OPERATOR: DU PONT CONID S.p.A.

WELL: GABBIANO-1

PARTNERS:
BOW VALLEY
KUFPEC
REPSOL
TCPL
TRICENTROL
DU PONT ITALIANA

COMPOSITE WELL LOG 1:500

LOCATION

COUNTRY: ITALY
AREA: OFFSHORE SOUTHEAST SICILY
BLOCK: C.R87-CO
FIELD: NEW FIELD WILDCAT
OFFSHORE
UTM
SPHEROID: INTERNATIONAL
ZONE: 33
CENT. MERID.: 15° E
COORDS:
X: 477,684.3
Y: 4,042,050.0
GEOGRAPHIC (surface)
LAT: 36° 31' 22.883" N
LONG: 14° 45' 02.715" E

ELEVATIONS

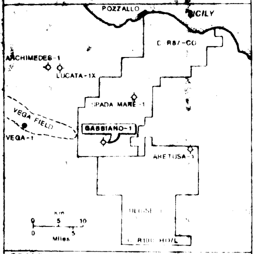
DEPTH UNITS: METERS
KB TO GL/MSL: 25m
GL TO MSL: 0
WATER DEPTH: 114m

TOTAL DEPTH	Measured	TVD
Driller:	3347m	3347m
Logger:	3341m	3341m

DATE SPUDDED: 28 OCTOBER, 1988
TD DATE: 20 DECEMBER, 1988
DATE COMPLETED: 29 DECEMBER, 1988

COMPLETION STATUS: DRY HOLE
PLUGGED & ABANDONED

LOCATION PLAT:



SCALE-1:

CONOCO GEOLOGISTS

E.BERENDSON, Trainee
W.GREB, Contractor
D.VAN HART, Contractor
J.TURBEVILLE

CONOCO ENGINEERS

B.BAKER
G.MO GOUGH
B.ROSE
K.TIGARD

DRILLING CONTRACTOR & RIG

GLOBAL MARINE BISCAY 1

WIRELINE LOGGING

CONTRACTOR: SCHLUMBERGER **UNIT # 141**
ENGINEERS: F.SUMABAT - all jobs

MUDLOGGING

CONTRACTOR: EXLOG **UNIT # 239**
PERSONNEL: LOGGING T. BALL, A. BANKS, J. BESLEY, S. LITTLEFIELD, GEMDAS, S. BOYD, C. SMITH, N. SPENCE

VERTICAL SEISMIC PROFILE

CONTRACTOR: SCHLUMBERGER

WIRELINE LOGS

JOB #	SUITE	RUN #	INTERVAL
1	DIL-SLS-GR-SP-CAL	1	100 - 1827m
2	VSP	1	760 - 3084m (91 LEVELS)
3	DIL-SLS-GR-SP	2	1810 - 3339m
3	LDL-CNL-GR-CAL	1	1810 - 3340m
3	SHDT-GR	1	1810 - 3338m
3	CST	1	1890 - 3332m (30 SHOTS)

BIT SIZE	INTERVAL
26" w/ 36" HOLE OPENER	138.7 - 196.3m
26"	196.3 - 747m
17 1/2"	747 - 1839m
12 1/4"	1839 - 3347m

CASING

SIZE	SHOE	TYPE & CEMENT
30"	196	310 lb/ft X-52 VETCO 870 SX CLASS 'G'
20"	732	94 lb/ft X-56 VETCO RL-4S 2320 SX CLASS 'G' 750 SX NEAT
13 3/8"	1810	68 lb/ft N-80 BUTTRESS 2422 SX CLASS G

MUD TYPE	INTERVAL
SEA WATER WITH HI VIS SWEEPS	139 - 747m
PHPA POLYMER	747 - 3347m

CONVENTIONAL CORE DATA

CORE #	FORMATION	LOG INTERVAL	ADJ TO GR	CUT	REC.	REC. %

PLUG NO.	CEMENT	PLUG/RETAINER
1	170 SX CLASS 'G'	2430 - 2380m, PLUG
2	315 SX CLASS G	1860 - 1760m, PLUG 1753m BRIDGE PLUG
3	85 SX CLASS G	1753 - 1695m
4	250 SX	175 - SEAFLOOR SEABED CLEAR

AUTHORS:
W. GREB

APPROVED:

REMARKS:

D. VAN HART	
DRAFTED BY: J. DRAGER G. MILLER	**DATE:** 1-31-89 2 9 89

GEOLOGIC DATA

PRIMARY LITHOLOGIC SYMBOLS

CLASTICS

- sand, sandstone
- conglomerate
- breccia
- shale, clay, claystone
- silt, siltstone

EVAPORITES

- anhydrite/gypsum
- salt undiff

CARBONATES

- limestone
- mudstone
- wackestone
- packstone
- grainstone
- boundstone
- dolomite
- marl

IGNEOUS AND METAMORPHIC

- igneous intrusive
- metamorphic
- volcanics: tuff
- volcanics: basalt

MISCELLANEOUS

- coal

ACCESSORY SYMBOLS

- argillaceous
- arenaceous
- rudaceous
- carbonaceous
- calcareous
- dolomitic
- anhydritic
- cherty
- glauconitic
- micaceous
- kaolinitic
- pellets
- oolites
- pyritic
- ferruginous
- intraclasts
- lithoclasts
- bituminous
- bioclasts
- pelecypods
- rudists
- gastropods
- brachiopods
- echinoids
- crinoids
- bryozoa
- forams
- stromatolites
- corals

ENGINEERING DATA

GENERAL

BRIDGE PLUG OR DRILLABLE PLUG	☒
CEMENT PLUG	☒
CASING SHOE	◢
BOREHOLE DEVIATION	1/2° N10W

TESTS

DRILL-STEM TESTS	① ①A	REGULAR RE-RUN
PERFORATED INTERVALS		PRODUCTION TESTED PRODUCTION TESTED AND SQUEEZED
REPEAT FORMATION TEST	←#	FLUID SAMPLE

