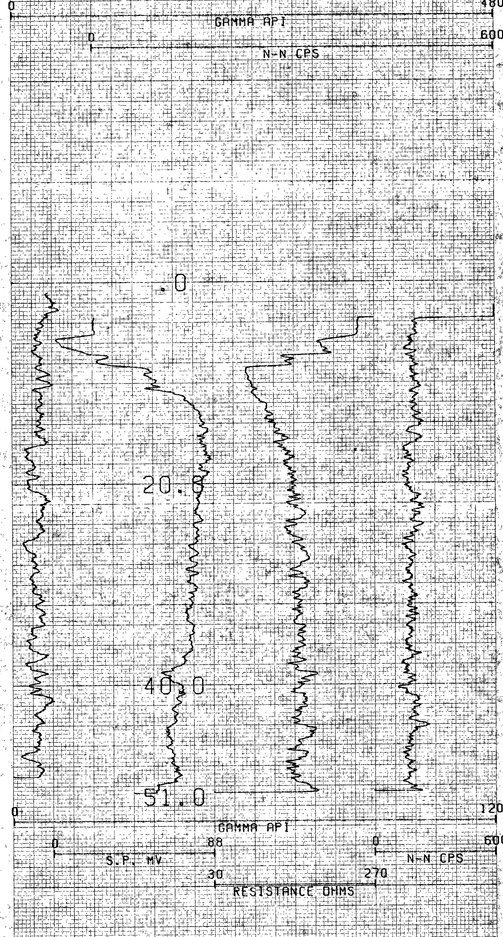
	RUN NUMBER			
	PROBE DIAMETER	50mm	50mm	50mm
NATURAL GAMMA	DETECTOR TYPE	NaI	NaI	
	DETECTOR SIZE	1.5 dia x 3" long	1.5 dia x 3" long	1.5 dia x 3" long
	STD. DEVIATION			1.5 dia x 3"
	STD. RESPONSE			4.7 Sec.
	GAUSS. MOVED USC			
	CHAN. DATE			
	X FACTOR — 10 ^			
	DEADTIME μsec			
	TEST READING			
	RATIO FACTOR			
	CASING FACTOR			
DENSITY	DETECTOR TYPE			
	DETECTOR SIZE	12mm x 16mm	12mm x 26mm	
	SOURCE TYPE	Cs137		
	SOURCE NO.			
	SOURCE STRENGTH			
	SOURCE SPACING			
CALIPER	DETECTOR TYPE			
	DETECTOR SIZE			
	SOURCE TYPE			
	SOURCE NO.			3778
	SOURCE STRENGTH			1.c.
	SOURCE SPACING			45cm
	BAIL FF RESISTANCE	ohms	ohms	ohms
	RESISTIVITY	16" Normal	64" Normal	
	SELF POTENTIAL	mV	mV	mV
	TEMPERATURE	°C	°C	°C
	CALIPER	12 Arm		12 Arm

HOLE DATA

TOTAL DEPTH — DRILLER	52M.	BIT SIZE	12CM
TOTAL DEPTH — LOGGER	51.0M	CASING — TYPE & SIZE	—
TOTAL INTERVAL LOGGED	51.0M.	CASING DEPTH	—
LOGGING SPEED	18M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	∞ Ω °C
PROBE NO.	7050-242	SOFTWARE LEVEL	V9L1
TAPE 30 TRACK 4		SCALE SELECTION	BY OPERATOR / CLIENT

REMARKS:





CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8L2 PLOT 04-18-82

R090

C.S.R.

LAUNCESTON

HOLE DIAMETER : 12.0
PROBE # 8055A - 242
SENSOR #4 CAL STD CPS = 152
SENSOR #4 CAL RUN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA V8L1 TRUCK # 8038
GREG CREWS APPL.#S K

77154

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CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

COMPANY C.S.R.
BOREHOLE R091
AREA LAUNCESTON
STATE TAS.
ELEVATION

HOLE DATA

TOTAL DEPTH — DRILLER	48M	BIT SIZE	12cm
TOTAL DEPTH — LOGGER	47.1M	CASING — TYPE & SIZE	—
TOTAL METERAGE LOGGED	47.1M	CASING DEPTH	—
LOGGING SPEED	9M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	— °C
PROBE NO	9032LI-896	SOFTWARE LEVEL	V9L1 (VERSION AT CLIENT)
TAPE 31 TRACK 1		SCALE SELECTION	

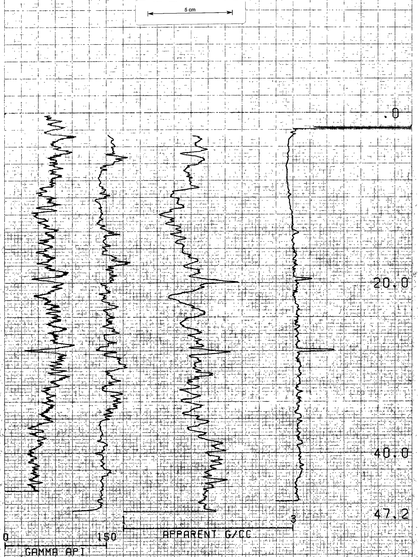
REMARKS

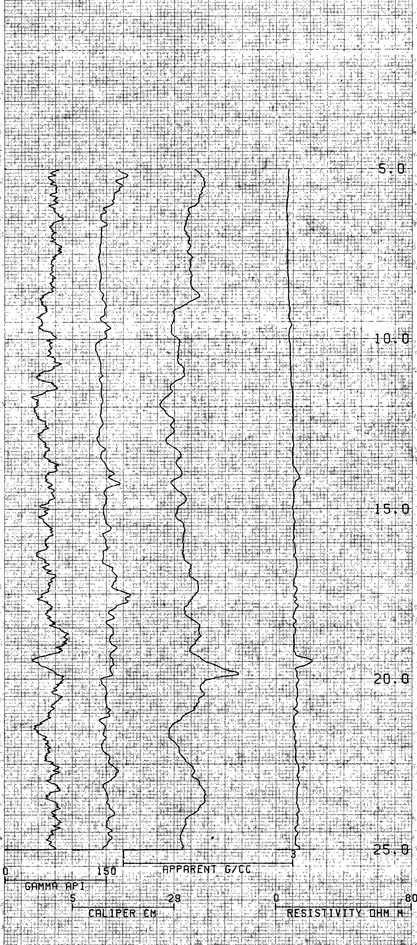
RECORDED R091 19-04-82
AT 8038 CREWS BRISBANE

EQUIPMENT DATA

	SONDE		PROBE No.
PROBE MODEL			
PROBE DIAMETER			
DETECTOR TYPE	NAI	NAI	
DETECTOR SIZE	2" dia x 1" deep	2" dia x 1" deep	
GTA FACTOR		100 x 10^-6	
GTA SHIELDING		1/2" Pb	
CALIB. MODEL USE			
TAPE SHIFT			
K FACTOR / R.F.			
K SECTION µ rad/hr			
TEST READING			
TRANSIT FACTOR			
LOGGING FACTOR			
DETECTOR TYPE			
DETECTOR SIZE			
SOURCE TYPE			
SOURCE No.			
SOURCE STRENGTH			
SOURCE SPACING			
DETECTOR TYPE	He3	NaI	
DETECTOR SIZE	1" dia x 3" long	1" dia x 3" long	
SOURCE TYPE			
SOURCE No.			
SOURCE AGE			
LOCKED STRENGTH			
SOURCE SPACING			
MAG. PT. RESISTANCE			
RESISTIVITY	16in NORMAL	64in NORMAL	
SELF POTENTIAL			
TEMPERATURE			
DEVIATION			
CALIPER			

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040





COMPU-LOG V8L2: PLOT 04-13-82

R091
C.S.R.
LAUNCESTON

HOLE DIAMETER : 12.0
PROBE # 9032LI-896
SENSOR #1 CAL STD CPS = 4393
SENSOR #1 CAL RUN CPS = 4785
SENSOR #1 CAL BIAS = 0
DATA V8L1 TRUCK # 8038
GREG CREWS APPL.#1030-K

CENTURY GEOPHYSICAL CORP. P

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771583

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

COMPANY: C.S.R.
BOREHOLE: R091
AREA: LAUNCESTON
STATE: TAS
RUN: 1
DATE: 17-04-82
FIELD OFFICE: 8038 CREWS BRISBANE

HOLE DATA

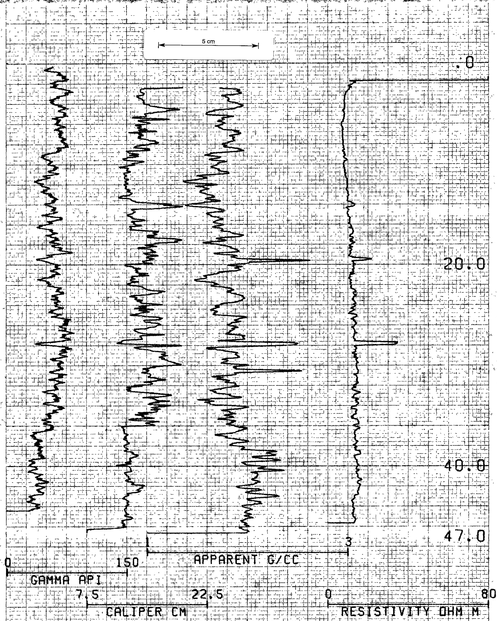
TOTAL DEPTH — DRILLER	48M	BIT SIZE	12CM
TOTAL DEPTH — LOGGER	47.0M	CASING — TYPE & SIZE	
TOTAL METERAGE LOGGED	47.0M	CASING DEPTH	
LOGGING SPEED	9M/MIN *	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	°C
PROBE NO.	9032C-901	SOFTWARE LEVEL	V9L1
TAPE NO. TRACK 2		SCALE SELECTION	OPERATOR'S CHOICE

REMARKS: * 5 M/MIN THROUGH DIGNEOUS ZONE

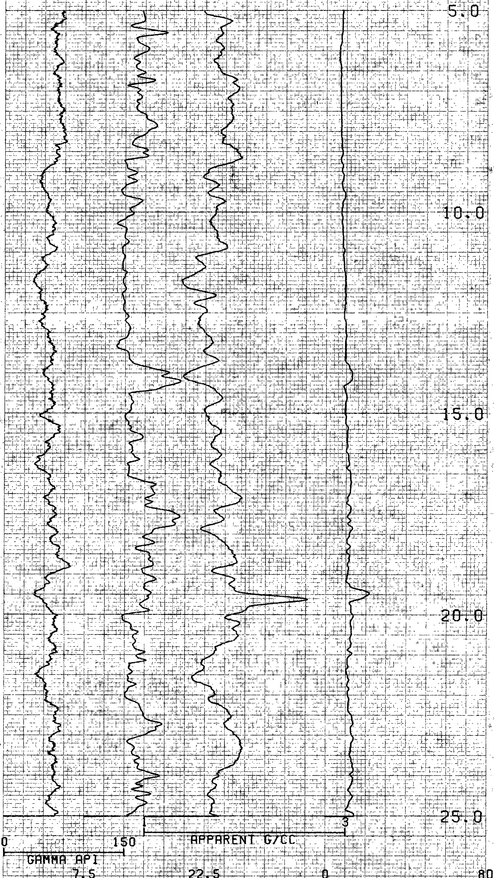
EQUIPMENT DATA

	RUN 1	RUN 2	RUN 3
PROBE MODEL	9032C		
PROBE DIAMETER	90mm		mm
GAMMA			
DETECTOR TYPE			
DETECTOR SIZE			
STAB. FUNCTION			
CALIB. MODEL NO.			
CALIB. DATE			
FUNCTION			
SHIELDING			
TOOL SEQUENCE			
WATER FACTOR			
CASING FACTOR			
NEUTRON			
DETECTOR TYPE			
DETECTOR SIZE			
SOURCE TYPE	483		
SOURCE NO.	483		
SOURCE STRENGTH	175mC		
SOURCE SPACING	50cm		
RESISTIVITY			
DETECTOR SPACING			
DETECTOR SIZE			
SOURCE TYPE			
SOURCE NO.			
SOURCE STRENGTH			
SOURCE SPACING			
CALIPER			
CALIPER NO.			
CALIPER SPRING			
ONLY TO RECORDED			
DENSITY			
SELF POTENTIAL			
TEMPERATURE			
DEVIATION			
CURVES			

PART NO. 786-0040 CENTURY GEOPHYSICAL CORP.



PART NO. 786-0040 CENTURY GEOPHYSICAL CORP.



PART NO. 786-0040 CENTURY GEOPHYSICAL CORP.

COMPU-LOG VAL 2 PLOT 04-18-82

R091

C.S.R.

LAUNCESTON

HOLE DIAMETER : 12.0
PROBE # 8032C- 901
SENSOR #4 CAL STD CPS = 7127
SENSOR #4 CAL RUN CPS = 4738
SENSOR #4 CAL BIAS = -1
DATA V9L1 TRUCK # 8038
GREG CREWS APPL.#1090 K

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71584

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

COMPANY: C.S.R.
WELL/SERVICE: RO91
AREA: LAUNCESTON
STATE: TAS.
ELEVATION:

RUN NO. 1 | DATE 17-04-82
RECORDED BY: 2038 CREWS BRISBANE

HOLE DATA

TOTAL DEPTH — DRILLER	48M	BIT SIZE	12CM
TOTAL DEPTH — LOGGER	47.0M	CASING — TYPE & SIZE	—
TOTAL METERAGE LOGGED	47.0M	CASING DEPTH	—
LOGGING SPEED	7M/MIN.	BOREHOLE FLUID	H2O °C
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	—
PROBE NO.	9032A-701	SOFTWARE LEVEL	V8L1
	TAPE 31 TRACK 3	SCALE SELECTION	DIRECTION OF CENTRE

REMARKS

EQUIPMENT DATA

	TOOL STRING	SENSOR	SONDE	SPACER
TOOL DIAMETER	12cm	10cm	9cm	—
DETECTOR TYPE	BD	NaI	NaI	—
DETECTOR SIZE	2.5cm x 10cm	7.5cm x 7.5cm	7.5cm x 7.5cm	—
SITE FUNCTION	—	—	137 Cs	—
SITE SENSITIVITY	—	—	1 μgm/hr	—
CABLE MODEL/LENGTH	—	—	—	—
CABLE TYPE	—	—	—	—
FUNCTION — "A"	gamma	—	—	—
FUNCTION — "B"	Caliper	—	—	—
SIZE READING	— cm	—	—	—
WATER FACTOR	— cps/cps	—	—	—
CHANGE FACTOR	—	—	—	—
DETECTOR TYPE	NaI	—	—	—
DETECTOR SIZE	2.5cm x 10cm	—	—	—
GRADE TYPE	—	—	—	—
CHANGE NO.	—	—	—	—
GRADE STRENGTH	137Cs	—	—	—
SOURCE SPACING	—	—	—	—
DETECTOR TYPE	—	—	—	—
DETECTOR SIZE	—	—	—	—
GRADE TYPE	—	—	—	—
CHANGE NO.	—	—	—	—
GRADE STRENGTH	—	—	—	—
SOURCE SPACING	—	—	—	—
BOIL PT./RESISTANCE	— °C	— ohms	—	—
RESISTIVITY	10Ω·m (Nom)	0.5Ω·m (approx)	—	—
GAU SENSITIVITY	—	—	—	—
TEMPERATURE	—	—	—	—
CALIBRATION	—	—	—	—
CALIPER	—	—	—	—

5 cm

.0
20.0
40.0
47.0

6 2.6
0 150 APPARENT G/CC
GAMMA API
7.5 22.5 CALIPER CM
0 80 RESISTIVITY OHM M

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

5.0
10.0
15.0
20.0
25.0

6 2.6
0 150 APPARENT G/CC
GAMMA API
7.5 22.5 CALIPER CM
0 80 RESISTIVITY OHM M

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8L2 PLOT 04-18-82

RO91
C.S.R.
LAUNCESTON
HOLE DIAMETER = 12.0
PROBE # 9032A 801
SENSOR #4 CAL STD CPS = 4825
SENSOR #4 CAL RUN CPS = 4600
SENSOR #4 CAL BIAS = 0
DATA V8L1 TRUCK # 8038
CREWS APPL.#1090 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

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271555

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

COMPANY: C.S.R.
BOREHOLE: R091
AREA: LAUNCESTON
STATE: TAS.
ELEVATION:

HOLE DATA

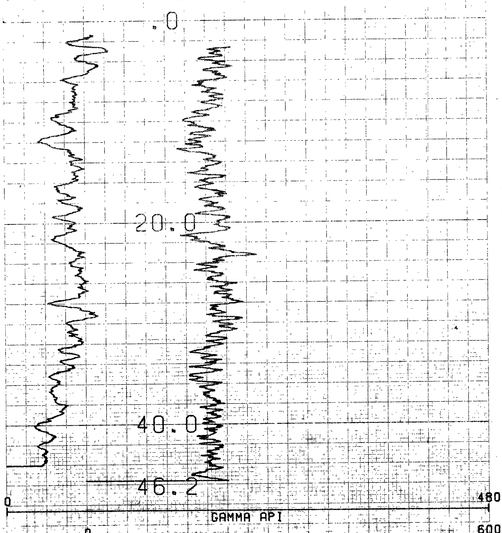
TOTAL DEPTH — DRILLER	48M	BIT SIZE	12CM
TOTAL DEPTH — LOGGER	46.2M	CASING — TYPE & SIZE	—
TOTAL METRAGE LOGGED	46.2M	CASING DEPTH	—
LOGGING SPEED	18M/MIN	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	—
PROBE NO	9050-242	SOFTWARE LEVEL	V8L1
TAPE 31 TRACK 4		SCALE SELECTION	BY OPERATOR / CLIENT

REMARKS:

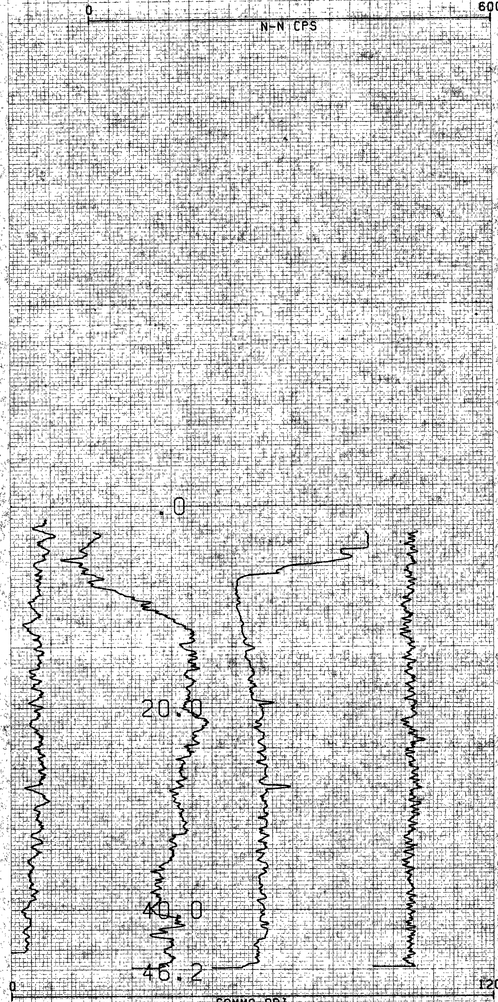
BOREHOLE: R091
DATE: 19-04-82
LOCATION: 3038 GREWS BRISBANE
FIELD OFFICE:

EQUIPMENT DATA

PROBE MODEL	9055A	9055	9050
PROBE DIAMETER	38mm	55mm	68mm
MATERIAL CONSTANTS — DETECTOR TYPE	NaI	NaI	NaI
DETECTOR SIZE	1.5mm x 1.5mm	2.5mm x 2.5mm	50mm x 100mm
GTA-4 FACTOR	—	—	1.96 x 10⁻⁴
COIL SPACING	—	—	1.19 µm
CASE MODEL (GC)	—	—	—
CASE SIZE	—	—	—
SENSOR — VOLT	—	—	—
SENSITIVITY 1 µ.R/H	—	—	—
TEST READING	—	—	—
WATER FACTOR	—	—	—
LOADING FACTOR	—	—	—
DENSITY — DETECTOR TYPE	—	—	—
DETECTOR SIZE	25mm x 50mm	50mm x 100mm	50mm x 100mm
SOURCE TYPE	Am 241	Am 241	Cs 137
SOURCE NO.	—	—	3778
SOURCE STRENGTH	—	—	5C
SOURCE SPACING	—	—	45CM
SMALL HT RESISTANCE	—	—	—
RESISTIVITY	16cm Spacing	2.5m Focused	—
SELF POTENTIAL	—	—	—
TEMPERATURE	—	—	—
DEVIATION	—	—	—
CALIPER	—	—	—



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8L2 PLOT 04-18-82

R091
C.S.R.
LAUNCESTON

HOLE DIAMETER: 12.0
PROBE # 9055A - 242
SENSOR #4 CAL STD CPS = 152
SENSOR #4 CAL RUN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA V8L1 TRUCK # 6038
GREG CREWS APPL.#5 K

5 cm

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

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CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

COMPANY C.S.R.
BOREHOLE R092
AREA LAUNCESTON
SHIRE
ELEVATION
STATE TAS

BOREHOLE R092 DATE 20-04-82
UNIT/OPERATOR 8038 CREWS FIELD OFFICE BRISBANE

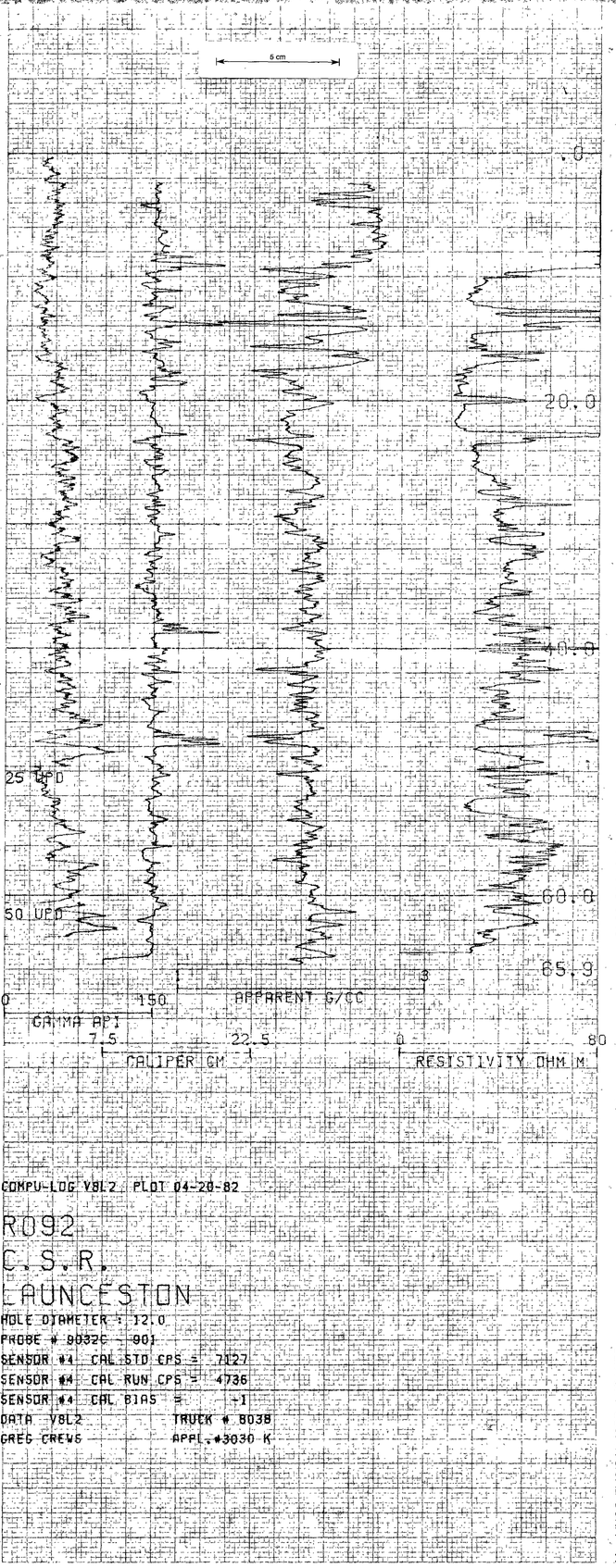
HOLE DATA

TOTAL DEPTH — DRILLER	66M	BIT SIZE	12CM
TOTAL DEPTH — LOGGER	65.9M	CASING — TYPE & SIZE	—
TOTAL METERAGE LOGGED	65.9M	CASING DEPTH	—
LOGGING SPEED	7M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	— @ °C
PROBE NO.	9032C-901	SOFTWARE LEVEL	V9L1
TAPE 33 TRACK 1		SCALE SELECTION	X OPERATOR / CLIENT

REMARKS

EQUIPMENT DATA

PROBE MODEL	9032	9032	9092	
PROBE DIAMETER	70mm	70mm	46mm	
NATURAL GAMMA — DETECTOR TYPE	NaI	NaI	NaI	
NATURAL GAMMA — DETECTOR SIZE	25dia x 51mm	25dia x 51mm	25dia x 102mm	
NATURAL GAMMA — STD. K FACTOR	—	—	518 x 10⁻⁶	
NATURAL GAMMA — STD. DEADTIME	—	—	1.19 μsec	
NATURAL GAMMA — CALIB. MODEL LOC.	—	—	—	
NATURAL GAMMA — CALIB. DATE	—	—	—	
NATURAL GAMMA — K FACTOR x 10⁻⁶	—	—	—	
NATURAL GAMMA — DEADTIME μsec	—	—	—	
NATURAL GAMMA — TEST READING	—	—	—	
NATURAL GAMMA — WATTS FACTOR	—	—	—	
NATURAL GAMMA — CASING FACTOR	—	—	—	
DENSITY — DETECTOR TYPE	NaI	NaI	NaI	
DENSITY — DETECTOR SIZE	12mm x 76mm	12mm x 76mm	12mm x 76mm	
DENSITY — SOURCE TYPE	—	—	Cs137	
DENSITY — SOURCE NO.	—	—	483	
DENSITY — SOURCE STRENGTH	—	—	125mC	
DENSITY — SOURCE SPACING	—	—	20cm	
NEUTRON — DETECTOR TYPE	—	—	—	
NEUTRON — DETECTOR SIZE	—	—	—	
NEUTRON — SOURCE TYPE	—	—	—	
NEUTRON — SOURCE NO.	—	—	—	
NEUTRON — SOURCE STRENGTH	—	—	—	
NEUTRON — SOURCE SPACING	—	—	—	
SHOL RESISTANCE	—	—	—	
RESISTIVITY	Focused	2.5m / 0.5m	—	
SELF-POTENTIAL	—	—	—	
TEMPERATURE	—	—	—	
DEVIATION	—	—	—	
CALIPER	—	—	—	



COMPU-LOG V8L2 PLOT 04-20-82

R092

C.S.R.

LAUNCESTON

HOLE DIAMETER : 12.0
PROBE # 9032C -901
SENSOR #4 CAL STD CPS = 7127
SENSOR #4 CAL RUN CPS = 4736
SENSOR #4 CAL BIAS = -1
DATA V8L2 TRUCK # 8038
CREW CREWS APPL. #3030 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
CENTURY GEOPHYSICAL CORP. P.

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CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

BOREHOLE: R092 | DATE: 20-04-82
UNIT/OPERATOR: 8038 CREWS | FIELD OFFICE: BRISBANE

COMPANY: C.S.R.
BOREHOLE: R092
AREA: LAUNCESTON
SHIRE:
ELEVATION:
STATE: TAS.

HOLE DATA

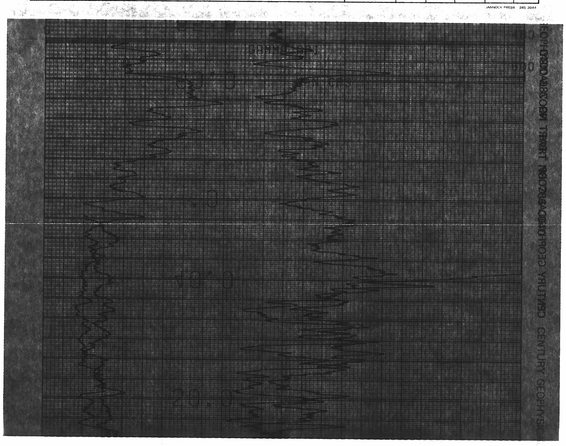
TOTAL DEPTH — DRILLER	66M	BIT SIZE	12cm
TOTAL DEPTH — LOGGER	65.8M	CASING — TYPE & SIZE	—
TOTAL METERAGE LOGGED	65.8M	CASING DEPTH	—
LOGGING SPEED	18M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	— @ °C
PROBE NO.	9050-242	SOFTWARE LEVEL	V9L1
TAPE 33 TRACK 2		SCALE SELECTION	AC OPERATOR / CLIENT

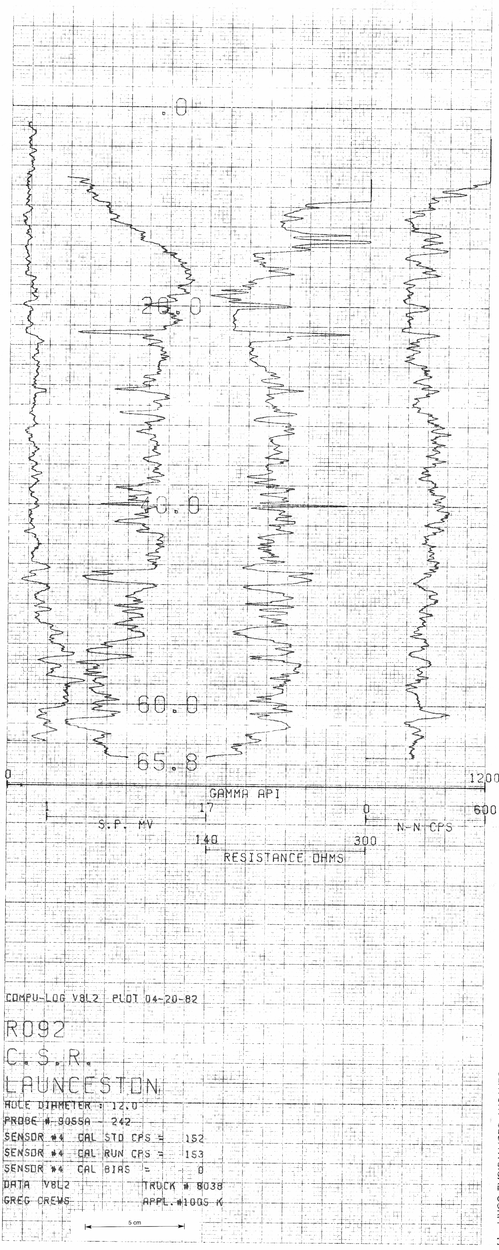
REMARKS:

EQUIPMENT DATA

PROBE MODEL	9050	9022	9059(S)	
PROBE DIAMETER	50mm	50mm	45mm	
NATURAL GAMMA — DETECTOR TYPE	Nal	Nal	Nal	
NATURAL GAMMA — DETECTOR SIZE	51mm x 114mm	51mm x 114mm	32mm x 100mm	
NATURAL GAMMA — STD. K FACTOR	———	———	12½ API	
NATURAL GAMMA — STD. SHUNTING	———	———	1.5μA**	
NATURAL GAMMA — CALIB. MODEL LOC.	———	———	———	
NATURAL GAMMA — CALIB. DATE	———	———	———	
NATURAL GAMMA — K FACTOR x 10^{-3}	———	———	———	
NATURAL GAMMA — DEADTIME μSEC	———	———	———	
NATURAL GAMMA — TEST READING	———	———	———	
NATURAL GAMMA — WATER FACTOR	———	———	———	
NATURAL GAMMA — CASING FACTOR	———	———	———	
DENSITY — DETECTOR TYPE	N/A	Nal	———	
DENSITY — DETECTOR SIZE	51mm x 25mm	51mm x 25mm	———	
DENSITY — SOURCE TYPE	Cs	Cs	———	
DENSITY — SOURCE NO.	———	———	———	
DENSITY — SOURCE STRENGTH	———	———	———	
DENSITY — SOURCE SPACING	———	———	———	
CALIPER — DETECTOR TYPE	———	———	½	———
CALIPER — DETECTOR SIZE	———	———	12mm x 100mm	———
CALIPER — SOURCE TYPE	———	———	N/A	———
CALIPER — SOURCE NO.	———	———	3278	———
CALIPER — SOURCE STRENGTH	———	———	15C	———
CALIPER — SOURCE SPACING	———	———	45cm	———
ENGL. FT. RESISTANCE	———	———	36mm x 82mm	
RESISTIVITY	Non focused	2 Arm focused	———	
SELF POTENTIAL	———	———	N/A	
TEMPERATURE	———	———	N/A	
DEVIATION	———	———	N/A	
CALIPER	YES	YES	———	

ANNECY FRANCE 385 2683





CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

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CENTURY GEOPHYSICAL CORP. P

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CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

COMPANY: C.S.R.

BOREHOLE: R094

AREA: LAUNCESTON

ELEVATION:

SHIRE:

STATE: TAS.

BOREHOLE: R094

DATE: 21-04-82

UNIT/OPERATOR: 8038 CREWS

FIELD OFFICE: BRISBANE

HOLE DATA

TOTAL DEPTH — DRILLER	24M	BIT SIZE	12cM
TOTAL DEPTH — LOGGER	23.7M	CASING — TYPE & SIZE	—
TOTAL METERAGE LOGGED	23.7M	CASING DEPTH	—
LOGGING SPEED	9M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	— @ °C
PROBE NO	9032C-901	SOFTWARE LEVEL	V9L1
TAPE 33 TRACK 3		SCALE SELECTION	☒ OPERATOR ☐ CLIENT

REMARKS:

EQUIPMENT DATA

PROBE MODEL	9030	9032	9050/55		
PROBE DIAMETER	50mm	50mm	48mm		
NATURAL GAMMA					
DETECTOR TYPE	NaI	NaI	NaI		
DETECTOR SIZE	31mm x 114mm	31mm x 114mm	22mm x 100mm		
STD K FACTOR	—	—	558 x 10⁻⁶		
STD DEADTIME	—	—	1.8 μ sec		
CALIB. MODEL LOC.	—	—			
CALIB DATE	—	—			
K FACTOR x 10⁻⁶	—	—			
DEADTIME μ sec	—	—			
TEST READING	—	—			
WATER FACTOR	—	—			
CASING FACTOR	—	—			
DENSITY					
DETECTOR TYPE	NaI	NaI	—		
DETECTOR SIZE	12mm x 38mm	12mm x 38mm	—		
SOURCE TYPE	Cs	Cs	—		
SOURCE NO.		483	—		
SOURCE STRENGTH		125mCi	—		
SOURCE SPACING		20CM	—		
NEUTRON					
DETECTOR TYPE	—	—	He³		
DETECTOR SIZE	—	—	25mm x 150mm		
SOURCE TYPE	—	—	AmBe		
SOURCE NO.	—	—			
SOURCE STRENGTH	—	—			
SOURCE SPACING	—	—			
SNGL. PT. RESISTANCE	—	—	38mm x 63mm		
RESISTIVITY	16cm Focused	2.5cm Focused	—		
SELF POTENTIAL	—	—	YES		
TEMPERATURE	—	—	YES		
DEVIATION	—	—	NO / YES		
CALIPER	YES	YES	—		

JANROCK PRESS 263 2044

5 cm

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

0 150 GAMMA API

APPARENT ℓ/CC 3

0 20 CALIPER CM

0 80 RESISTIVITY OHM M

COMPU-LOG V8L2 PLOT 04-21-82

R094

C.S.R.

LAUNCESTON

HOLE DIAMETER : 12.0

PROBE # 9032C - 901

SENSOR #4 CAL STD CPS = 7127

SENSOR #4 CAL RUN CPS = 4736

SENSOR #4 CAL BIAS = -1

DATA V8L2 TRUCK # 8038

GREG CREWS APPL. #3030 K

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0-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

COMPANY: C.S.R.
BOREHOLE: R094
AREA: LAUNCESTON
SHIRE:
ELEVATION:
STATE: TAS.