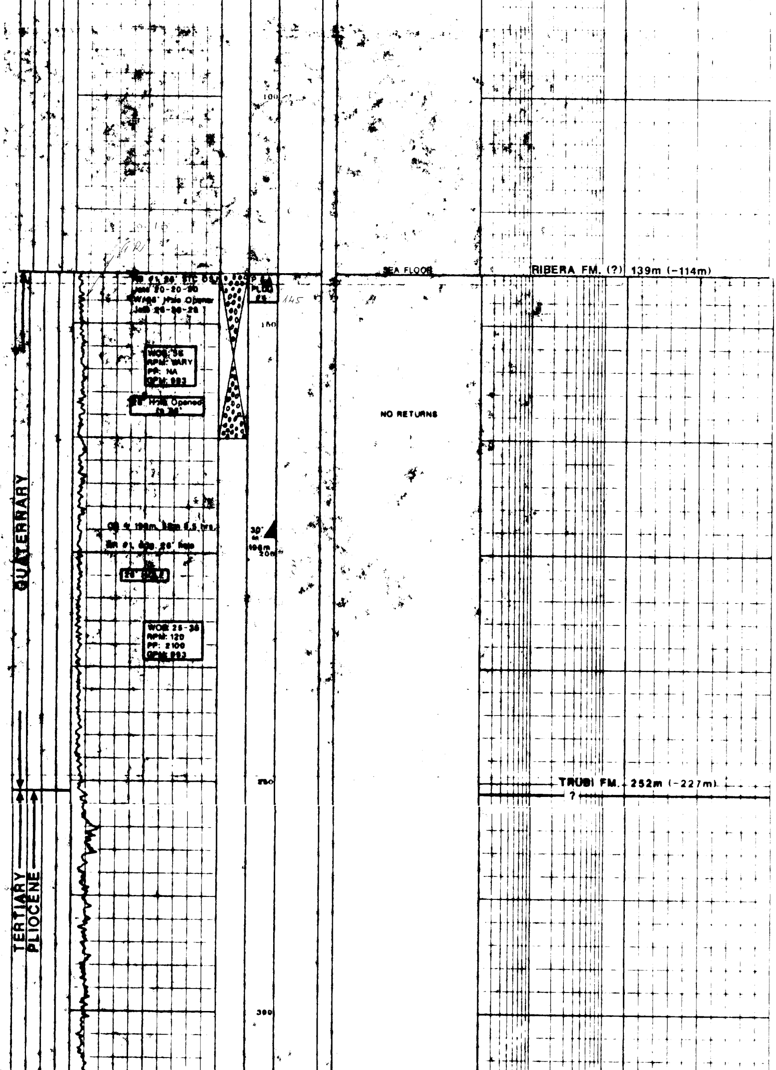
CORE DATA

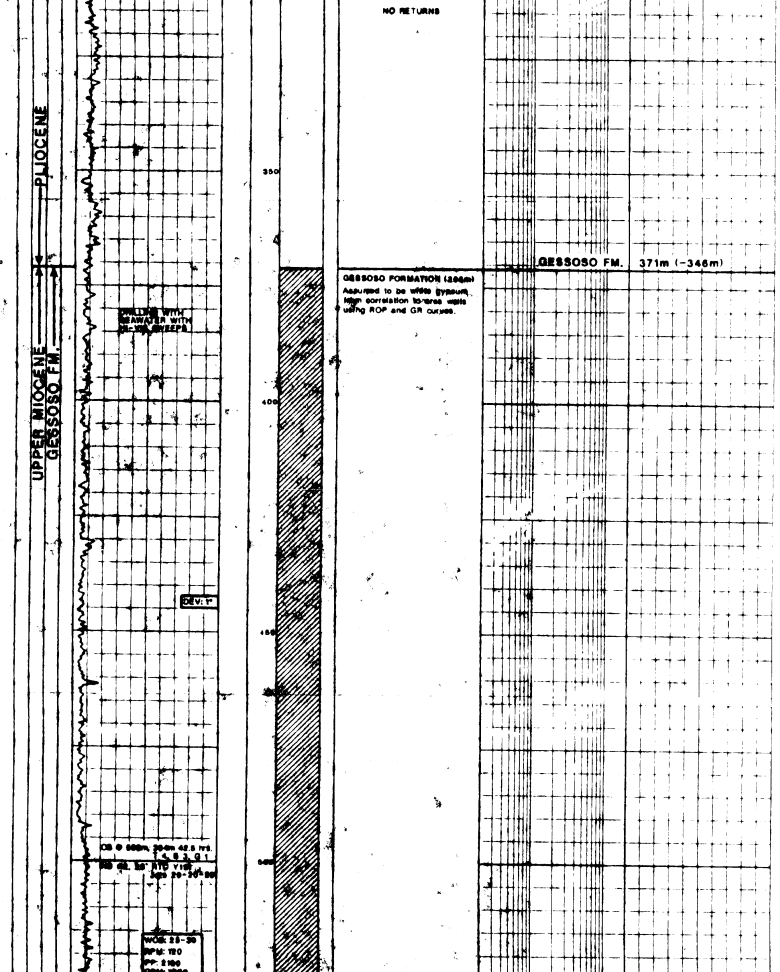
CONVENTIONAL CORES	RECOVERED	■
	NOT RECOVERED	☒
SIDEWALL CORES	RECOVERED	#●→
	NOT RECOVERED	#○→
	ROTARY SWC	#R○→

SHOW DATA

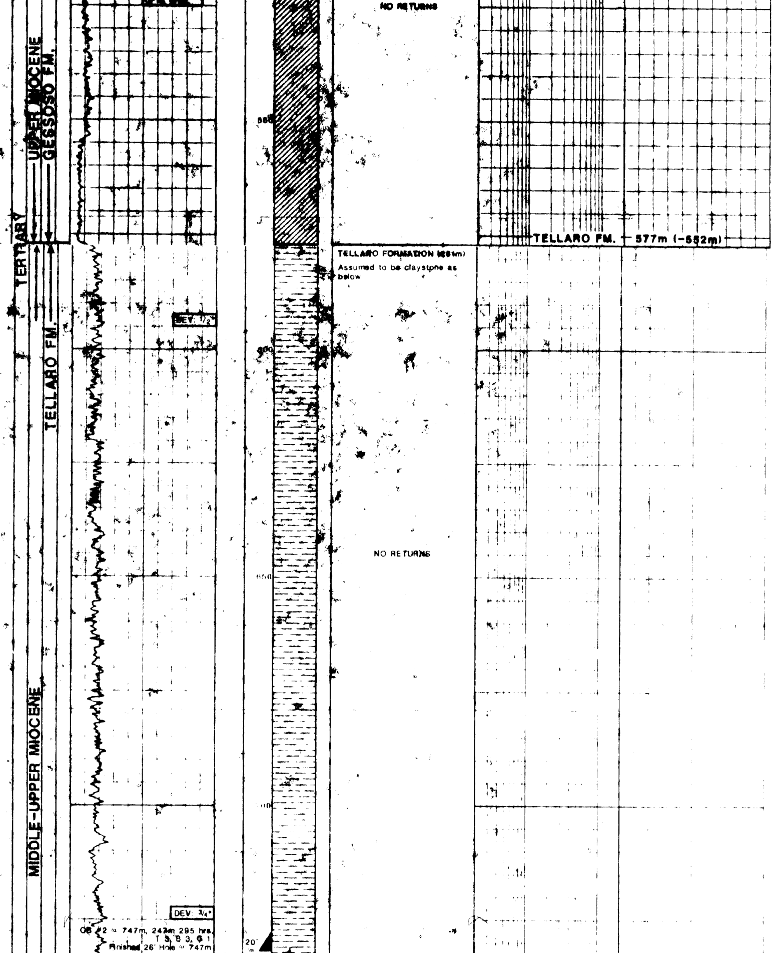
●	GOOD OIL SHOW (continuous)
◒	FAIR OIL SHOW (discontinuous)
○	POOR OIL SHOW
☼	GAS SHOW
✹	HIGH GOR OIL OR CONDENSATE

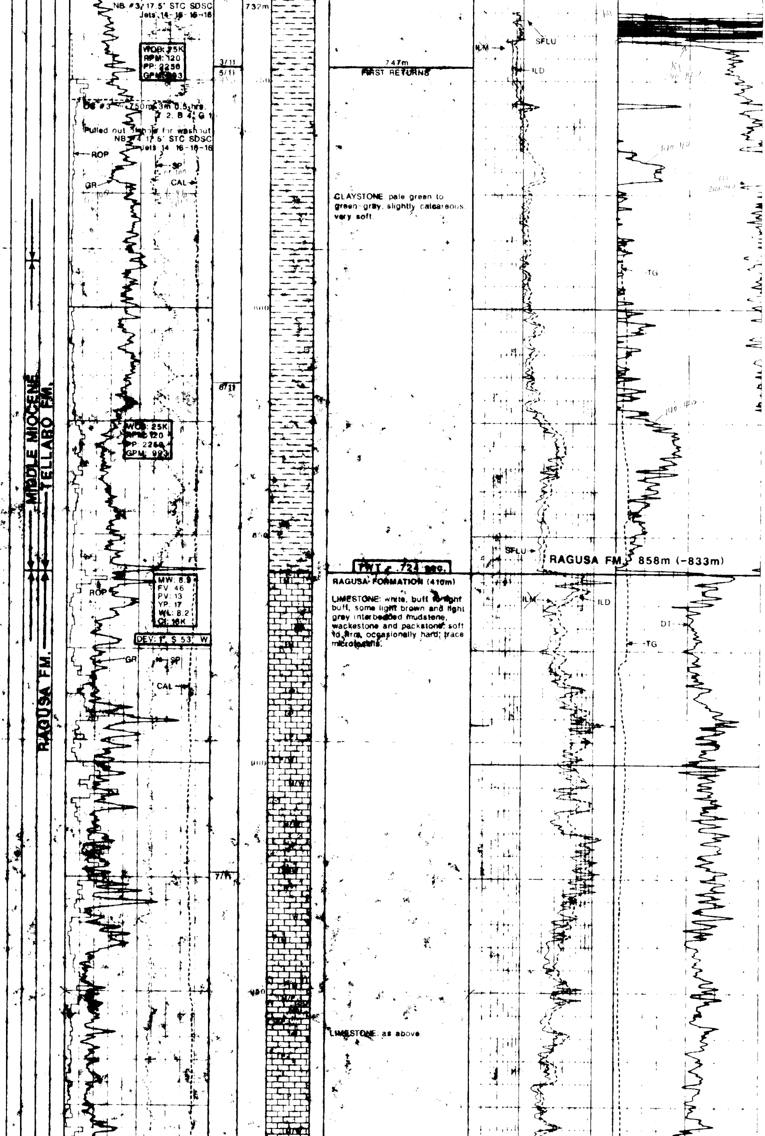
SYSTEM	SERIES	FORMATION	MEMBER / UNIT	GR API UNITS 0 — 100 SP (mv) -200 — 0 ROP (min./ft.) 0 — 100 CAL (inches) 6 — 26	GENERAL ENGINEERING	DEPTH (m, RKB) & SWC's	LITHOLOGY	SHOW DATA	LITHOLOGY DESCRIPTIONS	RESISTIVITY OHMM .2 SFLU 20 2 ILM 20 .2 ILD 20 20 SFLU 2000 20 ILM 2000 20 ILD 2000	DT (μs/ft) 140 — 40 TOTAL GAS (50 units = 1%) 0 — 25
									KB: 25m		
									MEAN SEA LEVEL 25m (0)		
						50					





GESSOSO FORMATION (296m)
Assumed to be white gypsum, high correlation to area wells using ROP and GR curves.





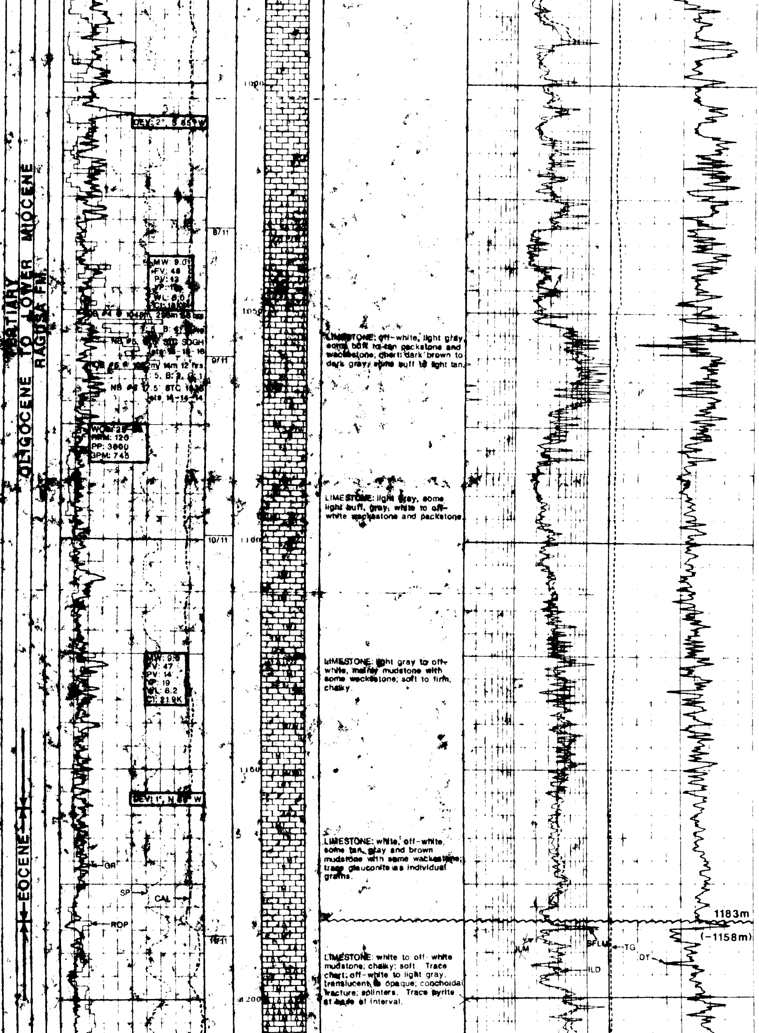
747m
FIRST RETURNS

CLAYSTONE: pale green to green-gray, slightly calcareous, very soft.

RAGUSA FORMATION (410m)

LIMESTONE: white, buff to light buff, some light brown and light grey interbedded mudstone, wackestone and packstone; soft to firm, occasionally hard; trace microfossils.

LIMESTONE: as above.