BOREHOLE: R094
DATE: 21-04-82
UNIT/OPERATOR: 8038 CREWS
FIELD OFFICE: BRISBANE

HOLE DATA

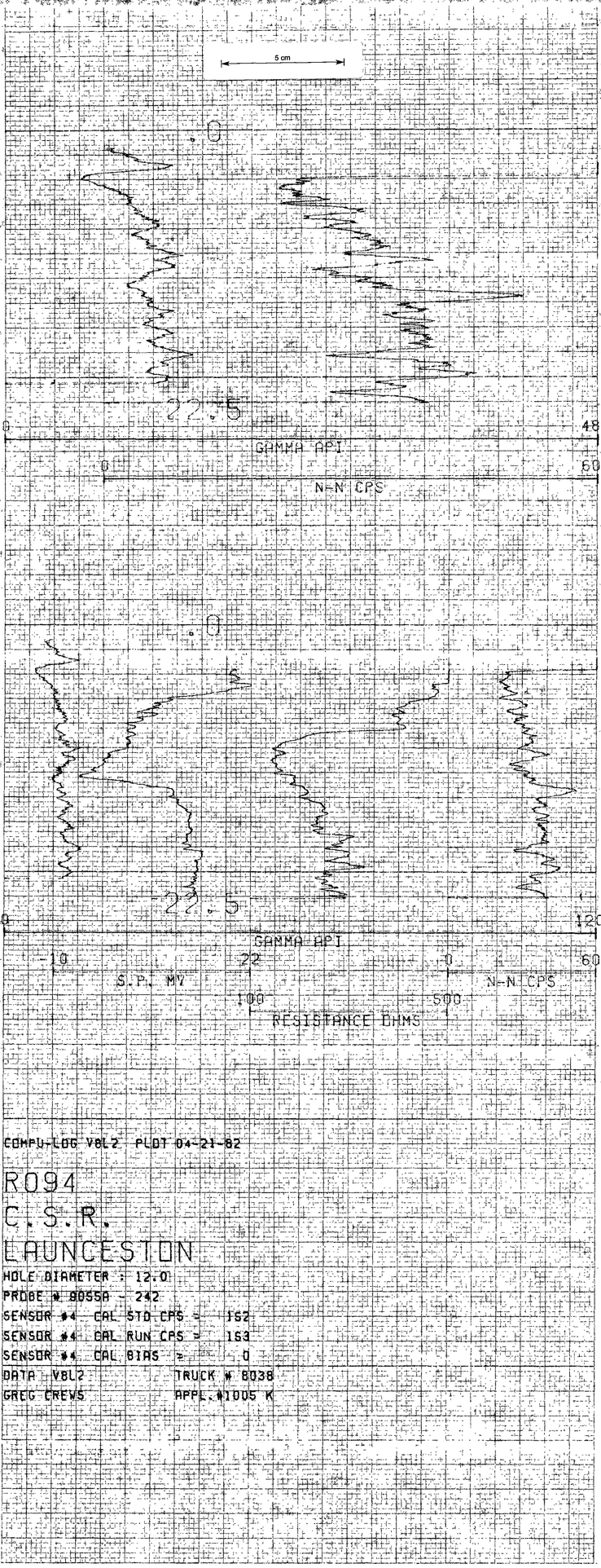
TOTAL DEPTH — DRILLER	24M	BIT SIZE	12CM
TOTAL DEPTH — LOGGER	22.5M	CASING — TYPE & SIZE	—
TOTAL METERAGE LOGGED	22.5M	CASING DEPTH	—
LOGGING SPEED	18M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	— Ω
PROBE NO.	9050-242	SOFTWARE LEVEL	V9L1
TAPE 33 TRACK 4		SCALE SELECTION	☒ OPERATOR ☐ CLIENT

REMARKS:

EQUIPMENT DATA

PROBE MODEL	9055	9051	9050/55
PROBE DIAMETER	50mm	50mm	40mm
NATURAL GAMMA — DETECTOR TYPE	NaI	NaI	NaI
NATURAL GAMMA — DETECTOR SIZE	37mm x 37mm	37mm x 114mm	32mm x 102mm
NATURAL GAMMA — STD/K FACTOR	—	—	1000 x 10⁻³
NATURAL GAMMA — STD DEADTIME	—	—	18 μsec
NATURAL GAMMA — CALIB. MODEL LOC	—	—	—
NATURAL GAMMA — CALIB DATE	—	—	—
NATURAL GAMMA — K FACTOR x 10⁻³	—	—	—
NATURAL GAMMA — DEADTIME μsec	—	—	—
NATURAL GAMMA — TEST READING	—	—	—
NATURAL GAMMA — WATER FACTOR	—	—	—
NATURAL GAMMA — CASING FACTOR	—	—	—
DENSITY — DETECTOR TYPE	—	—	—
DENSITY — DETECTOR SIZE	13mm x 38mm	13mm x 89mm	—
DENSITY — SOURCE TYPE	—	—	—
DENSITY — SOURCE NO	—	—	—
DENSITY — SOURCE STRENGTH	—	—	—
DENSITY — SOURCE SPACING	—	—	—
NEUTRON — DETECTOR TYPE	—	—	—
NEUTRON — DETECTOR SIZE	—	—	75mm x 102mm
NEUTRON — SOURCE TYPE	—	—	—
NEUTRON — SOURCE NO	—	—	3378
NEUTRON — SOURCE STRENGTH	—	—	1Ci
NEUTRON — SOURCE SPACING	—	—	45cm
ENVIL. RESISTANCE	—	—	—
RESISTIVITY	16" Normal	64" Normal	—
SELF POTENTIAL	—	—	—
TEMPERATURE	—	—	—
DEVIATION	—	—	—
CALIPER	—	—	—

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CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8L2 PLOT 04-21-82

R094
C.S.R.
LAUNCESTON

HOLE DIAMETER : 12.0
PROBE # 9055A - 242
SENSOR #4 CAL STD CPS = 152
SENSOR #4 CAL RUN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA V8L2 TRUCK # 8038
GREG CREWS APPL.#1005 K

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R095 22-09-82
ROSE CREW: BRISBANE

EQUIPMENT DATA

C.S.R.
R095
LAUNCESTON
TAS.

HOLE DATA

TOTAL DEPTH - DRILLER: 70m
TOTAL DEPTH - LOGGER: 70.0m
CASING DEPTH - DRILLER: 7.0m
CASING DEPTH - LOGGER: 7.0m
CASING SIZE: 114mm
CASING TYPE: STEEL
DRILLING MUD: WATER
DRILLING MUD: H2O
REFERENCE LEVEL: R.L.
FLUID LEVEL: R.L.-1.7m
MAGNETIC DECLINATION: 9°E
MAGNETIC DECLINATION: 9°E
TAPE 29 TRACK 1
TRAVERSE: CCW

RECORDED

CENTURY GEOPHYSICAL CORP. PART NO. 786-0940

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C.S.R.
RO95
LAUNCESTON
TAS.

ROPE: 22-04-93
HOSE REELS: BRISBANE

EQUIPMENT DATA

TOOL STRING			
TOOL DIAMETER	mm	89	89
TOOL LENGTH	m	3.5	3.5
TOOL WEIGHT	kg	45	45
CABLE TYPE		7/32	7/32
CABLE DIAMETER	mm	5.6	5.6
CABLE WEIGHT	kg/m	0.12	0.12
CABLE STRENGTH	kg	1500	1500
CABLE LENGTH	m	1000	1000
CABLE HEAD			
CABLE HEAD WEIGHT	kg		
CABLE HEAD LENGTH	m		
CABLE HEAD DIAMETER	mm		
CABLE HEAD STRENGTH	kg		
CABLE HEAD TYPE			
CABLE HEAD CONNECTION			
CABLE HEAD SEAL			
CABLE HEAD SEAL TYPE			
CABLE HEAD SEAL DIAMETER	mm		
CABLE HEAD SEAL LENGTH	m		
CABLE HEAD SEAL WEIGHT	kg		
CABLE HEAD SEAL STRENGTH	kg		
CABLE HEAD SEAL TYPE			
CABLE HEAD SEAL CONNECTION			
CABLE HEAD SEAL SEAL			
CABLE HEAD SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL DIAMETER	mm		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL LENGTH	m		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL WEIGHT	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL STRENGTH	kg		
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL CONNECTION			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL			
CABLE HEAD SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL SEAL TYPE			
CABLE HEAD SEAL

Q-1716.
Vol 6 of 6.
121

2716.1

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C020 12-04-82
8038 CREWS/BRISBANE

EQUIPMENT DATA

C.S.R.
C020
LAUNCESTON
TAS.

HOLEDATA

TOTAL DEPTH DRILLER	35.7m	CASING	15cm
DEPTH LOGGER	35.7m	CASING DEPTH	1.2m
BOTTOM LOGGED INTERVAL	35.7m	MUD TYPE	H2O
TOP LOGGED INTERVAL	0.5	MUD DENSITY	KNOWN
TYPE FLUID IN HOLE	SALT	MUD VISCOSITY	NIL
MAX REC TEMP	23.3C/74F	MAX REC TEMP	V7L1

TAPE 22 TRACK 1

REMARKS

5 cm

.0
20.0
35.7

0 150 APPARENT G/CC
GAMMA API
5 29 CALIPER CM
0 80 RESISTIVITY OHM M

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

.0
5.0
10.0
15.0
20.0
25.0
30.0
35.7

0 150 APPARENT G/CC
GAMMA API
5 29 CALIPER CM
0 80 RESISTIVITY OHM M

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8L2 PLOT 04-12-82

C020
C.S.R.
LAUNCESTON
HOLE DIAMETER : 15.0
PROBE # 8032L1- 806
SENSOR #4 CAL STD CPS = 4393
SENSOR #4 CAL RUN CPS = 4785
SENSOR #4 CAL BIAS = 0
DATA V8L1 TRUCK # 8038
GREG CREWS APPL.#1080-K

CENTURY GEOPHYSICAL CORP. PART NO. 786

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

R095 22-04-82
2038 CREWS BRISBANE

COMPANY C.S.I.R.
WELL R095
FIELD LAUNCESTON
COUNTY
STATE TAS.

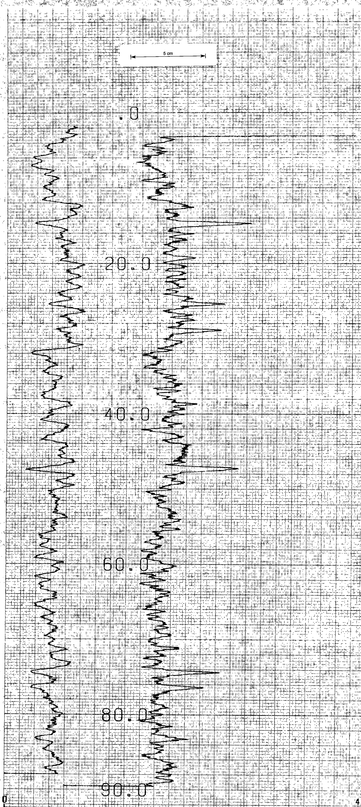
EQUIPMENT DATA

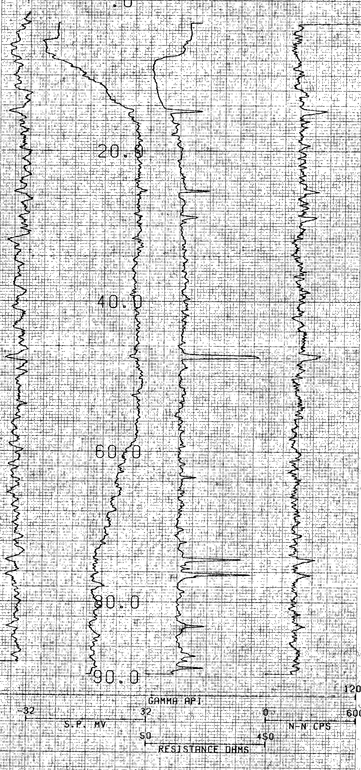
RUN NUMBER	1	2	3
RECORDED BY	CREWS	CREWS	
WITNESSED BY			
DRILLER'S DEPTH	90m		
LOGGER'S DEPTH	90.2m		
BTM. LOG INTERVAL	90.2m		
TOP LOG INTERVAL	12m		
CASING - DRILLER	12m		
CASING - LOGGER	12m		
CASING SIZE	6"		
BIT SIZE	5 7/8"		
TYPE FLUID IN HOLE	H2O		
DENSITY / VISCOSITY			
PH / FLUID LOSS			
SOURCE OF SAMPLE			
RM @ MEAS. TEMP.			
RMF @ MEAS. TEMP.			
RMC @ MEAS. TEMP.			
SOURCE OF RMF / RMC			
RM @ BHT			
TIME SINCE CIRC.			
MAX. REC. TEMP.			
EQUIP. LOCATION			
RECORDED BY			
WITNESSED BY			
GAMMA RAY	3278		
NEUTRON	9.5cps		
DENSITY			
CALIPER			
SONIC			
RESISTIVITY			
SP			
OTHER SERVICES			
REMARKS			

HOLE DATA

TOTAL DEPTH - DRILLER	90m	BIT SIZE	5 7/8"
TOTAL DEPTH - LOGGER	90.2m	CASING - DRILLER	12m
BTM. LOG INTERVAL	90.2m	CASING - LOGGER	12m
TOP LOG INTERVAL	12m	CASING DEPTH	12m
LOGGING SPEED	18m/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	
PROBE NO.	7050-232	SOFTWARE LEVEL	V8L1
TAPE 34 TAPE 4		RECORDED BY	CREWS

REMARKS





COMPU-LOG V8L2 PLOT 06-22-82

R095
C.S.I.R.
LAUNCESTON
HOLE DIAMETER = 12.0
PROBE # 8038H - 242
SENSOR ## CAL STD CPS = 182
SENSOR ## CAL RUN CPS = 183
SENSOR ## CAL BIAS = 0
DATA V8L2 TRUCK # 8038
GREG CREWS APPL.#1008-K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
CENTURY GEOPHYSICAL CORP. PART NO. 786

CCC CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C020 12-04-82
8038 CREWS BRISBANE

EQUIPMENT DATA

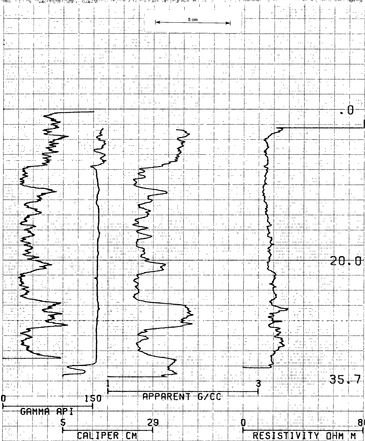
C.S.R.
C020
LAUNCESTON
TAS

HOLE DATA

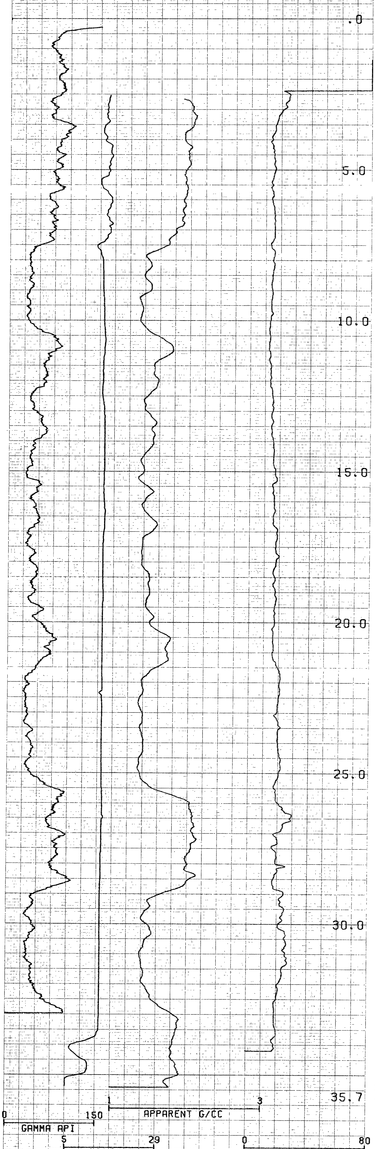
TOTAL DEPTH DRILLER	36M	CASING	15CM
TOTAL DEPTH LOGGER	35.7M	CASING DEPTH	
LOGGING SPEED	5M/MIN	BOREHOLE FLUID	H2O
RECORDED LIVE	CAL	FLUID LEVEL	7M
RECORDED	8032CI-SN	MAX TEMP & TIME	V&I

TAPE 23 TRACK 1

REMARKS



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8L2 PLOT 04-12-82

C020
C.S.R.
LAUNCESTON
HOLE DIAMETER : 15.0
PROBE # 8032L1- 806
SENSOR #4 CAL STD CPS = 4393
SENSOR #4 CAL RUN CPS = 4785
SENSOR #4 CAL BIAS = 0
DATA V8L1 TRUCK # 8038
SREG CREWS APPL.=1080 M

CENTURY GEOPHYSICAL CORP. PART NO. 786

82-1744
VOL 6
12

2716.04

72-1786
GL 6006
122

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

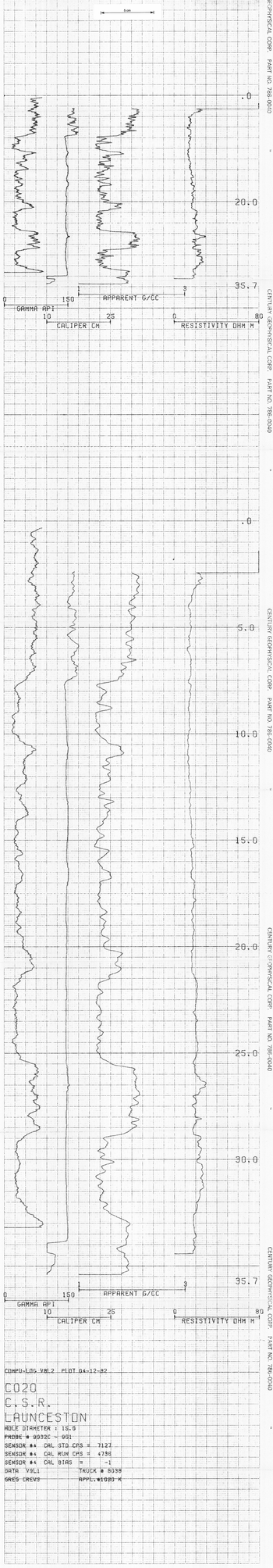
C020 12-04-82
3038 CREWS BRISBANE
EQUIPMENT DATA

C.S.R.
C020
LAUNCESTON
TAS.

HOLE DATA

TOTAL DEPTH - DRILLER	36M	BIT SIZE	152M
TOTAL DEPTH - LOGGER	35.7M	CASING SIZE & WEIGHT	
DEPTH OF CASING - DRILLER	35.7M	CASING DEPTH	
DEPTH OF CASING - LOGGER	35.7M	BOREHOLE FLUID	H20
BOREHOLE LEVEL	GL	FLUID RESISTIVITY	
PROBE NO.	9032C-781	CERTIFICATE DATE	V7L1
TAPE NO.	TAPE 23 TRACK 2	CALIBRATION BY	

REMARKS



COMPU-LOG V8L2 PLOT 04-12-82

C020
C.S.R.
LAUNCESTON
HOLE DIAMETER : 15.0
PROBE # 9032C - 901
SENSOR #4 CAL STD CPS = 7127
SENSOR #4 CAL MUM CPS = 4736
SENSOR #4 CAL BIAS = -1
DATA V9L1 TRUCK # 8038
GREG CREWS APPL.=1080 M

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

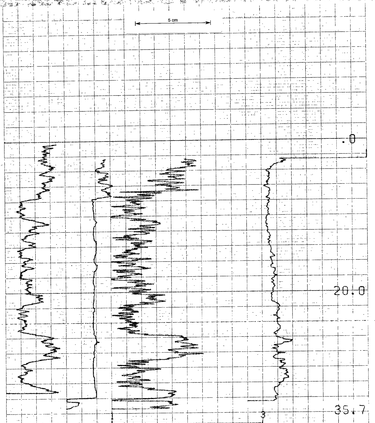
C.S.R.
CO20
LAUNCESTON
TAS.