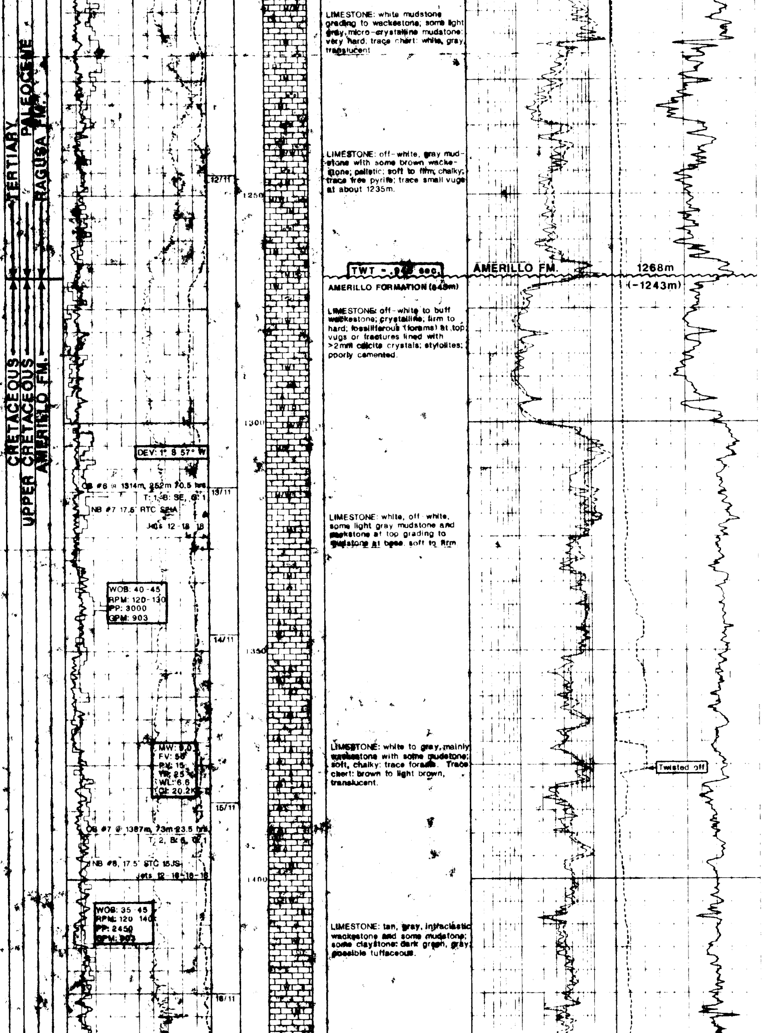
LIMESTONE: off-white, light gray, some buff to tan packstone and wackestone; chert: dark brown to dark gray; some buff to light tan.

LIMESTONE: light gray, some light buff, gray, white to off-white wackestone and packstone.

LIMESTONE: light gray to off-white, mainly mudstone with some wackestone; soft to firm; chalky.

LIMESTONE: white, off-white, some tan, gray and brown mudstone with some wackestone; trace glauconite as individual grains.

LIMESTONE: white to off-white mudstone; chalky; soft. Trace chert: off-white to light gray, translucent to opaque; conchoidal fracture; splinters. Trace pyrite at base of interval.



LIMESTONE: white mudstone grading to wackestone; some light gray, micro-crystalline mudstone: very hard; trace chert: white, gray, translucent

LIMESTONE: off-white, gray mudstone with some brown wackestone; pelletic; soft to firm; chalky; trace free pyrite; trace small vugs at about 1235m.

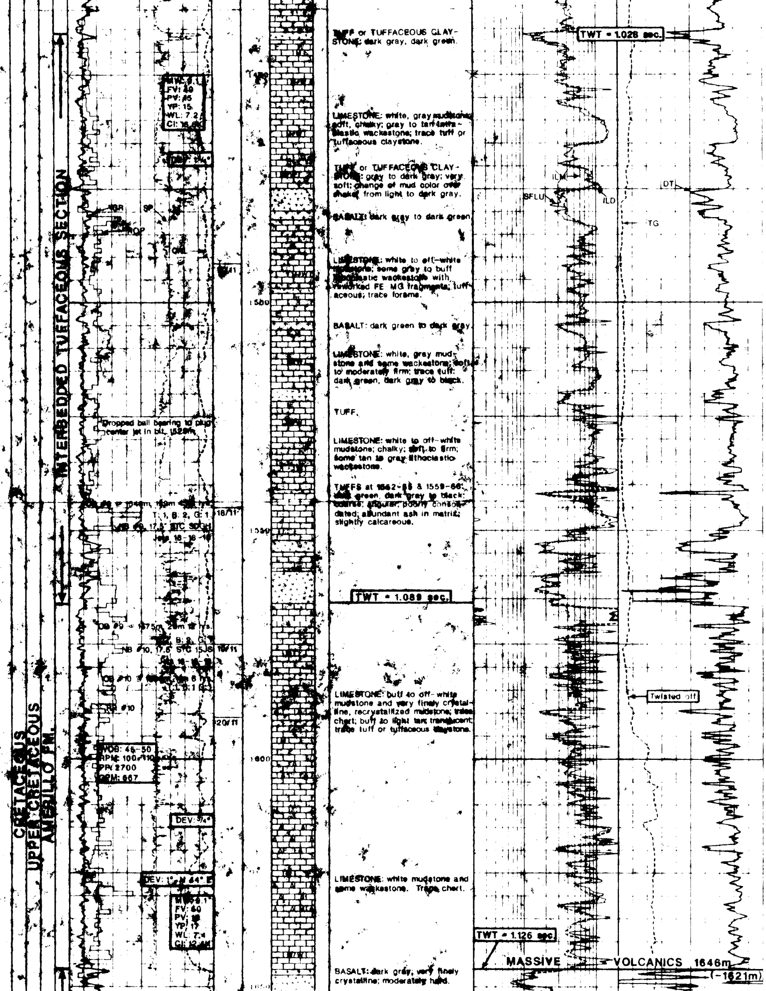
AMERILLO FORMATION (8[illegible]m)

LIMESTONE: off-white to buff wackestone; crystalline; firm to hard; fossiliferous (forams) at top; vugs or fractures lined with >2mm calcite crystals; stylolites; poorly cemented.

LIMESTONE: white, off white, some light gray mudstone and wackestone at top grading to mudstone at base. soft to firm

LIMESTONE: white to gray, mainly wackestone with some mudstone; soft, chalky; trace forams. Trace chert: brown to light brown, translucent.

LIMESTONE: tan, gray, intraclastic wackestone and some mudstone; some claystone: dark green, gray; possible tuffaceous.



TUFF or TUFFACEOUS CLAYSTONE: dark gray, dark green.

LIMESTONE: white, gray mudstone; soft, chalky; gray to tan lithoclastic wackestone; trace tuff or tuffaceous claystone.

TUFF or TUFFACEOUS CLAYSTONE: gray to dark gray; very soft; change of mud color over shaker from light to dark gray.

BASALT: dark gray to dark green.

LIMESTONE: white to off-white mudstone; some gray to buff lithoclastic wackestone with reworked FE MG fragments; tuffaceous; trace forams.

BASALT: dark green to dark gray.

LIMESTONE: white, gray mudstone and some wackestone; soft to moderately firm; trace tuff: dark green, dark gray to black.

TUFF.

LIMESTONE: white to off-white mudstone; chalky; soft to firm; some tan to gray lithoclastic wackestone.

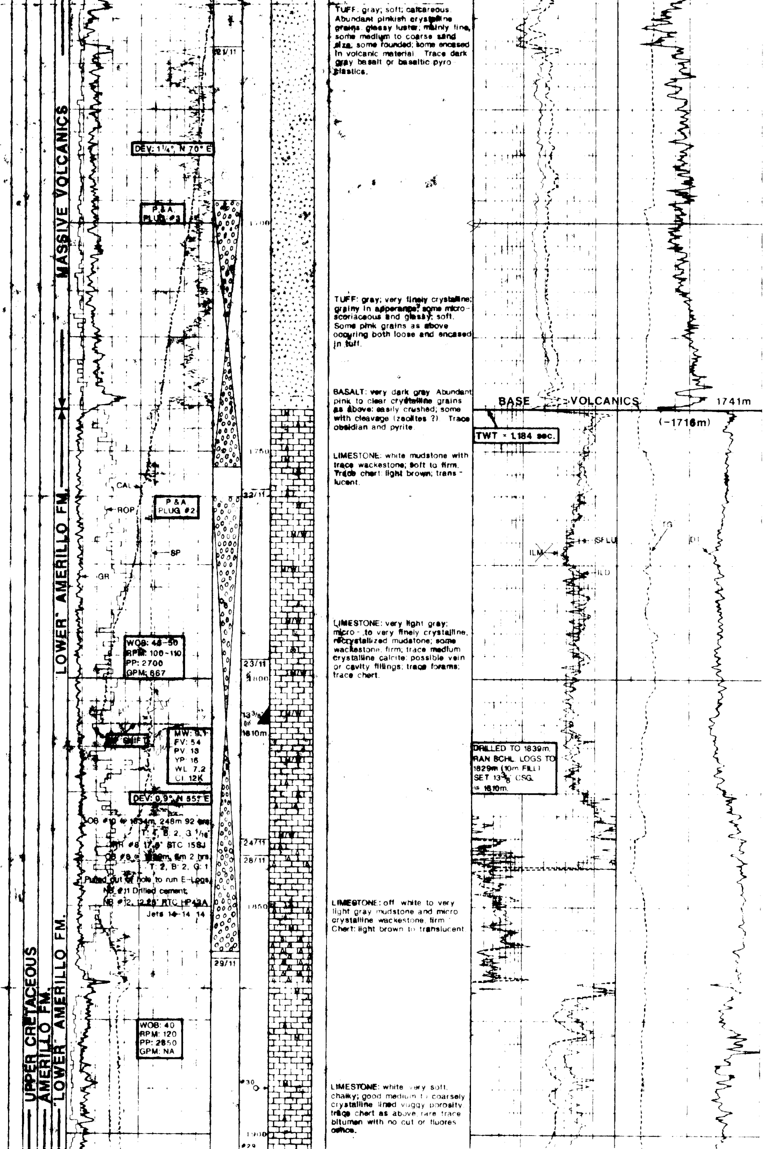
TUFFS at 1542-45 & 1559-66: dark green, dark gray to black; coarse; angular; poorly consolidated; abundant ash in matrix; slightly calcareous.

TWT = 1.089 sec.

LIMESTONE: buff to off-white mudstone and very finely crystalline, recrystallized mudstone; trace chert; buff to light tan translucent; trace tuff or tuffaceous claystone.

LIMESTONE: white mudstone and some wackestone. Trace chert.

BASALT: dark gray, very finely crystalline; moderately hard.



TUFF: gray; soft; calcareous. Abundant pinkish crystalline grains. glassy luster; mainly fine, some medium to coarse sand size, some rounded; some encased in volcanic material. Trace dark gray basalt or basaltic pyroclastics.

TUFF: gray; very finely crystalline; grainy in apperance; some microscoriaceous and glassy; soft. Some pink grains as above occuring both loose and encased in tuff.

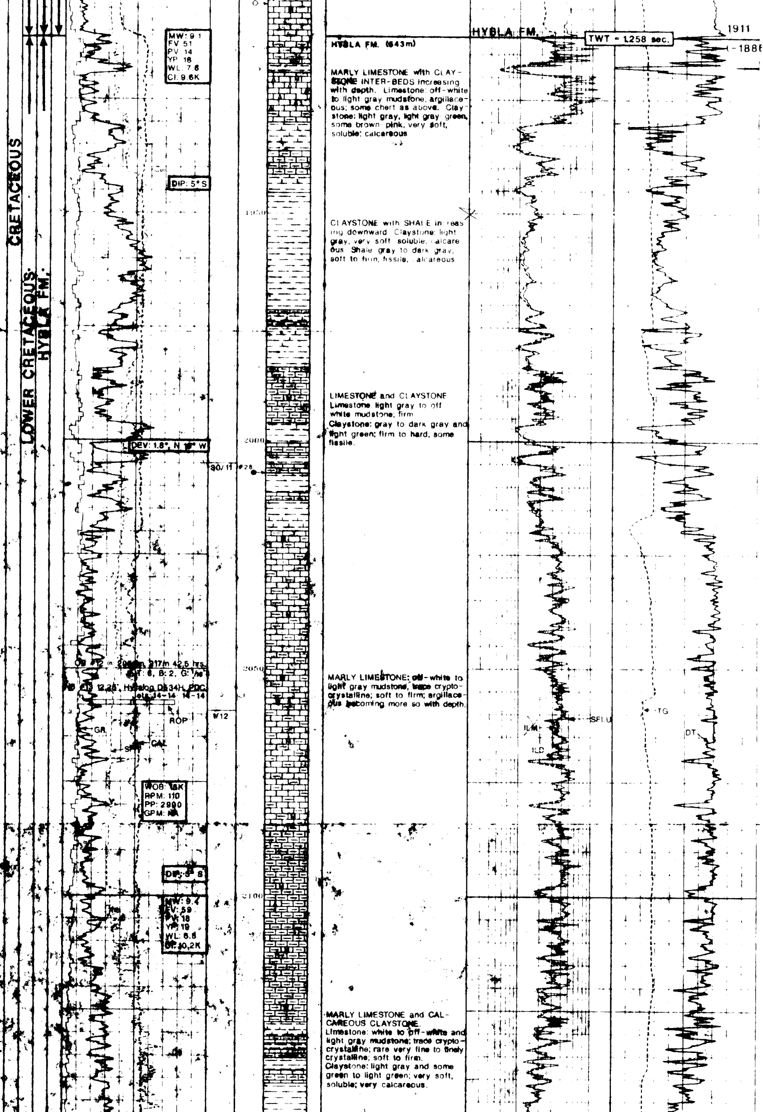
BASALT: very dark grey. Abundant pink to clear crystalline grains as above: easily crushed; some with cleavage (zeolites ?). Trace obsidian and pyrite.

LIMESTONE: white mudstone with trace wackestone; soft to firm. Trace chert: light brown; translucent.

LIMESTONE: very light gray; micro- to very finely crystalline, recrystallized mudstone; some wackestone, firm; trace medium crystalline calcite: possible vein or cavity fillings; trace forams; trace chert.

LIMESTONE: off white to very light gray mudstone and micro crystalline wackestone, firm. Chert: light brown to translucent.

LIMESTONE: white very soft, chalky; good medium to coarsely crystalline lined vuggy porosity. trace chert as above, rare trace bitumen with no cut or fluorescence.