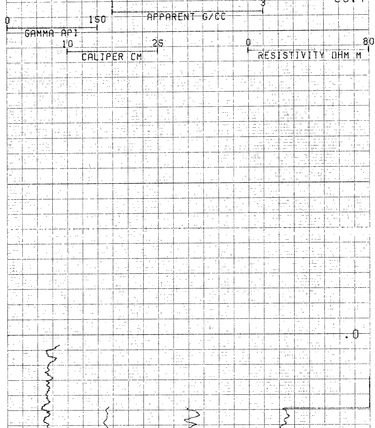
HOLE DATA

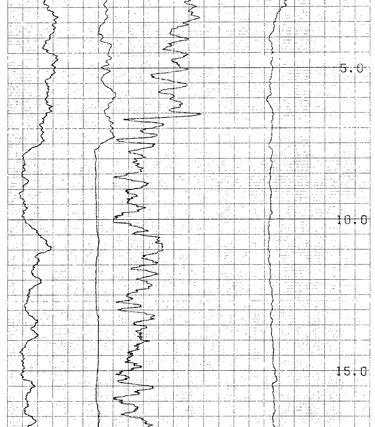
CO20 12-04-82
8038 CREWS BRISBANE

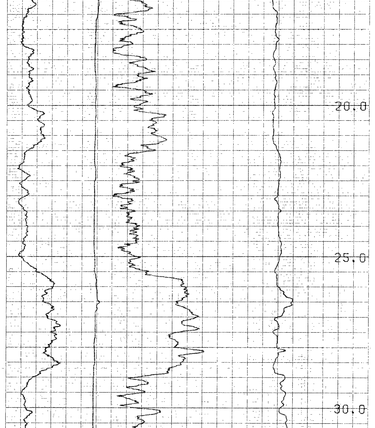
EQUIPMENT DATA

LOGGER DEPTH — PROBE	36M
DRILLER'S DEPTH	36.7M
TOTAL WEIGHT ON CABLE	35.7M
LOGGING SPEED	7M/MIN.
REFERENCE LEVEL	G.L.
PROBE NO.	9032A-201
TAPE 23 TRACK 3	
CASING	
BIT SIZE	15cm
LOGGED INTERVAL	
LOGGING DATE	
HOLE FLUID	H2O
FLUID RESISTIVITY	—
SOFTWARE LEVEL	V8L1
SONDE NO.	8038









COMPU-LOG V8L2 PLOT 04-12-82

CO20
C.S.R.
LAUNCESTON
HOLE DIAMETER : 15.0
PROBE # 9032A - 201
SENSOR #4 CAL STD CPS = 4825
SENSOR #4 CAL RUN CPS = 4747
SENSOR #4 CAL BIAS = 0
DATA V8L2 TRUCK # 8038
GREG CREWS APPL. #3030 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040
CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

COMPANY: C.S.R.
WELL (BOREHOLE): C020
AREA: LAUNCESTON
ELEVATION:
DATA: TAS.

HOLE DATA

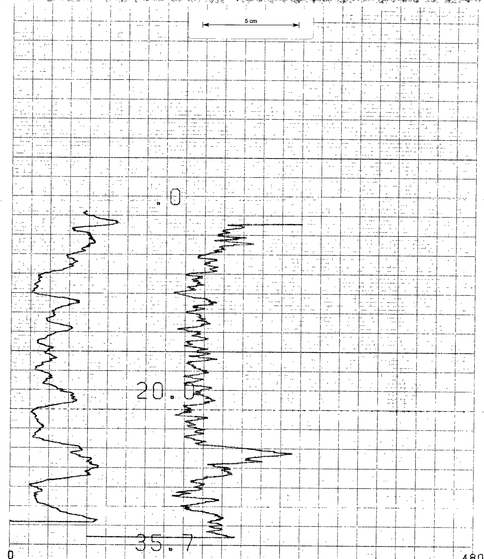
TOTAL DEPTH - DRILLER	36m	BIT SIZE	15cm
TOTAL DEPTH - LOGGER	35.7m	CASING TYPE & SIZE	—
TOTAL DEPTH - LOGGED	35.7m	CASING DEPTH	—
LOGGING SPEED	18m/MIN	BOREHOLE FLUID	H20
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	—
PROBE NO.	9050-242	SOFTWARE LEVEL	V8L1
TAPE 23 TRACK 9		TRACK SELECTION	X OPERATION / CLIENT

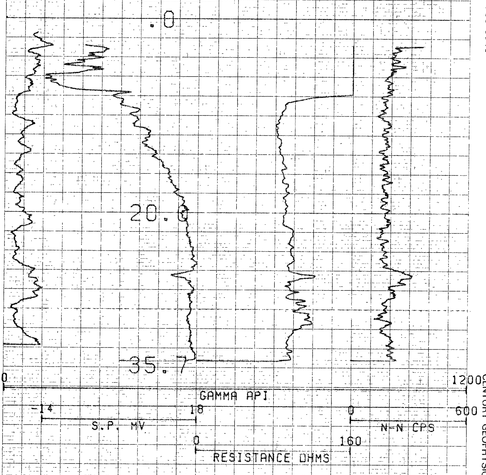
REMARKS

BOREHOLE NO. C020 DATE 17-04-82
OPERATING CO. 8038 CREWS BRISBANE

EQUIPMENT DATA

PROBE DIAMETER			
DETECTOR TYPE			
DETECTOR NO.			
CRYSTAL LENGTH			
CALIB. MODE (DC)			
CALIB. DIAL			
CRYSTAL + CAN			
HEATING / JUMP			
TOOL WEIGHT			
WATER FACTOR			
CENTRALIZERS			
DETECTOR TYPE			
DETECTOR NO.			
SOURCE TYPE			
SOURCE NO.			
SOURCE STRENGTH			
LENGTH SPACING			
SONDE NO.		3778	
SAMPLE / MINUTE		121	
SAMPLE SPACING		15cm	
SHELL TO ELECTRONICS			
WEIGHT			
SELF POTENTIAL			
SHIELDING			
CALIBRATION			
CABLE			





COMPU-LOG V8L2 PLOT 04-12-82

C020
C.S.R.
LAUNCESTON

HOLE DIAMETER : 15.0
PROBE # 9055A - 242
SENSOR #4 CAL STD CPS = 152
SENSOR #4 CAL RUN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA V8L2 TRUCK # 8038
GREG CREWS APPL.#1005 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. P.

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

CO64 | 11-04-82 | 2038 CREWS | BRISBANE

EQUIPMENT DATA

COMPANY	C.S.R.		
BOREHOLE	CO64		
AREA	LAUNCESTON	ELEVATION	
STATE	TAS.		

HOLE DATA

TOTAL DEPTH — DRILLER	21M	BIT SIZE	15cm
TOTAL DEPTH — LOGGER	21.0M	CASING — TYPE & SIZE	—
TOTAL METERAGE LOGGED	21.0M	CASING DEPTH	—
LOGGING SPEED	9M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	— Ω
PROBE NO.	9032L1-896	SOFTWARE LEVEL	V8L1
TAPE 22 TRACK 1		SCALE SELECTION	X OPERATOR / CLIENT

REMARKS:

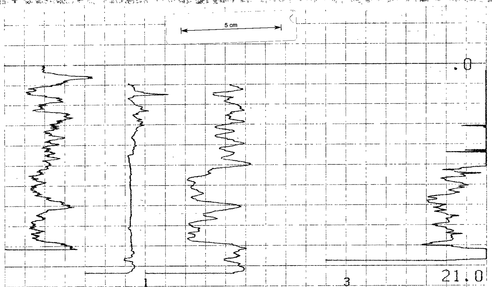
NATURAL GAMMA: DETECTOR TYPE — SCINTILLOMETER; DETECTOR SIZE — 51mm x 114mm; STD & FACTOR — 370 API/CPS; TIME CONSTANT — 1 SEC; CALIB. MODEL USE — 2202; CALIB. UNIT — 1; REACTOR. + or - — +; ULTRONIC — NO; TEST READING — 4000; WINDOW FACTOR — 1; CASING FACTOR — 1

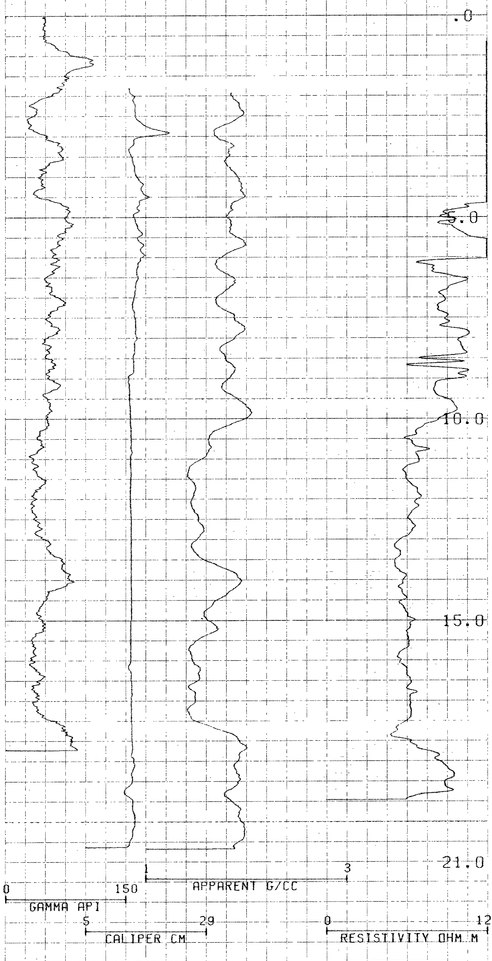
DENSITY: DETECTOR TYPE — GM; DETECTOR SIZE — 25mm x 38mm; SOURCE TYPE — 137Cs; SOURCE STRENGTH — 10mCi; COUNTING SPACING — 15cm

INDUCTION: DETECTOR TYPE — —; DETECTOR SIZE — —; SPACING TYPE — —; SPACING NO. — —; SOURCE STRENGTH — —; SOURCE SPACING — —; FACTOR — —

SPONTANEOUS POTENTIAL: DRILL PIT RESISTIVITY — —; RESISTIVITY — —; SELF POTENTIAL — —; TEMPERATURE — —

CALIPER: INSPECTION — —; CALIPER — —





COMPU-LOG V8L2 | PLOT 04-11-82

CO64

C.S.R.

LAUNCESTON

HOLE DIAMETER : 15.0
PROBE # 9032L1- 896
SENSOR #4 CAL STD CPS = 4393
SENSOR #4 CAL RUN CPS = 4785
SENSOR #4 CAL BIAS = 0
DATA V9L1 TRUCK # 8038
GREG CREWS APPL. #1030 K

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S6936
77455

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 785-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

COMPANY: C.S.R.
BOREHOLE: C064
AREA: LAUNCESTON
ELEVATION:
SHIRE:
STATE: TAS.

HOLE DATA

TOTAL DEPTH — DRILLER	21m	BIT SIZE	15cm
TOTAL DEPTH — LOGGER	21.0m	CASING — TYPE & SIZE	—
TOTAL METERAGE LOGGED	21.0m	CASING DEPTH	—
LOGGING SPEED	5m/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	°C
PROBE NO	9032C-901	SOFTWARE LEVEL	V9L1
TAPE 22 TRACK 2		SCALE SELECTION	X CALIBRATOR / CLIENT

REMARKS:

BOREHOLE: C064 DATE: 11-04-82
LOGGED FROM: 8038 CREWS BRISBANE

EQUIPMENT DATA

PROBE MODEL	9032	9032	9032 SL
PROBE DIAMETER	43mm	43mm	43mm
DETECTOR TYPE	—	—	Nal
DETECTOR SIZE	12.5dia x 12.5mm	12.5mm x 12.5mm	25mm x 100mm
ETC. WINDOW	—	—	0.8 & 1.4MeV
ETC. COLLIMTNG	—	—	114 µCi/Cs
CALIB. MODEL (SC)	—	—	—
CALIB DATE	—	—	—
RADIATION	A "B"	—	—
RADIATING	µCi/mc	—	—
TEST READING	—	—	—
MASTER FACTOR	—	—	—
CASING FACTOR	—	—	—
DETECTOR TYPE	—	—	—
DETECTOR SIZE	12mm x 25mm	12mm x 25mm	25mm x 100mm
SOURCE TYPE	—	—	6.8
SOURCE NO	—	—	6878
SOURCE STRENGTH	—	—	125mC
SOURCE SPACING	—	—	20cm
DETECTOR TYPE	—	—	—
DETECTOR SIZE	—	—	25dia x 152mm
SOURCE TYPE	—	—	mBq
SOURCE NO	—	—	—
SOURCE STRENGTH	—	—	—
SOURCE SPACING	—	—	—
ENGL PT RESISTANCE	—	—	100m x 4.5mm
RESISTIVITY	25cm Normal	75cm Normal	—
SELF POTENTIAL	Short	—	MV
TEMPERATURE	—	—	°C
DEVIATION	—	—	NS EW
CALIPER	YES	YES	—

5 cm

.0

21.0

0 150 GAMMA API

APPARENT G/CC 3

7.5 22.5 CALIPER CM

0 80 RESISTIVITY OHM M

.0

50 UPS 5.0

10.0

15.0

21.0

0 150 GAMMA API

APPARENT G/CC 3

7.5 22.5 CALIPER CM

0 120 RESISTIVITY OHM M

COMPU-LOG V8L2 PL01 04-11-82

C064

C.S.R.

LAUNCESTON

HOLE DIAMETER : 15.0
PROBE # 9032C - 901
SENSOR #4 CAL STD CPS = 7127
SENSOR #4 CAL RUN CPS = 4738
SENSOR #4 CAL BIAS = -1
DATA V9L1 TRUCK # 8038
GREG CREWS APPL.#1030 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

BOREHOLE C064 DATE 11-04-82
INTERPRETATION 8038 CREWS BRISBANE FIELD OFFICE

COMPANY C.S.R.
BOREHOLE C064
AREA LAUNCESTON ELEVATION
STATE TAS.

HOLE DATA

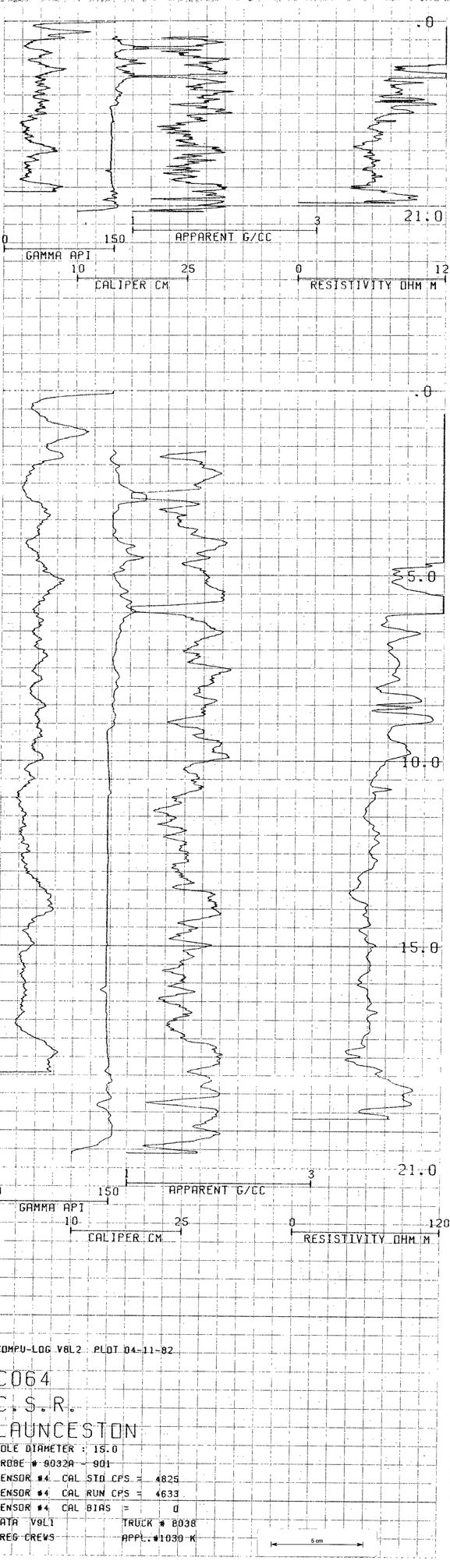
TOTAL DEPTH — DRILLER	21M	BIT SIZE	15cm
TOTAL DEPTH — LOGGER	21.0M	CASING — TYPE & SIZE	—
TOTAL METERAGE LOGGED	21.0M	CASING DEPTH	—
LOGGING SPEED	9M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	— Ω
PROBE NO.	9032A-701	SOFTWARE LEVEL	V9CL
	TAPE 22 TRACK 3	SCALE SELECTION	BY OPERATOR / CLIENT

REMARKS

EQUIPMENT DATA

FROM/MDF				
PROBE DIAMETER	15cm	15cm	15cm	
NATURAL GAMMA	DETECTOR TYPE	NaI	NaI	
	DETECTOR SIZE	5cm x 10cm	5cm x 10cm	
	STD. K-FACTOR	—	0.33 cps/API	
	ABS. CALIBRATION	—	—	
	CAL. MODEL NO.	—	—	
	CAL. UNITS	—	—	
	K FACTOR	—	—	
	CALIBRATION	—	—	
	TEST READING	—	—	
	WATER FACTOR	—	—	
	CASING FACTOR	—	—	
DENSITY	DETECTOR TYPE	—	—	
	DETECTOR SIZE	—	—	
	SOURCE TYPE	—	—	
	SERIAL NO.	—	124	
	SOURCE STRENGTH	—	20mCi	
	SOURCE SPACING	—	10cm	
NEUTRON	DETECTOR TYPE	—	—	
	NEUTRON DETECTOR	—	—	
	SOURCE TYPE	—	—	
	SERIAL NO.	—	—	
	SOURCE STRENGTH	—	—	
	SOURCE SPACING	—	—	
ENG. PT. REFERENCE		—	—	
RESISTIVITY		—	1 with 2 spacing	
SELF POTENTIAL		—	—	
TEMPERATURE		—	—	
DEVIATION		—	—	
CALIPER		—	—	

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77000
77100



COMPU-LOG V8L2 PLOT 04-11-82

C064

C.S.R.

LAUNCESTON

HOLE DIAMETER : 15.0
PROBE # 9032A - 901
SENSOR #4 CAL STD CPS = 4825
SENSOR #4 CAL RUN CPS = 4633
SENSOR #4 CAL BIAS = 0
DATA V9L1 TRUCK # 8038
GREG CREWS APPL. #1030 K

5 cm

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

COMPANY: C.S.R.
BOREHOLE: C064
AREA: LAUNCESTON
ELEVATION:
STATE: TAS.