HYBLA FM. (643m)

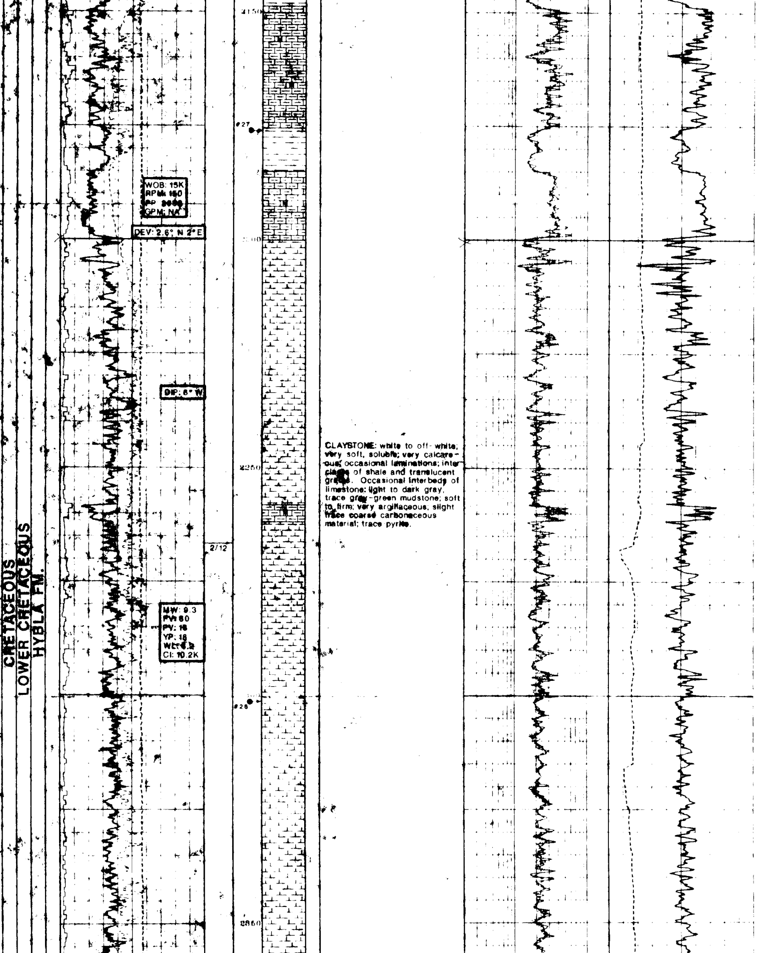
MARLY LIMESTONE with CLAYSTONE INTER-BEDS increasing with depth. Limestone: off-white to light gray mudstone; argillaceous; some chert as above. Claystone: light gray, light gray green, some brown pink, very soft, soluble; calcareous

CLAYSTONE with SHALE increasing downward. Claystone: light gray, very soft, soluble, calcareous. Shale gray to dark gray; soft to firm, fissile, calcareous

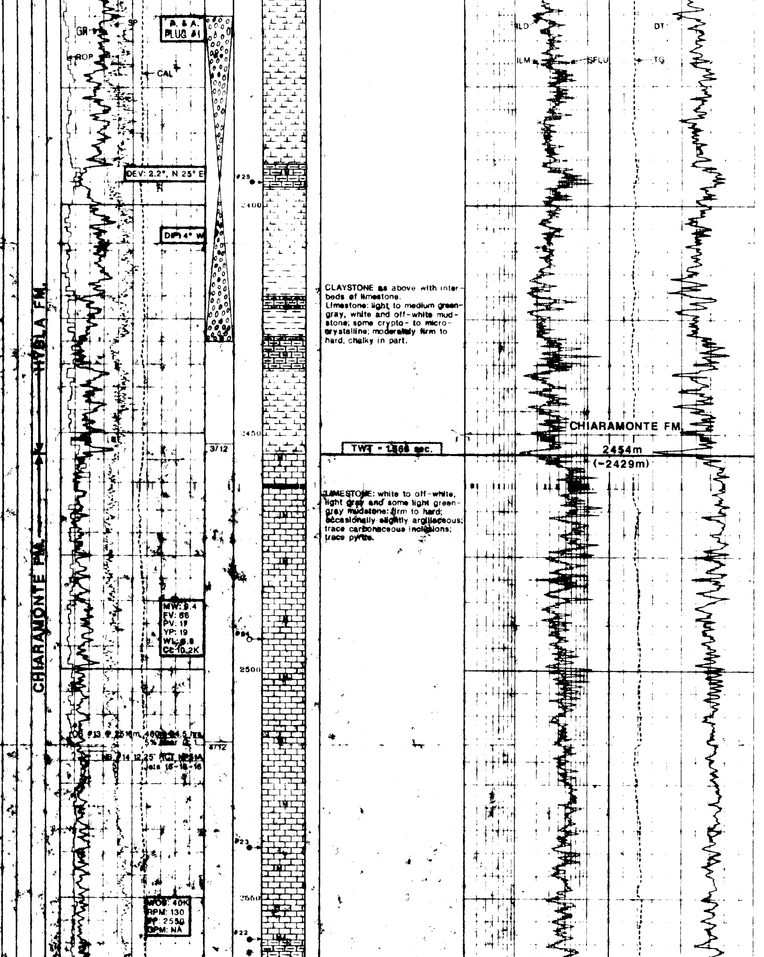
LIMESTONE and CLAYSTONE
Limestone: light gray to off white mudstone; firm
Claystone: gray to dark gray and light green; firm to hard; some fissile.

MARLY LIMESTONE: off-white to light gray mudstone, trace cryptocrystalline; soft to firm; argillaceous becoming more so with depth.

MARLY LIMESTONE and CALCAREOUS CLAYSTONE.
Limestone: white to off-white and light gray mudstone; trace cryptocrystalline; rare very fine to finely crystalline; soft to firm.
Claystone: light gray and some green to light green; very soft, soluble; very calcareous.