HOLE DATA

TOTAL DEPTH — DRILLER	21M	BIT SIZE	15cm
TOTAL DEPTH — LOGGER	21.0M	CASING — TYPE & SIZE	—
TOTAL INTERVAL LOGGED	21.0M	CASING DEPTH	—
LOGGING SPEED	18M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	—
PROBE NO.	9050-242	SOFTWARE LEVEL	V9L1
TAPE 22 TRACK 4		SCALE SELECTION	AT OPERATOR'S ELEMENT

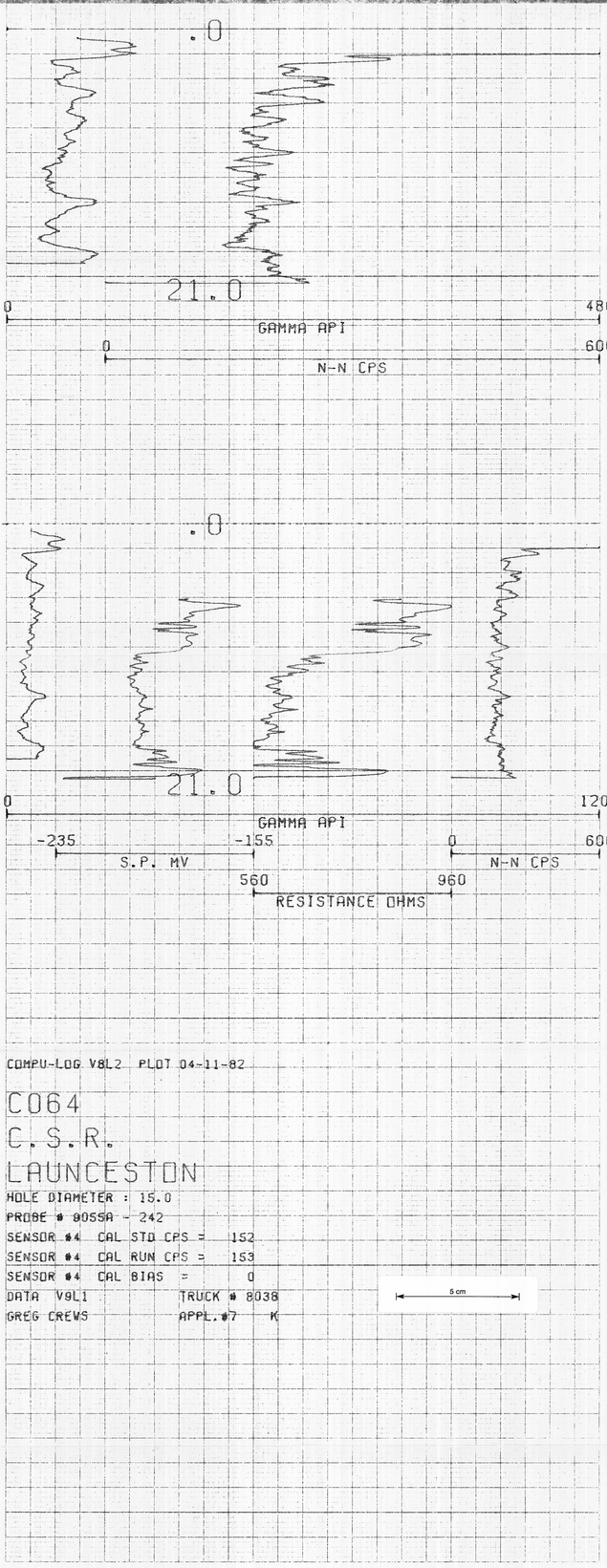
REMARKS

BOREHOLE: C064 DATE: 11-04-82
UNIT/OPERATOR: 8038 CREWS FIELD OFFICE: BRISBANE

EQUIPMENT DATA

PROBE MODEL	9055	9050	9055	
PROBE DIAMETER	43mm	43mm	43mm	
NATURAL GAMMA — DETECTOR TYPE	—	—	—	
NATURAL GAMMA — DETECTOR SERIES	—	—	—	
NATURAL GAMMA — SCINTILLATOR	—	—	—	
NATURAL GAMMA — CABLE WEIGHT, LOG	—	—	—	
NATURAL GAMMA — CABLE DIAM.	—	—	—	
NATURAL GAMMA — K FACTOR	—	—	—	
NATURAL GAMMA — CALIBRATOR — TYPE	—	—	—	
NATURAL GAMMA — TEST READING	—	—	—	
NATURAL GAMMA — WATER FACTOR	—	—	—	
NATURAL GAMMA — CASING FACTOR	—	—	—	
DENSITY — DETECTOR TYPE	—	—	—	
DENSITY — DETECTOR SIZE	25mm x 50mm	25mm x 50mm	—	
DENSITY — SOURCE TYPE	—	—	—	
DENSITY — SOURCE NO.	—	—	3778	
DENSITY — SOURCE STRENGTH	—	—	1Ci	
DENSITY — SOURCE SPACING	—	—	15cm	
RESISTIVITY — DETECTOR TYPE	—	—	—	
RESISTIVITY — DETECTOR SIZE	—	—	—	
RESISTIVITY — SOURCE TYPE	—	—	—	
RESISTIVITY — SOURCE NO.	—	—	—	
RESISTIVITY — SOURCE STRENGTH	—	—	—	
RESISTIVITY — SOURCE SPACING	—	—	—	
SPEC. PT. RESISTANCE	—	—	50m-1.0m	
RESISTIVITY	50m fluid	50m fluid	—	
SELF POTENTIAL	—	—	—	
TEMPERATURE	—	—	—	
DEVIATION	—	—	—	
CALIPER	—	—	—	

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CENTURY GEOPHYSICAL CORP. PART NO. 788-0040

CENTURY GEOPHYSICAL CORP. PART NO. 788-0040

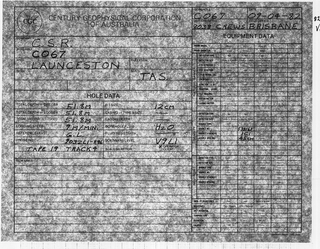
COMPU-LOG V8L2 PLOT 04-11-82

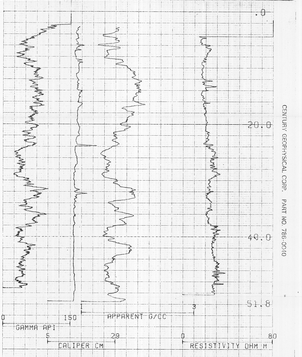
C064
C.S.R.
LAUNCESTON

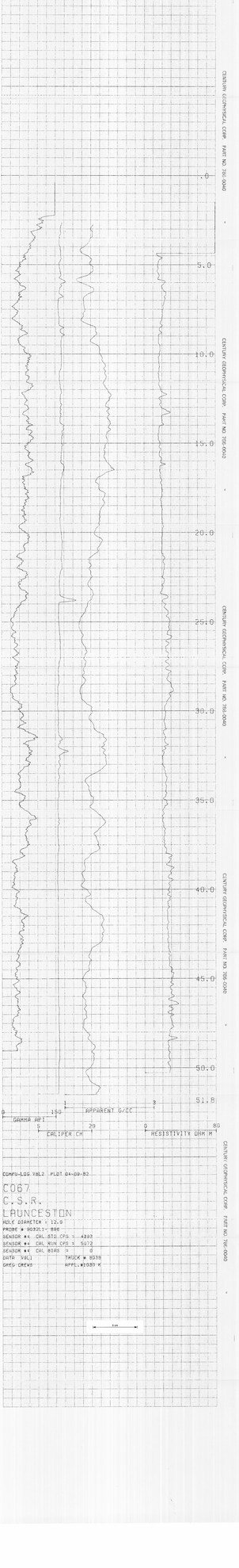
HOLE DIAMETER : 15.0
PROBE # 9055A - 242
SENSOR #4 CAL STD CPS = 152
SENSOR #4 CAL RUN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA V9L1 TRUCK # 8038
GREG CREWS APPL.#7 K

5 cm

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COMPU-LOG VOL2 PLOT 04-09-82

C067

C.S.R.

LAUNCESTON

HOLE DIAMETER = 12.0

PROBE # 9032L1- 896

SENSOR #4 CAL STD CPS = 4283

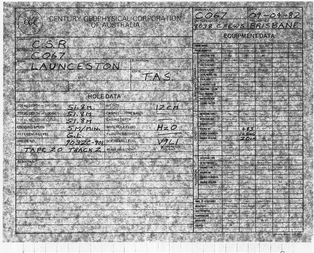
SENSOR #4 CAL RUN CPS = 5972

SENSOR #4 CAL BIAS = 0

DATA VALI THICK # 9038

GREG CREWS APPL.#3030 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0000


CENTURY GEOPHYSICAL CORPORATION
TULSA, OKLAHOMA, U.S.A.

C.S.R.
C067
LAUNCESTON
T.A.S.

HOLE DATA

	51.8m		12cm
	51.8m		
	51.8m		
	S/FRAM		H2O
	Cal.		1.12
	9032C-901		Vol
	TRACED TRACED		2000

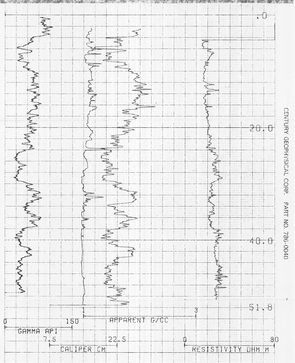
EQUIPMENT DATA

C067 04-05-82
VOL2 PLOT BRISBANE

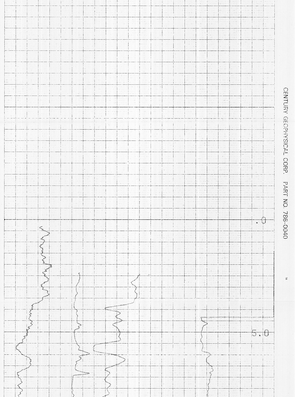
91-711
No 646

130

221603



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG VOL 2 . PLOT 04-08-82

C067
C.S.R.
LAUNCESTON
HOLE DIAMETER : 12.0
PROBE # 9032C - 901
SENSOR #4 CAL STD CPS = 3127
SENSOR #4 CAL RUN CPS = 4724
SENSOR #4 CAL BIAS = -1
DATA VALI TRACK # 9038
OPER CREW3 APPL.#1033 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

1cm

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C067 07-04-82
TOSS CREWS/BITTSBANC

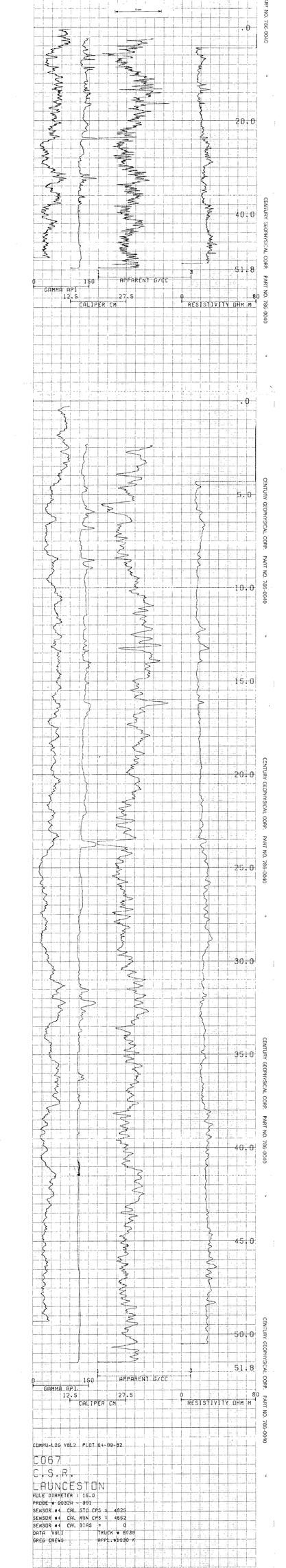
C.S.R.
C067
LAUNCESTON
TAS

EQUIPMENT DATA

HOLE DATA

DRILLED	518.8m	CASING	15cm
TOTAL DEPTH - LOGGER	518.8m	CASING THICKNESS	
TOTAL DEPTH - DRILLER	518.8m	CASING DEPTH	
GROUND LEVEL	7m AHD	BUSHING ELEV. ABOVE G.L.	1.4m
DATE DRILLED	6/4/82	FLUID DENSITY	
PROBE #	7022A-701	FLUID VISCOSITY	
TRACK #	7022A-TRACK 3	WATER LEVEL	V761

REMARKS



COMPU-LOG V8L2 PLOT 04-08-82

C067
C.S.R.
LAUNCESTON
HOLE DIAMETER = 15.0
PROBE # 8032H - 801
SENSOR #4 CAL STD CPS = 4825
SENSOR #4 CAL RUN CPS = 4852
SENSOR #4 CAL BIAS = 0
DATA V8LI TRUCK # 8038
GREG CREWS APPL.#1030 K

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C067 09-04-82
VISIT/OPERATOR FIELD OFFICE
8038 CREWS BRISBANE

COMPANY C.S.R.
BOREHOLE C067
AREA LAUNCESTON
DATE
STATE TAS

HOLE DATA

TOTAL DEPTH - DRILLER	51.8M	BIT SIZE	15CM
TOTAL DEPTH - LOGGER	51.8M	CASING - TYPE & SIZE	—
TOTAL DEPTH LOGGED	51.8M	CASING DEPTH	—
LOGGING SPEED	18M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	GL.	FLUID RESISTIVITY	°C
PROBE NO.	7050-242	SOFTWARE LEVEL	V9L1
TAPE 20 TRACK 4		SCALE SELECTION	INFORMATION CLIENT

REMARKS

EQUIPMENT DATA

	RUN 1	RUN 2	RUN 3
PROBE NUMBER	7050	7050	242
DETECTOR TYPE	NaI	NaI	NaI
DETECTOR SIZE	3"Dia x 10"Long	3"Dia x 10"Long	3"Dia x 10"Long
STD. & BACKG.	1 MIN	1 MIN	1 MIN
CPS RECORDED	CPS	CPS	CPS
CPS/API UNITS	—	—	—
GAMMA SENS.	—	—	—
GAMMA x B	—	—	—
GAMMA (LLD)	—	—	—
CPS TRACKING	—	—	—
RESISTIVITY	—	—	—
SPONTANEOUS	—	—	—
DETECTOR(S)	—	—	—
SPACING (CM)	—	—	—
GAMMA TYPE	—	—	—
SOURCE No.	—	—	7778
SOURCE STRENGTH	—	—	10
SOURCE SPACING	—	—	45cm
CABLE TYPE	—	—	—
CABLE No.	—	—	—
CABLE STRENGTH	—	—	—
CABLE SPACING	—	—	—

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C071 1-04-82

8038 CREWS BRISBANE

EQUIPMENT DATA

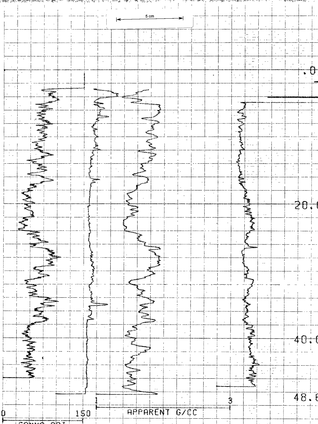
C.S.R.

C071

LAUNCESTON TAS.

HOLE DATA

LOGGER'S TD	47m	DRILLER'S TD	152m
TOTAL DEPTH LOGGED	48.6m	CASING DEPTH	
TOOL ZERO DEPTH	48.6m	CASING SIZE	
GROUND LEVEL	0m/FLOAT	WATER LEVEL	7.2m
REFERENCE LEVEL	GL	UP OR DOWN HOLE	DOWN
LOGGING UNIT	8032CU-MK	DATE RECEIVED	4-11-82
DATE & TIME	4-11-82	DATE LOGGED	4-11-82





COMPU-LOG V8L2 PLOT 04-11-82

C071

C.S.R.

LAUNCESTON

HOLE DIAMETER : 15.0

PROBE # 8032L1-V 826

SENSOR #4 CAL STD CPS = 4393

SENSOR #4 CAL NUM CPS = 4785

SENSOR #4 CAL BIAS = 0

DATA V8L1 TRUCK # 8038

RMED CHEKD APPL.#1080 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C071 11-04-82
B032 C.REWS BRISBANE

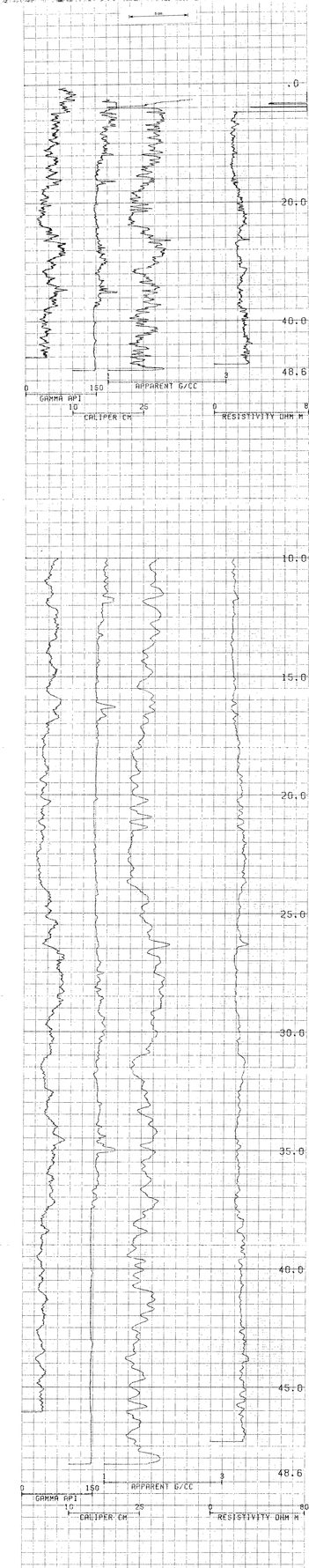
EQUIPMENT DATA

C.S.R.
C071
LAUNCESTON
TAS.

HOLE DATA

CALIPER 47in 15cm
RESISTIVITY 48.6M
LOGGED FROM 48.6M
LOGGED TO 15.24M
CASING SIZE 6in
CASING WEIGHT GAL
CASING DEPTH 202.2m
TAPE 2 : TRACK 2

H2O
383 OHM CM
VOLT



COMPU-LOG V8.2 | PLOT 04-11-82

C071
C.S.R.
LAUNCESTON
HOLE DIAMETER : 15.0
PROBE # 8032C - 001
SENSOR #4 CAL STD CPS = 7127
SENSOR #4 CAL RUN CPS = 4736
SENSOR #4 CAL BIAS = -1
DATA V8.1 TRUCK # 8038
GREG CREWS APPL.#1029 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

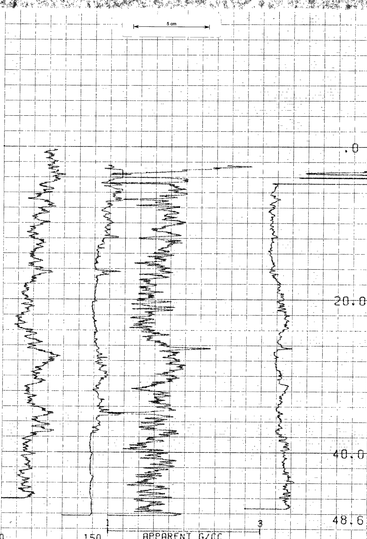
C071 11-04-82
8038 CREWS BRISBANE

EQUIPMENT DATA

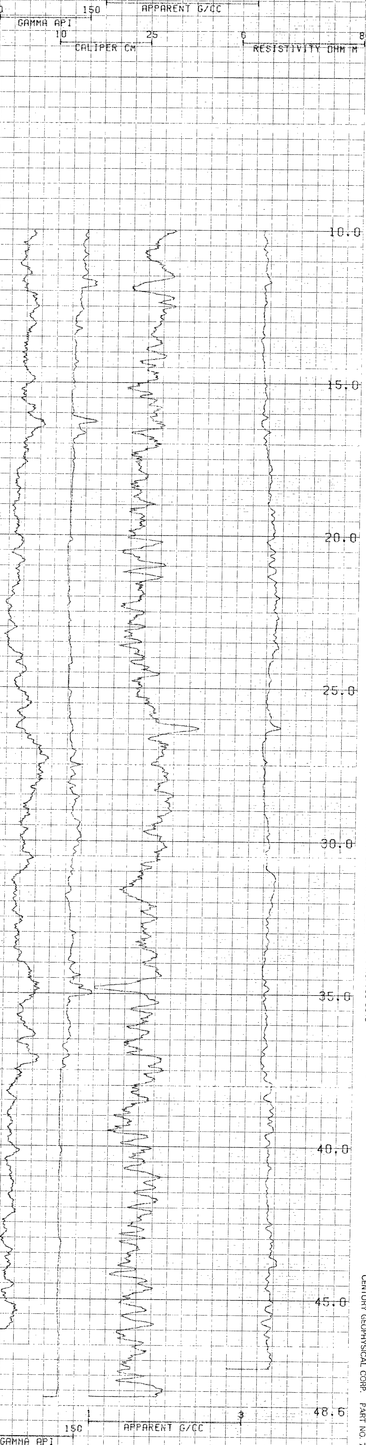
COMPANY C.S.I.R.
WELL C071
FIELD LAUNCESTON
COUNTY TAS.