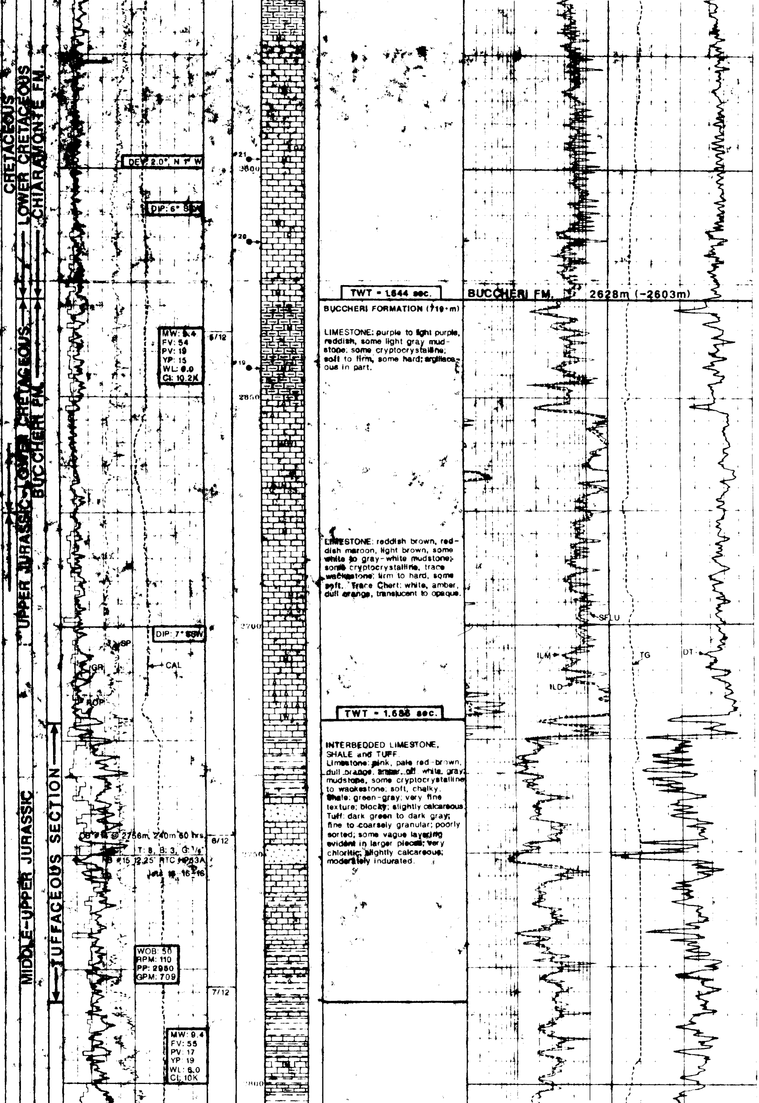


CLAYSTONE: white to off-white; very soft, soluble; very calcareous; occasional laminations; interclasts of shale and translucent grains. Occasional interbeds of limestone; light to dark gray, trace gray-green mudstone; soft to firm; very argillaceous, slight trace coarse carbonaceous material; trace pyrite.



CLAYSTONE as above with interbeds of limestone.
Limestone: light to medium green-gray, white and off-white mudstone; some crypto- to microcrystalline; moderately firm to hard; chalky in part.

LIMESTONE: white to off-white, light gray and some light green-gray mudstone: firm to hard; occasionally slightly argillaceous; trace carbonaceous inclusions; trace pyrite.

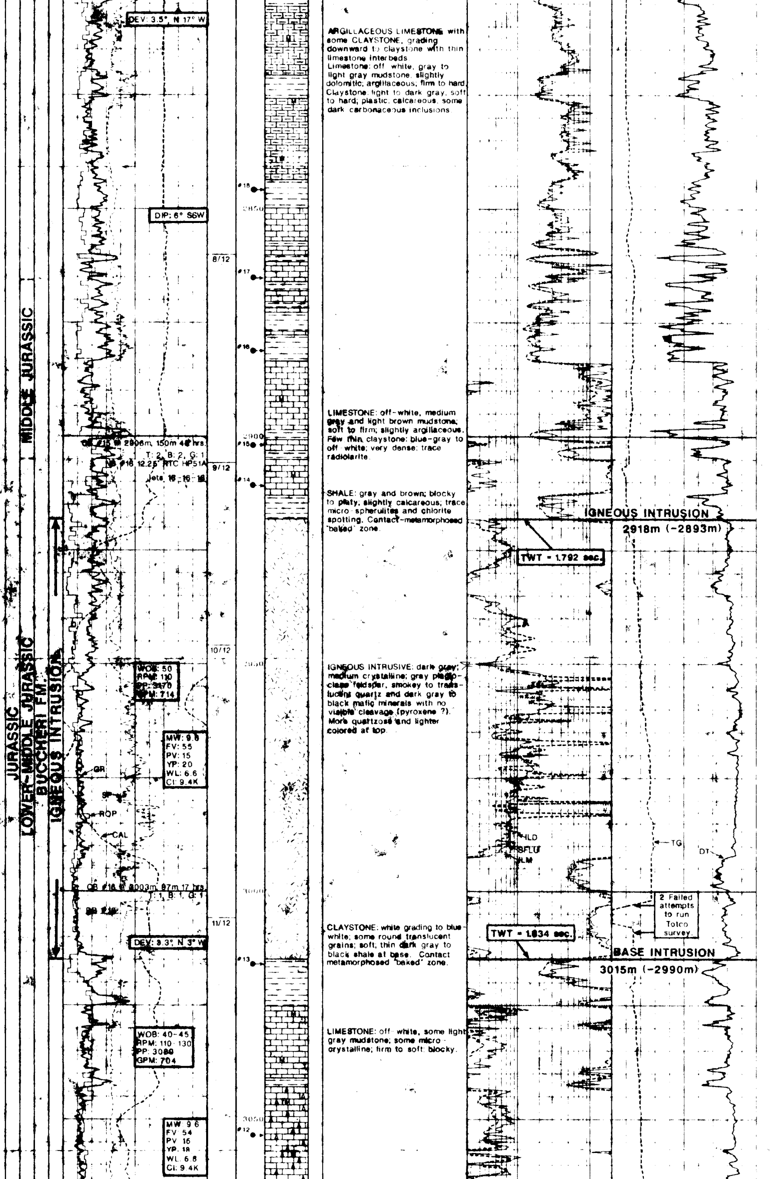


BUCCHERI FORMATION (119+m)

LIMESTONE: purple to light purple, reddish, some light gray mudstone; some cryptocrystalline; soft to firm, some hard; argillaceous in part.

LIMESTONE: reddish brown, reddish maroon, light brown, some white to gray-white mudstone; some cryptocrystalline, trace wackestone; firm to hard, some soft. Trace Chert: white, amber, dull orange, translucent to opaque.

INTERBEDDED LIMESTONE, SHALE and TUFF.
Limestone: pink, pale red-brown, dull orange, amber, off white, gray; mudstone, some cryptocrystalline to wackestone; soft, chalky.
Shale: green-gray; very fine texture; blocky; slightly calcareous.
Tuff: dark green to dark gray; fine to coarsely granular; poorly sorted; some vague layering evident in larger pieces; very chloritic; slightly calcareous; moderately indurated.



ARGILLACEOUS LIMESTONE with some CLAYSTONE, grading downward to claystone with thin limestone interbeds.
Limestone: off white, gray to light gray mudstone, slightly dolomitic; argillaceous; firm to hard.
Claystone: light to dark gray, soft to hard; plastic; calcareous, some dark carbonaceous inclusions.

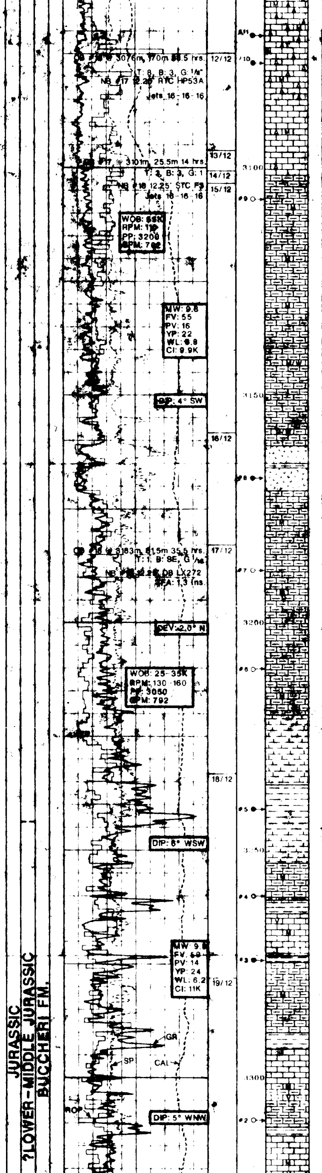
LIMESTONE: off-white, medium gray and light brown mudstone; soft to firm; slightly argillaceous. Few thin claystone: blue-gray to off white; very dense; trace radiolarite.