HOLE DATA

TOTAL DEPTH — DRILLER	49m.	BIT SIZE	15cm
TOTAL DEPTH — LOGGER	48.6m.	CASING — TYPE & SIZE	
CASING DEPTH			
LOGGED INTERVAL	48.6m.	CASING DEPTH	
LOGGING SPEED	9m/min.	BOREHOLE FLUID	H_2O
MEASURED FROM	G.L.	FLUID RESISTIVITY	189 @ 15°C
ENGINEER		FLUID DENSITY	1.0
RECORDED NO	10328-701	TOP DRAIN LEVEL	VAC
TAPE #1 TRACK 3		WATER LEVEL	
REMARKS			



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8L2 PLOT 04-11-82

C071
C.S.I.R.
LAUNCESTON
HOLE DIAMETER : 15.0
PROBE # 8032A - 901
SENSOR #4 CAL STD CPS = 4825
SENSOR #4 CAL RUN CPS = 4633
SENSOR #4 CAL DIFF % = 0
DATA V8L1 TRUCK # 8038
CREWS CREWS APPL.#1030-K

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607722

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C071 11-04-82
9039 CREWS BRISBANE

COMPANY C.S.R.
BOREHOLE C071
AREA LAUNCESTON
STATE TAS

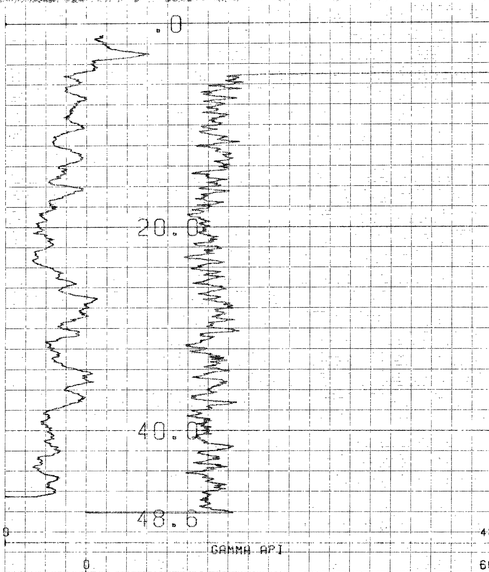
HOLE DATA

TOTAL DEPTH — DRILLER	49M	BIT SIZE	15cm
TOTAL DEPTH — LOGGER	48.6M	CASING — TYPE & SIZE	
TOTAL DEPTH — LOGGED	48.6M	CASING DEPTH	
LOGGED BY	18M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	
PROBE NO	9050-242	SYSTEM LEVEL	1791.M
TAPE 21 TRACK 4		SCALE SELECTION	OPERATOR CLOSE

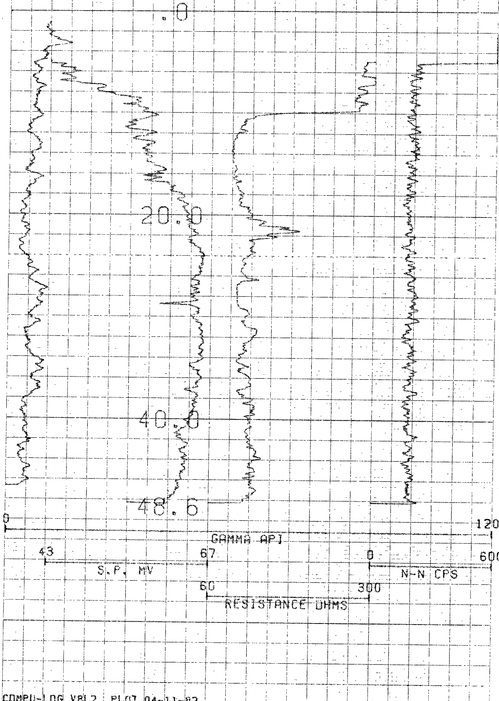
REMARKS

EQUIPMENT DATA

	PROBE	SURFACE
PROBE SERIAL		
DETECTOR TYPE	NaI (Tl)	
DETECTOR SIZE	3"dia x 3"long	
STA. EFFICIENCY		
STA. SENSITIVITY		
CALIB. WORK REQ.		
CALIB. DATE		
SHAPING — 1 REQ.		
SHAPING — 2 REQ.		
WIDTH FACTOR		
CORRECTION		
DETECTOR TYPE		
DETECTOR SERIAL		
SENSE NO.		
SENSE SPACING		
JUNCTION TYPE		
DETECTOR TYPE		
SENSE NO.		
SENSE SPACING		2278
SENSE ORIENTAT		IC/
SENSE SPACING		45cm
FREQ. OF INTERROGAT		
RESISTIVITY		
GAIN PREFERENCE		
TEMPERATURE		
SENSITIVITY		
COUNTS		



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8L2 : PLOT 04-11-82

C071
C.S.R.
LAUNCESTON
HOLE DIAMETER : 15.0
PROBE # 9050A - 242
SENSOR #4 CAL STD CPS = 152
SENSOR #4 CAL RUN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA V8L1 TRUCK # 8038
CREWS APPL.#S

5 cm

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

C075 19-04-82
8038 CREWS BRISBANE

COMPANY: C.S.R.
BOREHOLE: C075
AREA: LAUNCESTON
ELEVATION:
STATE: TAS.

HOLE DATA

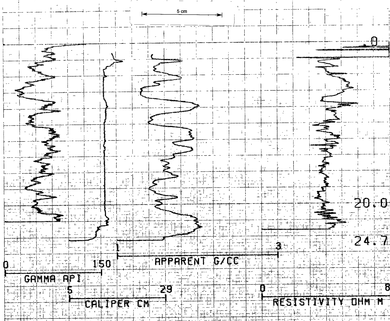
TOTAL DEPTH — DRILLER	N/A	BIT SIZE	15cm
TOTAL DEPTH — LOGGER	24.7m	CASING — TYPE & SIZE	—
TOTAL METRAGE LOGGED	24.7m	CASING DEPTH	—
LOGGING SPEED	7m/min	BOREHOLE FLUID	H2O
REFERENCE LEVEL	GL	FLUID RESISTIVITY	— @ — °C
PROBE NO	8032L1-8M	SOFTWARE LEVEL	V961
	TAPE 32 TRACK1	SOND SELECTION	6" CENTRON

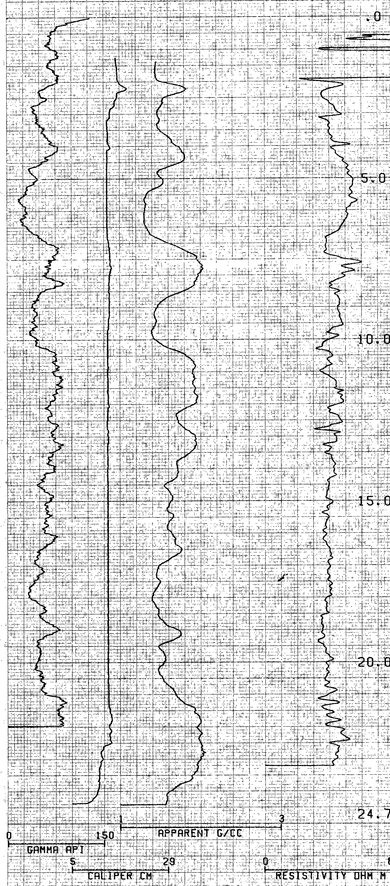
REMARKS

EQUIPMENT DATA

	RUN 1	RUN 2	RUN 3
PROBE MODEL	8038	8032	
PROBE DIAMETER	38mm	38mm	mm
DETECTOR TYPE	NaI	NaI	
DETECTOR SIZE	4 inch x 1 inch	1 inch x 1 inch	mm x mm
STD COUNTS	4383	4383	cps
STD ACCURACY	±1%	±1%	±1 µs
CASE WIDTH	1.5"	1.5"	mm
CASTOR	1.5"	1.5"	mm
SHIELDING	2.5"	2.5"	mm
TOOL MARKING	1.5m	1.5m	m
WHITE FACTOR	1.75	1.75	
GAMMA FACTOR	1.0	1.0	
	RUN 4	RUN 5	RUN 6
DETECTOR TYPE	NaI	NaI	
DETECTOR SIZE	1 inch x 1 inch	1 inch x 1 inch	mm x mm
GUARD TYPE	1 inch	1 inch	mm
GUARD SIZE	5.7/16	5.7/16	mm
GUARD STRENGTH	1C	1C	
GUARD SPACING	25cm	25cm	cm
	RUN 7	RUN 8	RUN 9
DETECTOR TYPE			
DETECTOR SIZE			mm x mm
GUARD TYPE			mm
GUARD SIZE			mm
GUARD STRENGTH			
GUARD SPACING			cm
	RUN 10	RUN 11	RUN 12
DUAL IP RECEIVING			25cm x 50cm
RESISTIVITY	25cm Normals	1.25m Inverted	mm
SELF POTENTIAL			mV
TEMPERATURE			°C
CALIPER			mm
LOGGER			

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040





COMPU-LOG V6L2 PLOT 04-18-82

C075
C.S.R.
LAUNCESTON
HOLE DIAMETER : 15.0
PROBE # 8032L1- 8M
SENSOR #4 CAL STD CPS = 4383
SENSOR #4 CAL RUN CPS = 4785
SENSOR #4 CAL BIAS = 0
DATA V6L1 TRUCK # 8038
DREG CREWS RPPL: #1030 K

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

RECORDED BY: DATE: 17-04-82
LAST LOGGED: 17-04-82
UNIT OPERATOR: 3028 CREWS BRISBANE

COMPANY: C.S.R.
BOREHOLE: C075
LOCATION: LAUNCESTON
ZONE:
ELEVATION:
STATE: TAS.

HOLE DATA

TOTAL DEPTH — DRILLER	N/A	BIT SIZE — TYPE & SIZE	15cm
TOTAL DEPTH — LOGGER	24.7M	CASING — TYPE & SIZE	—
TOTAL METRAGE LOGGED	24.7M	CASING DEPTH	—
LOGGING SPEED	5 M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	— Ω °C
PROBE NO.	9032C-901	SOFTWARE LEVEL	V8L1
	TAPE 32 TRACK 2	LOGGING DIRECTION	✕ OPERATOR'S CHOICE

REMARKS:

EQUIPMENT DATA

PROBE MODEL	9032B	9032C	9035-77
PROBE DIAMETER	3.5cm	3.5cm	3.5cm
DETECTOR TYPE	NaI	NaI	NaI
DETECTOR SIZE	12.5cm x 7.5cm	12.5cm x 7.5cm	12.5cm x 7.5cm
HIGH VOLTAGE	—	—	700 V
GAIN (WATER CAL)	—	—	—
CALIBRATE	—	—	—
K FACTOR — U	—	—	—
K FACTOR — K.CM	—	—	—
TEST READING	—	—	—
WATER FACTOR	—	—	—
LOGGING FACTOR	—	—	40
DETECTOR TYPE	NaI	NaI	—
DETECTOR SIZE	12cm x 20cm	12cm x 20cm	—
SOURCE TYPE	Ra	Ra	—
SOURCE NO.	683	683	—
SOURCE STRENGTH	25mG	25mG	—
SOURCE SPACING	20cm	20cm	—
DETECTOR TYPE	—	—	NaI
DETECTOR SIZE	—	—	7.5cm x 12.5cm
SOURCE TYPE	—	—	NONE
SOURCE NO.	—	—	—
SOURCE STRENGTH	—	—	—
SOURCE SPACING	—	—	—
SHIELDING	—	—	10mm LEAD
RADIATORS	—	—	1 CM COPPER
SELF POTENTIAL	—	—	YES
TEMPERATURE	—	—	YES
DEVIATION	—	—	40/180
CALIPER	—	—	—

ANNEXED PROBE: 9032 COM

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Vol

5 cm

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

GAMMA API
7.5 22.5
CALIPER CM
APPARENT G/CC
0 150
RESISTIVITY OHM M
0 80

29.0
24.7

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

0
5.0
10.0
15.0
20.0
24.7

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

GAMMA API
7.5 22.5
CALIPER CM
APPARENT G/CC
0 150
RESISTIVITY OHM M
0 80

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8L2 PLOT 04-18-82

C075
C.S.R.
LAUNCESTON

HOLE DIAMETER = 15.0
PROBE # 9032C - 001
SENSOR #4 CAL STD CPS = 7127
SENSOR #4 CAL RUN CPS = 4736
SENSOR #4 CAL BIAS = 1
DATA V8L1 TRUCK # 8038
GREG-CREWS APPL.#1030-M

CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

BOREHOLE C075 DATE 19-04-82
OPERATOR'S CODE 8038 FIELD OFFICE BRISBANE

COMPANY C.S.R.
BOREHOLE C075
AREA LAUNCESTON
ELEVATION
SHIRE/ STATE TAS.
LAT/LONG

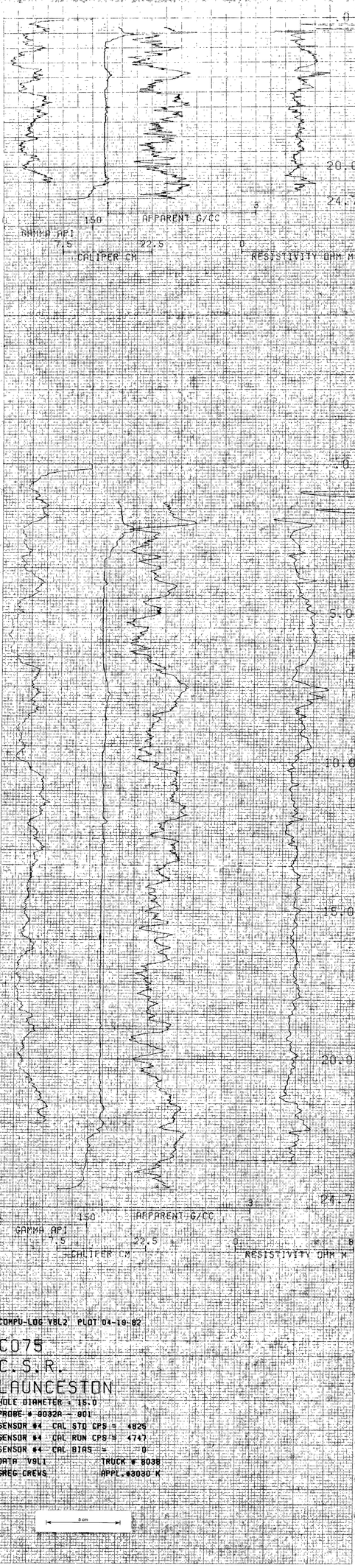
HOLE DATA

TOTAL DEPTH — DRILLER	N/A	BIT SIZE	15CM
TOTAL DEPTH — LOGGER	24.7M	CASING — TYPE & SIZE	—
TOTAL METERAGE LOGGED	24.7M	CASING DEPTH	—
LOGGING SPEED	9M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	— @ — °C
PROBE NO.	9032A-901	SOFTWARE LEVEL	V9L
TAPE 32 TRACK 3		SCALE SELECTION	OPERATOR / CLIENT

REMARKS

EQUIPMENT DATA

	RUN NUMBER	1	2
	PROBE DIAMETER	90mm	90mm
NATURAL GAMMA	DETECTOR TYPE	NaI	NaI
	DETECTOR SIZE	75mm x 75mm	75mm x 75mm
	TIME CONSTANT	1 sec	1 sec
	CALIB. WIRE LINE	—	—
	CALIB. DATE	—	—
	STACKING	1	1
	COUNTING	1.0 MHz	1.0 MHz
	TEST READING	—	—
	WATER FACTOR	—	—
	CASING FACTOR	—	—
DENSITY	DETECTOR TYPE	—	—
	DETECTOR SIZE	—	—
	SOURCE TYPE	—	—
	SOURCE NO.	—	—
	SOURCE STRENGTH	—	—
	SOURCE SPACING	—	—
RESISTIVITY	DETECTOR TYPE	—	—
	DETECTION SIZE	—	—
	SOURCE TYPE	—	—
	SOURCE NO.	—	—
	SOURCE STRENGTH	—	—
	SOURCE SPACING	—	—
	SMALL PT. RESISTANCE	—	—
	RESISTIVITY	—	—
	SELF POTENTIAL	—	—
	TEMPERATURE	—	—
	DEVIATION	—	—
	CALIPER	—	—



COMPU-LOG V8L2 PLOT 04-19-82

C075

C.S.R.

LAUNCESTON

HOLE DIAMETER = 15.0

PROBE # 9032A - 901

SENSOR #4 CAL STD CPS = 4825

SENSOR #4 CAL RUN CPS = 4747

SENSOR #4 CAL BIAS = 0

DATA V9L1 TRUCK # 8038

GREG CREWS APPL.#3030-K

5 cm

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

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CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

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CENTURY GEOPHYSICAL CORPORATION OF AUSTRALIA

COMPANY: C.S.R.
BOREHOLE: C075
AREA: LAUNCESTON
SHIRE:
ELEVATION:
STATE: TAS.