SHALE: gray and brown; blocky to platy; slightly calcareous; trace micro-spherulites and chlorite spotting. Contact-metamorphosed "baked" zone.

IGNEOUS INTRUSIVE: dark gray; medium crystalline; gray plagioclase feldspar, smokey to translucent quartz and dark gray to black mafic minerals with no visible cleavage (pyroxene ?). More quartzose and lighter colored at top.

CLAYSTONE: white grading to blue-white; some round translucent grains; soft; thin dark gray to black shale at base. Contact metamorphosed "baked" zone.

LIMESTONE: off white, some light gray mudstone; some micro-crystalline; firm to soft; blocky.



LIMESTONE: brown to buff grading to light gray and off white mudstone; some cryptocrystalline; hard; sub-blocky to subplaty; moderately firm to hard, brittle. Abundant chert: tan, light gray, trace mottled.

LIMESTONE: off-white, white, some light brown to brown-gray mudstone; some cryptocrystalline; soft to slightly firm; soluble; chalky, argillaceous; occasional carbonaceous laminations; section becoming more argillaceous with depth.

TUFF: gray, dark gray to black; medium-sized glassy shards and fused crystals; abundant mafic minerals.

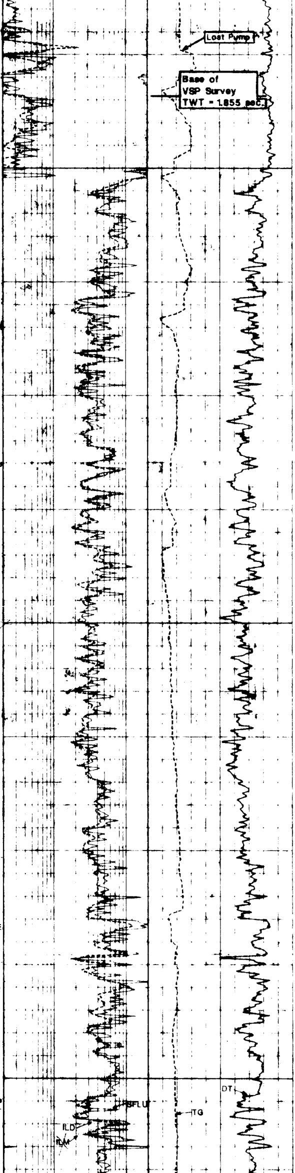
LIMESTONE: off white to light gray mudstone, argillaceous; chalky; soft.

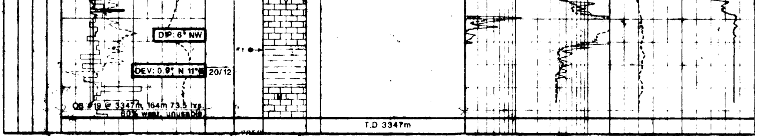
CLAYSTONE: light brown to gray; soft to firm; slightly fissile, slightly splintery; earthy with carbonaceous inclusions; slightly calcareous.

CLAYSTONE: gray, green to dark green; soft; argillaceous; slightly calcareous; some volcanic grains.

LIMESTONE with thin CLAYSTONE INTERBEDS
Limestone: white, off white, tan, light gray and light brown mudstone; firm to hard; slightly argillaceous and chalky. Trace claystone: green, gray, brown, some dark gray to black; waxey; slightly fissile and splintery; slightly calcareous.

LIMESTONE with CLAYSTONE INTERBEDS
Limestone: light gray to off white mudstone; firm to hard; argillaceous in part; black carbonaceous inclusions. Claystone: gray to dark gray and green-gray; soft to firm; platy; calcareous; silty. Trace volcanics: greenish white to brownish white; speckled.





SIDEWALL CORE SUMMARY

LOGGING JOB: No. 3

DATE: December 21, 1988

2-8-89

CORE NO.	DEPTH (METERS)	RESULT	LITHOLOGY/SHOWS	CORE NO.	DEPTH (METERS)	RESULT	LITHOLOGY/SHOWS
30	1890	LOST BULLET		15	2902		LIMESTONE: medium-dark gray mudstone grading to wackestone; soft to firm; brittle; argillaceous in part; no porosity; no shows.
29	1904	LOST BULLET		14	2911		LIMESTONE: medium gray to light brown mudstone; soft to firm; slightly argillaceous; no porosity, no shows.
28	2007		CLAYSTONE: light green, light gray; soft; sticky, calcareous.	13	3016		ALTERED CLAYSTONE: white grading to blue white with round translucent grains; chalky texture; soft; no porosity: no shows.
27	2176		CLAYSTONE: light gray, light brown; soft; sticky; calcareous; some dark inclusions.	12	3053		LIMESTONE: off-white, buff mudstone; moderately hard, brittle, trace volcanics; no porosity; no shows.
26	2301		CLAYSTONE: light gray, light brown; soft; sticky; calcareous; trace coarse calcite fragments.	11	3072		LIMESTONE: off-white to buff mudstone; moderately hard, brittle, trace volcanics; no porosity; no shows.
25	2395		LIMESTONE: off-white, grading to brown mudstone; soft; argillaceous, sticky; dense; plastic; no porosity; no shows.	10	3077		LIMESTONE: off-white mudstone; moderately firm to hard; slightly argillaceous with associated volcanics; no porosity; no shows.
24	2493	LOST BULLET		9	3107	LOST BULLET	
23	2539		LIMESTONE: white, off-white mudstone; soft, some firm to hard; sticky; chalky in part; no porosity; no shows.	8	3168		VOLCANICS: medium to dark gray to black; medium size glassy shards and fused crystals; abundant mafic minerals.
22	2559		LIMESTONE: white to off-white mudstone; soft; argillaceous; chalky; with carbonaceous laminations; no porosity; no shows.	7	3189	LOST BULLET	
21	2598		CLAYSTONE; very light gray; subfissile; calcareous; micropyrite; pyrite-filled microfractures.	6	3201	LOST BULLET	
20	2616		LIMESTONE: white, off-white, some light gray, mudstone; soft, chalky; no porosity; no shows.	5	3241		CLAYSTONE: medium gray, medium to dark green; soft; argillaceous; slightly calcareous; volcanic grains.
19	2643		LIMESTONE: white to gray-white mudstone grading to wackestone; soft to firm; some dense; no porosity; no porosity; no shows.	4	3260	LOST BULLET	
18	2846		CLAYSTONE: light to medium gray; soft; sticky; plastic; moderately calcareous; black carbonaceous inclusions	3	3274		CLAYSTONE: dark gray to black; form, dense; some pyritic inclusions; silty in part; very carbonaceous
17	2865		LIMESTONE: off-white, light brown, gray and tan mudstone; soft to firm; chalky; brittle; no porosity, no shows.	2	3309	LOST BULLET	
16	2881		CLAYSTONE: medium gray; very soft, slightly calcareous; plastic; dense.	1	3332		LIMESTONE: light gray mudstone; firm to hard; argillaceous in part; with black carbonaceous inclusions; no porosity, no shows.