HOLE DATA

TOTAL DEPTH — DRILLER	N/A	BIT SIZE	15cm
TOTAL DEPTH — LOGGER	24.7m	CASING — TYPE & SIZE	—
TOTAL METERAGE LOGGED	24.7M	CASING DEPTH	—
LOGGING SPEED	18M/MIN.	BOREHOLE FLUID	H2O
REFERENCE LEVEL	G.L.	FLUID RESISTIVITY	— @
PROBE NO	9050-242	SOFTWARE LEVEL	V8L1
TAPE 32 TRACK 4		SCALE SELECTION	☒ OPERATOR ☐ CLIENT

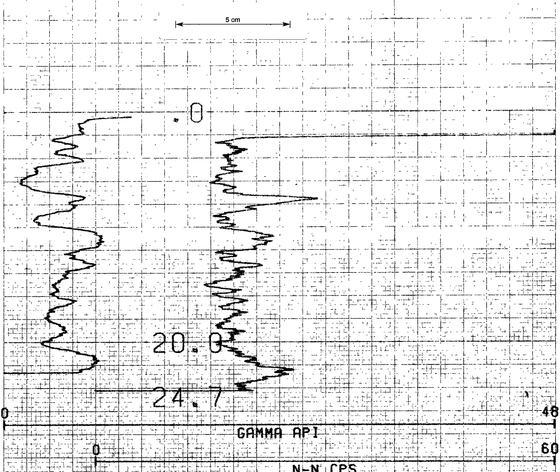
REMARKS

BOREHOLE: C075 DATE: 19-04-82
UNIT/OPERATOR: 8038 CREWS FIELD OFFICE: BRISBANE

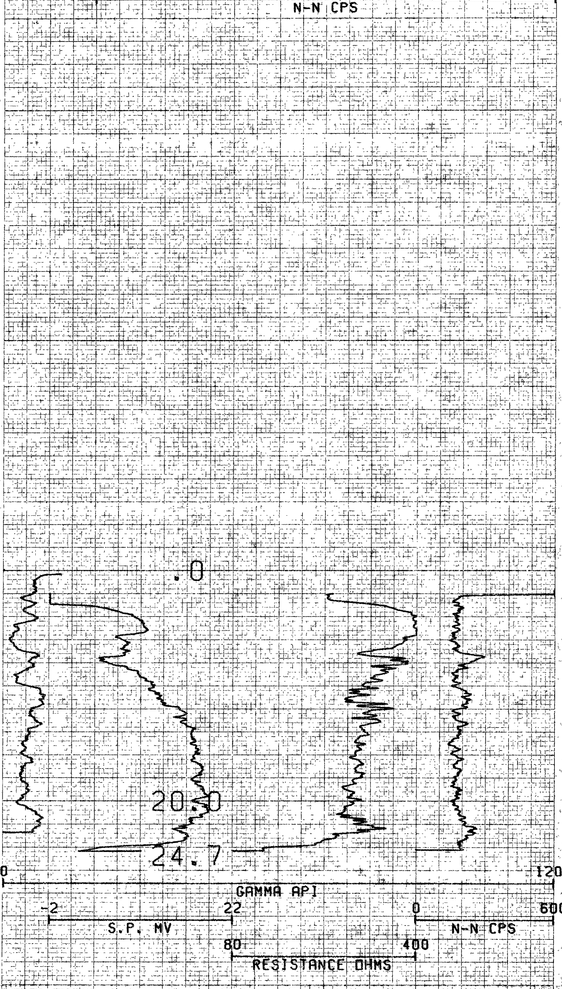
EQUIPMENT DATA

PROBE MODEL	9055	9021	9050-242	
PROBE DIAMETER	52mm	50mm	48mm	
DETECTOR TYPE	Nal	Nal	Nal	
DETECTOR SIZE	51mm x 51mm	51mm x 178mm	25dia x 200mm	
STD. K FACTOR	—	—	2656 x 10⁻⁶	
STD. DEADTIME	—	—	1 μsec	
CALIB. MODEL USED	—	—	—	
CALIB. DATE	—	—	—	
K FACTOR ×10⁻⁶	—	—	—	
DEADTIME μsec	—	—	—	
TEST READING	—	—	—	
WATER FACTOR	2.0m	—	—	
CASING FACTOR	—	—	—	
DETECTOR TYPE	Nal	—	Nal	—
DETECTOR SIZE	12cm x 20cm	12cm x 30cm	Geiger	—
SOURCE TYPE	137	—	137	—
SOURCE NO	—	—	—	—
SOURCE STRENGTH	—	—	—	—
SOURCE SPACING	—	—	—	—
DETECTOR TYPE	Nal	—	—	—
DETECTOR SIZE	—	—	25mm x 125mm	—
SOURCE TYPE	—	—	Am241	—
SOURCE NO	—	—	3728	—
SOURCE STRENGTH	—	—	1Ci	—
SOURCE SPACING	—	—	45cm	—
SMALL PE RESISTANCE	—	—	—	36mm x 438m
RESISTIVITY	Type Normal	2.5m Normal	—	—
SELF POTENTIAL	—	—	YES	—
TEMPERATURE	—	—	✓	—
DEVIATION	—	—	NO ✓	—
CALIPER	YES	YES	—	—

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CENTURY GEOPHYSICAL CORP. PART NO. 786-0040



CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

COMPU-LOG V8L2 PLOT 04-19-82

C075

C.S.R.

LAUNCESTON

HOLE DIAMETER : 15.0
PROBE # 9055A - 242
SENSOR #4 CAL STD CPS = 152
SENSOR #4 CAL RUN CPS = 153
SENSOR #4 CAL BIAS = 0
DATA V8L2 TRUCK # 8038
GREG CREWS APPL.#1005 K

CENTURY GEOPHYSICAL CORP. PART NO. 786-0040

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EL 20/80 - LAUNCESTON

EXPLORATION PROGRESS REPORT FOR THREE MONTH PERIOD ENDED 22 MAY 1982

APPENDIX 7. DRILLING PROCEDURES

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APPENDIX 7. DRILLING PROCEDURES

A. 7.1 Introduction

CSR Coal Division, and affiliated company AAR Limited have conducted a total of three exploratory drilling programmes in the Launceston Basin. The drilling contractors and drill rig types are discussed in Osborne (1981), Ellis (1982) and Section 5.2 of this three monthly report. Table 17 summarizes the drilling contractors and drill rig types.

TABLE 17

EXPLORATION PROGRAMME	EXPLORATION COMPANY	DRILLING CONTRACTOR	DRILL RIG
March-April 1981	AAR Limited	Exploration Drilling	Ingersol Rand T 60
October-December 1981	CSR Energy Division	H.J. Stacpoole	Foxmobile B 40-L
March-April 1982	CSR Coal Division	Deadline	Mayhew 1,000

Exploration drilling during the March-April 1981 programme is discussed in Osborne 1981, and will not be discussed in this report.

A. 7.2 Stratigraphy

The regional stratigraphy of EL 20/80 is summarized in Table 2 of this three monthly report. The dominant rock type intersected during exploratory drilling in the Launceston Basin is clay, and silty and sandy clay. Sand, silt, and brown coal are relatively minor components of the Launceston Basin stratigraphy.

Table 18 summarises the main lithological units and their geomechanical properties. The geomechanical properties of the lithological units are the major constraints upon the drilling procedures employed.

A. 7.3 Exploratory Drilling

Two methods of rotary chip drilling have been attempted in the Launceston Basin by drillers contracted to CSR Limited and are outlined in Sections A 7.3.1 and A 7.3.2.

A. 7.3.1 Exploratory Drilling, October-December 1981 Exploration Programme.

The typical drilling practice during this programme was to set an above ground mud tank so that the drill stem passed through a hole in the mud tank, and drilling could proceed immediately after an affective seal was made between the ground and the mud tank. Cuttings were returned to the surface by a water based ciculating medium, and settled in the mud tank. Samples were taken every two metres by shovelling them from the mud tank.

Drill rods were converted hammer rods, 3.2m in length and 100mm in diameter.

Successive drill rods were added to the drill string manually. That is, the rods were hoisted from the rod rack, or from the ground by physically lifting them.

Blade, tricone roller, and hammer bits were used during the programme. Tricone roller, and hammer bits were used to penetrate Tertiary basalt, and tricone roller bits were occasionally used to penetrate high strength tough siderite bands.

TABLE 18

EL20/80 LAUNCESTON

SUMMARY OF GEOMECHANICAL PROPERTIES OF LITHOLOGIES

INTERSECTED DURING EXPLORATORY DRILLING AND DRILLING PROBLEMS ENCOUNTERED

AGE	LITHOLOGY	GEOMECHANICAL DESCRIPTION	DRILLING PROBLEMS ENCOUNTERED
Quaternary	Alluvium, terrace deposits marsh and swamp deposits boulder beds and gravel	Very loose to loose, can be excavated by hand and shovel respectively	Caving of uncased holes. Difficulty in sealing mud pit or seating stand pipe. Circulation loss.
Tertiary-Quaternary	Lag deposits of ferruginous buckshot gravel and ferricrete	As above, for lag deposits. Ferricrete low to moderate strength and brittle	As above
Tertiary Volcanics Post Eocene - Mid Tertiary	Mid to dark grey, vesicular to extremely dense alkali olivine basalts		
	Weathered basalt	Low to moderate strength brittle rock. Commonly jointed and fractured, and in this state can behave like a gravel	Difficulty in seating stand pipe. Ciculation loss. Caving of hole wall.
	Fresh basalt	High to extremely high strength brittle to tough rock	Slow penetration rate
Tertiary Palaeocene - Upper Oligocene	Clay	Soft to firm, generally highly plastic and dispersive. Commonly sticky. Some clays are soft, of low plasticity and highly dispersive. in general silty clays more highly dispersive than non silty clays. Commonly sub-fissile. Fissility is observed when clay dry.	Clay balling. Thickening of cirulating fluid due to clay dispersing. Core loss when slickensides present in clay.
Tertiary	Silt, sand	Soft to firm, generally loose. hole wall conditions stable.	Generally no problems encountered. Minor circulating fluid loss.
	Brown coal	Soft to firm and friable. occasionally soft and gelatinous, and are weak zones in the coal.	Generally no problems encountered although some circulating fluid loss.
	Ligneous clay	Soft to firm, low to high plasticity. Generally non dispersive and not 'sticky'.	Generally no problems encountered, rare clay balling.

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The initial drill bit diameter was 120mm, but was changed to 150mm after severe clay balling problems were experienced. 180mm blade bits were used for precollaring during core drilling.

A. 7.3.1 The main problem experienced during the exploration programme was clay balling. Clay balling is a term referring to clay cuttings which are not flushed from the drill hole and adhere to the hole wall or drill stem. This decreases the anulus between drill stem and hole wall so that with increasing depth advance cuttings cannot bypass the zone of decreased anulus. The cuttings form a collar completely blocking the drill hole. Hence no cutings could be logged when this occurred.

Clay balling was caused due to the following factors:-

(i) The water pump pressure and volume was insufficient to effectively clear cuttings from the drill hole.

(ii) The drillers did not "spud" to clear the cuttings adhering to the hole wall. This compounded the problem created by the low water pump pressure and volume.

The term "spud" refers to repeatedly lowering and raising the drill stem whilst it is rapidly rotating. This clears clay cuttings adhering to the hole wall.

(iii) Allowing cuttings to settle in the mud pit enabled the clays to disperse, thereby increasing the viscosity of the cirulating medium. This decreased the uphole velocity of cuttings and added further to the clay

balling problems as outlined in points i) and ii) above.

(iv) Low pH clay strata dispersing in the mud pit created an acidic circulating medium. The low pH of the circulating fluid precluded clay size particles from flocculating or settling from suspension, and meant that flocculating additives were rendered inaffective. Hence the circulating medium remained highly viscous.

A. 7.3.2 Exploratory Drilling, March-April 1982 Exploration Programme

The typical drilling practice was to drill up to two metres with $6\frac{3}{4}$" or $5\frac{3}{8}$" diameter bits using compressed air to return cuttings. A conducter pipe and T-piece were then set in the hole. The bits were changed to $4\frac{3}{4}$" or $4\frac{1}{2}$" diameter and the circulating medium to water cuttings were then flumed from the stand pipe, via the T-piece, onto a $\frac{1}{32}$" - $\frac{1}{4}$" mesh screen which was placed over an above ground mud tank. Cuttings accumulated on the screen, and samples were taken every metre. When sandy strata were intersected, finer mesh screens were used for sample collection.

Blade, tricone roller, and hammer bits were used during the programme. Tricone roller and hammer bits were used to penetrate Tertiary basalt.

The main drilling problems encountered during this drilling programme were;

. maintaining an efective stand pipe seal in Quaternary alluvium, and weathered, often gravelly Tertairy basalt.

. Drilling Tertiary basalt.

A. 7.4 Conclusions

The March-April 1982 exploration programme was more successful than the October-December 1981 exploration programme. The main contributing factor was fluming the drill cuttings over mesh screens, and having higher capacity mud pumps on board the drill rig, which allowed higher drilling production to be obtained.

Sampling from mesh screens also provided a better sample than what can be obtained by sampling from mud pits, and lithological boundaries could also be more accurately logged.

It is recommended that future drilling in clayey strata similar to those intersected in the Launceston Basin be drilled using methods similar to those used in the March-April 1982 exploration programme.

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Dept of Mines | A.O. | C.G. | E.O. | D.S.M.E | Registrar
Received Answered 13 JUL 1982
DEPT. OF MINES REF. No. 5290/82
E & IL

MICROFILMED

CSR COAL DIVISION

FOR

AAR LIMITED

EXPLORATION LICENCE 20/80 - LAUNCESTON

EXPLORATION PROGRESS REPORT

FOR THREE MONTH PERIOD

ENDED 22 MAY 1982

Appendix 8

Prepared by:

Exploration and Evaluation Group
CSR Energy Division
AMP Building
10 Eagle Street
BRISBANE QLD 4000

1410b

APPENDIX 8.

HYDROGEOLOGY

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	C020 (P2)	3
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APPENDIX 8 HYDROGEOLOGY

A.8.1 Introduction

Thirteen piezometers were installed at seven sites in the Selbourne, Loatta, and Pipers Lagoons sub-basins. The location of these sites is shown in Figure 7. Depths at which piezometers are set, and zones that the piezometers monitor are summarized in Table 13 and Figure 8. Installation of piezometers is detailed in Section A.8.3.

A.8.2 Piezometer Nomenclature

Exploratory drill holes with the suffix P, for example C054 (P) are drill holes in which piezometers are installed. The suffixes P1 and P2 refer to piezometer one, and piezometer two respectively, and only apply when two piezometers are installed in the one drill hole.

TABLE 13.

EL 20/80 LAUNCESTON

SUMMARY OF PIEZOMETER STATISTICS

Drill Hole Number	Standing Water Level (m)	Depth Piezometer Set (m)		Zone Piezometer Monitors
		Piezometer 1	Piezometer 2	
C020 (P1)	2.93	28.2		Floor LB3, LBO
C020 (P2)			23	LBO
R064 (P)	3.03	43.6		Floor SDO, SDO, SCO, SBO, SAO
C064 (P)	2.93		16.3	SBO, SAO, roof SAO
C067 (P1)	2	52.5		Basal PCO
C067 (P2)			47.5	PCO
C071 (P)	4.7	30.4		Floor PBO
R071 (P)	8.95	66		Floor PCO, PCO
			22	PBO
C075 (P)	1.0	20.5		PCO
R081 (P1)	Flowing	66		Aquifer below LCO, LCO
R081 (P2)			18.5	Floor LB3
R086 (P)	3.8	19.8		Floor LAO

NOTE: The seam nomenclature of two upper case letters and one numeral presented in the column designated 'Zone Piezometer Monitors' is discussed in Section 4.1.2 of the Three Monthly Report for the period ended 22nd May. 1982.

A.8.3 Installation of Piezometers

C020 (P1)

Cored hole C020 was open to a depth of 32m. Piezometer 1 is set at 28.2m, and slotted between 28.2 and 26.7m. Fine to medium quartzose sand was used to fill the drill hole between 32 and 27m. The final depth of the sand was difficult to measure due to fine sand grains remaining in suspension. This was measured after 24 hours had elapsed. A cement slurry was added, which theoretically filled the drill hole between 27 and 26m. Piezometer 1 flowed upon addition of the cement slurry.

C020 (P2)

Piezometer 2 was inserted 24 hours after piezometer 1. Cored hole C020 was open to 2m, even though the volume of sand and cement poured down the drill hole should have filled it to a minimum depth of 25m. However, the caliper log shows that the roof of Seam 2 is washed out, suggesting a weak roof strata to LB0. Collapse* may have occurred in this weak zone, and inhibited sand and cement slurry settling to the required depth.

Piezometer 2 is set at 23m, after being pushed through a solid 1 to 2m thick plug, assumed to be cement, and then through less resistent strata, probably sand. Piezometer 2 is slotted between 23 and 21m. The drill hole was plugged from 2m to ground level with cement.

*Collapse refers to weak wall strata breaking, falling and reducing the hole diameter.

C020 (P) Discussion

Piezometer 1 will monitor the water pressure at the base of LB3, because the piezometer flowed when the cement plug was added.

Piezometer 2 will monitor the zone from LB3 to the LB0 roof.

R064 (P)

Rotary hole R064 was bridged* at 26.6m. The piezometer is set at 43.6m after bypassing the bridged zone. The piezometer is slotted between 43.6 and 41.1m. Fine to medium quartzose sand fills the hole to a depth of 11.8m.

It was assumed that the blockage in the hole had cleared, and sand was shovelled down the hole. The sand was allowed to settle for 24 hours before the depth of the sand was measured. The volume of sand shovelled down the hole was theoretically insufficient to fill the hole to a depth less than 26m. A cement plug was placed at 11.8m, and cuttings were used to backfill the hole to the surface.

The piezometer will monitor the water pressure of all brown coal seams (SAO, SBO, SCO, SDO) and the floor of the deepest seam, (SDO).

*The term bridged refers to a section of hole in which the diameter has decreased from that originally drilled by clay balling or collapse of the hole wall.

C064 (P)

Cored hole C064 was open to 18.6m. The hole was backfilled to 16.3 with cuttings and a cement plug. The piezometer is set at 16.3m, and slotted between 13.7 and 16.3m. Fine to medium quartzose sand was shovelled down the hole sufficient to backfill it to 13.0m.

The sand was allowed to settle for 24 hours, and it was found that the hole was backfilled to a depth of 4m. The caliper log for this hole shows that washouts occur in the overburden of SAO, indicating a possibility of weak strata. Caving of the hole wall in these weak zones may have impeded the sand from passing down the hole.

A cement plug was added at 4m, and the hole backfilled to the surface with cuttings.

The piezometer in this hole will monitor SBO, SAO and the roof of SAO.

C067 (P1)

Piezometer one is set at 52.5m and is slotted from 52.5 to 50.6m. Coarse dolerite gravel was used to backfill the hole to 48.9m, and the zone to be monitored, 52.5 to 48.9m was sealed off with a 1.4m thick cement plug to 47.5m.

C067 (P2)

Piezometer two is installed at 47.5m and is slotted to 44.25m. The hole was backfilled with coarse dolerite gravel from 47.5 to 42.3m. A cement plug at 42.3m seals the zone 47.5 to 42.3m. The hole was backfilled to the surface with cuttings.

Piezometer two flowed after sealing the zone 47.5 to 42.3m.

C067 (P) Discussion

Piezometer one will monitor the expected water pressure of the basal PCO. In effect this zone is the floor to PCO because the dominant lithology is clay. Piezometer two monitors the expected water pressure of PCO. The brown coal of PCO may be a potential aquifer, because piezometer two flowed when the zone to be monitored was sealed.

C071 (P1)

Cored hole C071 was backfilled to 31.2m with cuttings and a cement plug was added between 31.2 and 30.4m. Piezometer 1 is set at 30.4m and is slotted between 30.4 and 27.4m. The hole was backfilled with coarse dolerite gravel from 30.5 to 25m, and a cement aggregate plug placed between 25 and 23m.

Piezometer one flowed sandy muddy water when the cement plug was positioned in the bore hole.

The piezometer will monitor the water pressure of the floor to seam PBO.

R071 (P1)

Rotary hole R071 was open to total depth. It was backfilled with cuttings, but bridged off at 30m.

Piezometer one is set at 66m and slotted from 66 to 63m. A cement plug is situated at 30m. The hole was backfilled with cuttings to 23.5m.

R071 (P2)

A cement plug exists from 23.5 to 22m. Piezometer 2 is set at 22m. It is slotted between 22 and 19m. The drill hole was backfilled with gravel to a depth of 19m. The gravel is overlain by a thin clay band and a cement plug. The hole was backfilled to the surface with cuttings.

Piezometers 1 and 2 monitor the water pressure of the PCO floor and PCO seam, and PBO respectively.

C071 (P) and R071 (P) Discussion

The standing water level of C071 (P) and R071 (P) differ by 4.25m. This difference can not be explained by topographic effects. Water flowed from C071 (P) when piezometer was sealed off from external influences. This suggests that the floor to PB0 may be a potential water source, and that it influences the standing water level of shallow drill holes.

Its effect upon the standing water level may be dissipated in R071 (P) which is a deeper drill hole.

C075 (P)

Cored hole C075 was open to 21.6m. A cement plug was added between 21.6 and 20.5m. The piezometer is installed at 20.5m and slotted between 20.5 and 17m. A cement plug caps the gravel and seals the zone 20.5 to 17m.

The piezometer will monitor the expected water pressure of seam PC0.

R081 (P1)

Rotary chip hole was flowing when piezometers were set. The hole was bridged at 30. Piezometer 1 was set at 66m, which was the total depth of the hole. A clay plug was inserted between 30 and 28.9m, and a cement plug between 28.9 and 27m.

Piezometer 1 flowed at the rate of approximately 1 gallon every 5 minutes with a 4m head.

R081 (P2)

Clay cuttings were used to backfill the hole between 27 and 20m. A cement plug was added between 20 and 18.5m. Piezometer 2 is set at a depth of 18.5m and is slotted between 18.5 and 17.5m. Coarse bluemetal gravel (crushed dolerite) was used to backfill R081 to a depth of 17.75m. A cement plug was added above the gravel and the hole backfilled to the surface with cuttings.

Piezometer one monitors the aquifer zone below LC0, and LC0 seam. Piezometer two monitors the water pressure of the LB3 floor.

R086 (P)

Rotary drill hole R086 was open to total depth, but bridged off at 30m when backfilled with gravel. The hole was backfilled to 20.3m, and a cement plug placed between 20.3 and 19.8m. The piezometer is set at 19.8m and slotted between 18.25 and 19.8m. Gravel was used to backfill the hole to 15m, and the zone to be monitored 19.8 to 15m, was sealed off with a cement plug. The hole was backfilled to the surface with cuttings.

The piezometer monitors the water pressure of the LA0 floor.

A.8.4 Water Samples

During the October-December (1981) drilling programme water samples were collected from 10 exploratory drill holes, for Mr. W.L. Matthews of the Tasmanian Department of Mines, Hydrology Section. Samples were taken using a PVC bailer 4 or 5 days after completion of drilling to allow drill hole conditions to stabilize and turbidity of the water to decrease.

Water samples were submitted to the Tasmanian Department of Mines Laboratory for analysis. Chemical analyses of water samples are presented in Appendix 13 of the Geological Survey of Tasmania Bulletin 59.

No water samples were taken during the March-April 1982 exploration programme.

A.8.5 Standing Water Levels

The standing water levels of all holes drilled during the October-December 1981 and March-April 1982 exploration programmes are presented in Table 14. Standing water levels of holes drilled by AAR Limited in March-April 1981 were presented in Osborne, 1981.

During the October-December 1981 exploration programme the standing water level of several holes was irregularly monitored. These results are shown in Table 15. A positive correlation can not be made between the standing water level trends and the trend of decreasing rainfall over the period October through to December.

Knights and Matthews, (1976) discuss the relationship between rainfall and piezometric pressures. They state that the piezometric pressures in shallow, possibly unconfined aquifers respond quickly to rainfall, and that lag times between rainfall and rising piezometric pressure in deep confined aquifers can be up to 8 to 12 weeks. Therefore, the nature of the aquifer, and period of rainfall must be determined before the results of Table 15 can be used.

A.8.6 Underground Water - a discussion

Eight of the holes drilled in the Rosevale-Westwood area were flowing. Confined aquifers are generally situated stratigraphically below ligneous facies.

Aquifers have been identified in the following stratigraphic horizons:-

1) Sandy strata below the ligneous facies;

ii) Brown coal seams confined by impermeable clay horizons;

iii) The weathered horizon of Jurassic dolerite underlying the Tertiary strata;

iv) The Tertiary clay and Tertiary basalt interface;

v) Tertiary basalt.

Aquifers in sandy horizons have been intersected in rotary holes R079, R081 and R085. The water bearing horizons in these drill holes was logged as a clayey quartzose sand. However the lithology may have been mis-identified. An alternative lithology could be a quartzo-feldspathic sand in which the feldspar sand is weathered, and which disaggregates during rotary drilling.

Sandy aquifers are readily identified using downhole geophysical logs. Characteristic responses of the sondes is summarised in Table 16.

TABLE 16

EL 20/80 LAUNCESTON

Characteristic Responses of Downhole Geophysical Sondes in Sandy Aquifers.

SONDE	RESPONSE (cps)
Gamma	Moderate
Caliper	Hole wall cavity
Density	High
Resistivity	High
Neutron	High

TABLE 14

STANDING WATER LEVELS

Hole Number	Date Hole Completed	Date Water level Measured	Standing Water Level (m)	RL of Hole (m. ASL)
R001	5.10.81	6.10.81	Flowing	155
R002	7.10.81	8.10.81	1.2	165
R003*	9.10.81	10.10.81	1	150
R004	12.10.81	12.10.81	4	165
C004	3.12.81	3.12.81	7.7	165
C004 (R)	7.12.81	7.12.81	5.2	165
R005*	14.10.81	14.10.81	1.4	150
R006	15.10.81	15.10.81	Flowing	160
R007	17.10.81	17.10.81	2.7	146
R008	21.10.81	21.10.81	2.7	170
R009*	22.10.81	22.10.81	1.1	160
R010			Hole caved	150
R011	27.10.81	28.10.81	3.4	170
R012	28.10.81	28.10.81	4.4	150
R013*	30.10.81	30.10.81	3.9	150
R014	31.10.81	31.10.81	5.35	155
R015	1.11.81	1.11.81	3.9	150
R016	2.11.81	2.11.81	< 1	150
R017	3.11.81	3.11.81	< 1	155
R018*	4.11.81	4.11.81	1.2	160
R019*	5.11.81	9.11.81	< 1	150
C019	2.12.81	2.12.81	3.8	150
R020	6.11.81	6.11.81	2.6	160
R021	9.11.81	10.11.81	3.9	175
C021	6.12.81	6.12.81	11.6	175
R022	10.11.81	10.11.81	5.2	145
C022*	28.11.81	28.11.81	5.3	145
R023	11.11.81	11.11.81	2.5	150
R024	12.11.81	12.11.81	1.7	197
R025*	12.11.81	12.11.81	< 1	185
R026	14.11.81	14.11.81	7.3	195
R027	15 11.81	16.11.81	4	170
R028	21.11.81	22.11.81	8.6	
Ro29	23.11.81	23.11.81	2.6	140
R030	23.11.81	23.11.81	13.4	137
R031	25.11.81	25.11.81	16.1	138
C032*	30.11.81	30.11.81	2.8	150
C033	1.12.81	1.12.81	6.9	150
C033 (R)	7.12.81	7.12.81	7.1	150
C034	18.11.81	18.11.81	1.9	152
R035	18.11.81	19.11.81	3.8	141
R036	-	-	-	-
R037	19.11.81	19.11.81	1	
R038	20.11.81	20.11.81	6.3	

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TABLE 14 Contd.

STANDING WATER LEVELS

Hole Number	Date Hole Completed	Date Water level Measured	Standing Water Level (m)	RL of Hole (m. ASL)
C020	12.4.82	24.4.82	2.93	145
R062	24.3.82	6.5.82	3.1	173
R063	24.03.82	6.5.82	5.65	163
R064	24.3.82	25.4.82	3.03	160
C064	11.4.82	25.4.82	2.93	160
R065	25.3.82	-	-	175
R066	25.3.82	6.5.82	Intermittent flow	165
R067	25.3.83	29.4.82	Hole caved	140
C067	9.4.82	29.4.82	2	140
R068	26.3.82	3.5.82	2.37	140
R069	26.3.82	24.4.82	5.64	160
R070	27.3.82	29.4.82	6.6	163
R071	27.3.82	28.4.82	8.95	150
C071	11.4.82	28.4.82	4.7	150
R072	27.3.82	5.5.82	0.8	140
R073	27.3.82	24.4.82	Flowing	150
R074	29.3.82	24.4.82	4.95	150
R075	29.3.82	30.4.82	Flowing	150
C075	19.4.82	30.4.82	1	150
R076	30.3.82	3.5.82	2.53	155
R077	30.3.82	3.5.82	Flowing	150
R078	1.4.82	4.5.82	3.13	183
R079	2.4.82	4.5.82	Flowing	176
R080	4.4.82	27.4.82	11.7	175
R081	4.4.82	24.4.82	Flowing	155
R082	6.4.82	25.4.82	Hole caved	200
R083	13.4.82	4.5.82	2.07	165
R084	14.4.82	3.5.82	4.61	180
R085	15.4.82	4.5.82	Intermittent Flow	140
R086	15.4.82	25.4.82	3.8	160
R087	11.4.82	-	-	170
R088	16.4.82	-	-	205
R089	18.4.82	24.4.82	7.55	165
R090	18.4.82	3.5.82	2.47	165
R091	19.4.82	3.5.82	1.4	180
R092+	20.4.82	-	Hole caved	150
R093	21.4.82	-	-	220
R094	21.4.82	6.5.82	3.28	200
R095	22.4.82	6.5.82	2.74	145

NOTE: * Water samples taken, see A.7.4

+ Aquifer in basalt, approximately 200 gallons per hour, see A.7.6.

1410b

The possibility of confined brown coal seams being aquifers is discussed in Section A.7.3. It is thought that brown coal seams may be aquifers because piezometers set to monitor the water pressure of specific seams flowed for several hours, when the brown coal seam was isolated from external influences.

Rotary hole R073 flowed after completion of drilling. It is thought that the aquifer zone is at the interface of Jurassic dolerite and Tertiary strata. However, it is possible that the brown coal seams act as aquifers.

Natural springs are commonly observed in the vicinity of Tertiary clay and Tertiary basalt interfaces. These springs are particularly common in the Loatta sub-basin, on the Loatta and Rocklynn properties.

An aquifer with the potential for approximately 200 gallons per hour was intersected in basalt in rotary hole R092. V-notch weir tests were not conducted. The water potential of the aquifer was estimated by the driller to be 200 gallons during down the hole hammer drilling.

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TABLE 15

STANDING WATER LEVELS MONITORED FROM DRILLED DATE TO 8.12.1981.

Hole Number	Standing Water Level Measured from geophysical Log		Standing Water Level (m)as measured at various dates.				R.L. m. A.S.L.
	Date Hole Logged	Standing Water Level (m)	24.10.81	31.10.81	29.11.81	8.12.81	
R001	6.10.81	Flowing	0.38	0.61	0.91	-	155
R002	8.10.81	1.2	0.05	0.02	-	0.2	165
R003	10.10.81	1.0	1.27	-	-	1.57	150
R004	12.10.81	4.0	3.76	3.84	-	-	165
C004	3.12.81	7.7	-	-	-	6.6	165
R009	22.10.81	1.1	0.74	0.53			160

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A.8.7 REFERENCES

Knights C.J. 1976 Matthews W.L. A Landslip Study in Tertiary Sediments, Northern Tasmania. Bull International Association Engineering Geology 14.

Matthews W.L. (in Press) The Geology and Groundwater Resources of the Longford Tertiary Basin. Bull. Geol. Surv. Tasm. 59

4609

LEGEND

- Highway, sealed road
- Unsealed road, vehicular track, lane
- Railway
- 'Farville' Homestead
- Drain
- C033 CSR drillhole coal cored
- R009 CSR drillhole chip sampled

5 cm

STATE FOREST

STATE FOREST

WESTBURY

HAGLEY

MEANDER

RIVER

BASS HIGHWAY

WESTERN LINE

Black Sugarloaf Ck

White Flats Ck

Bushy Rivulet

Sugarloaf Ridge

Quamby Brook

Liffey River

Meander River

R062 R063 R065 R066 R076 R003 R077 C064 C064 (P) R064 (P) C019 R026 R088 R082 C020 C020 (P2) C020 (P1) R081 R081 (P2) R081 (P1) R069 R001 R070 R002 R086 C004 C004R R073 C022 R074 R010 C032 R040 C067 C067(P1) C067(P2) R072 R079 R080 R085 R090 R024 R091 R084 C071 R068 R095 R007 R041 C071(P2) C071(P1) C071(P) R006 C033 C033R R023 R025 R014 R078 C075 R075 C075 (P1) R012 R015 R013 R005 R089 R087 R009 R008 R083 R016 R018 R039 R011 R092 R017 R036 R059 C035 R061 C034 R060 EL 20/80

'Hagley Park' 'Kenmore' 'Inglewood' 'Loodaigh' 'Glen Stowell' 'Forkleigh' 'Selbourne' 'Hillcrest' 'Summerville' 'Eyebright' 'Rich Acres' 'Blackwood Vale' 'Glen Vishi' 'The Quantity House' 'Elsdon' 'Summer Hill' 'Meyrtle' 'Heathfield' 'Fourvale' 'Brookville' 'Westfield' 'Red Hills' 'Quamby' 'Clarlee' 'Rosedale' 'Quarry Farm' 'Commercial Lodge' 'Weander Vale' 'Quamby Bend' 'Tyrell Park' 'Surreyside' 'Meadow Lynn' 'Highbrae' 'Chester' 'Rossdyn' 'Inglewood'

Pipers Lagoon

Sheepwash Ck

Brooks Rivulet

Quamby Brook

Liffey River

Meander River

Black Bridge

Rosebank Road

South Brooklyth Road

Echo Avenue

Selbourne Road

Rose Burn Road

Hagley Road

Quamby Road

Meander Valley Road

Black Lane

Brooks Lane

Beverdges Lane

Quarry Lane

Rose Lane

Moore Lane

Westwood Lane

Hillwood Lane

Shuttleworth Rd

Bass Highway

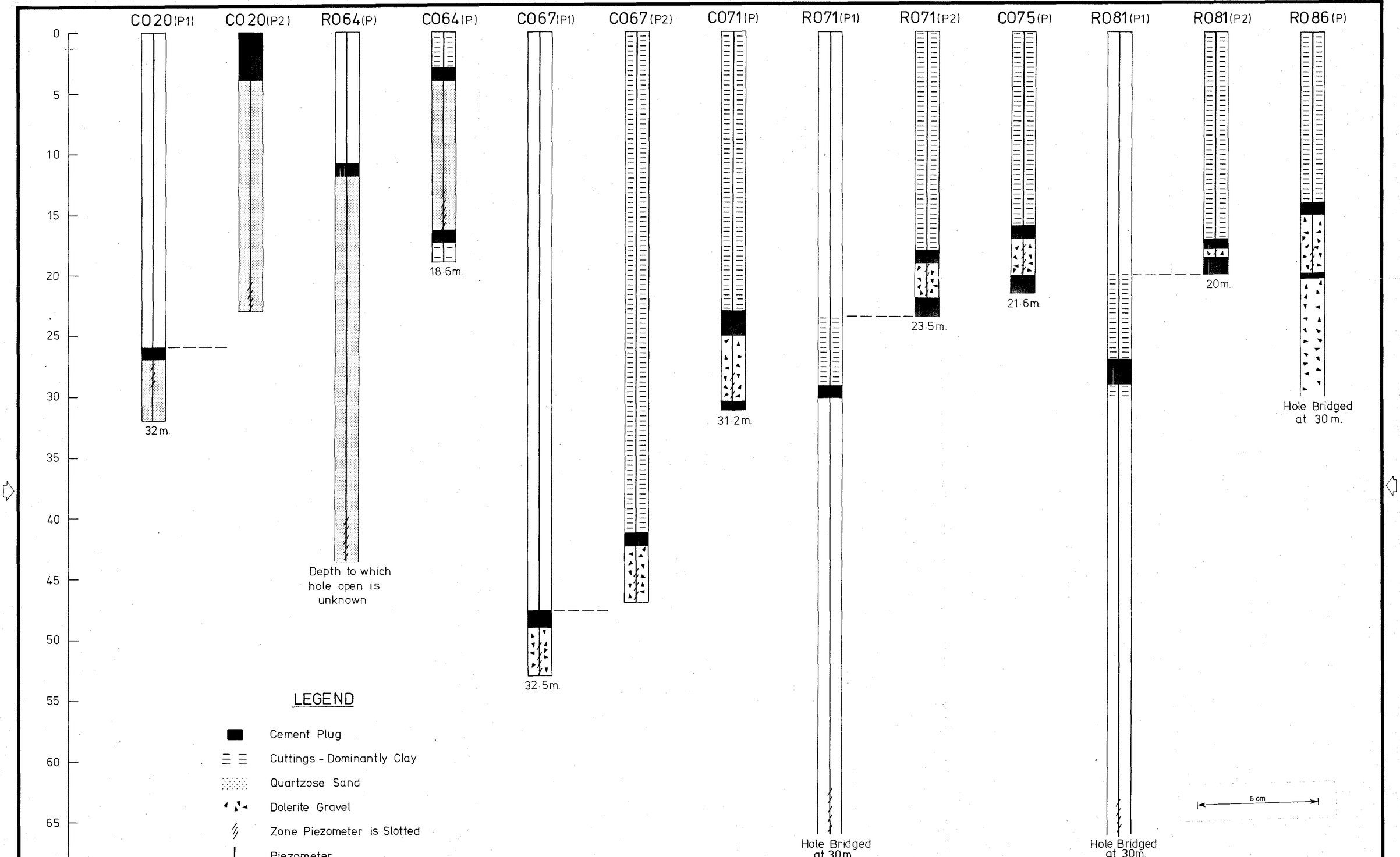
Western Line

Liffey Road

Brooks Road

Elm Park

Beverdges



CSR Limited Coal Division

EXPLORATION AND EVALUATION GROUP

DRAWING	DATE
DRAWN C.J.	July '82
CHECKED	
REVISED	

EL 20/80 LAUNCESTON - WESTBURY AREA
SIMPLIFIED PIEZOMETER DIAGRAMS

SCALE 82-1766. 1:200 V

FIGURE 8

DRAWING No 70020 - 35

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