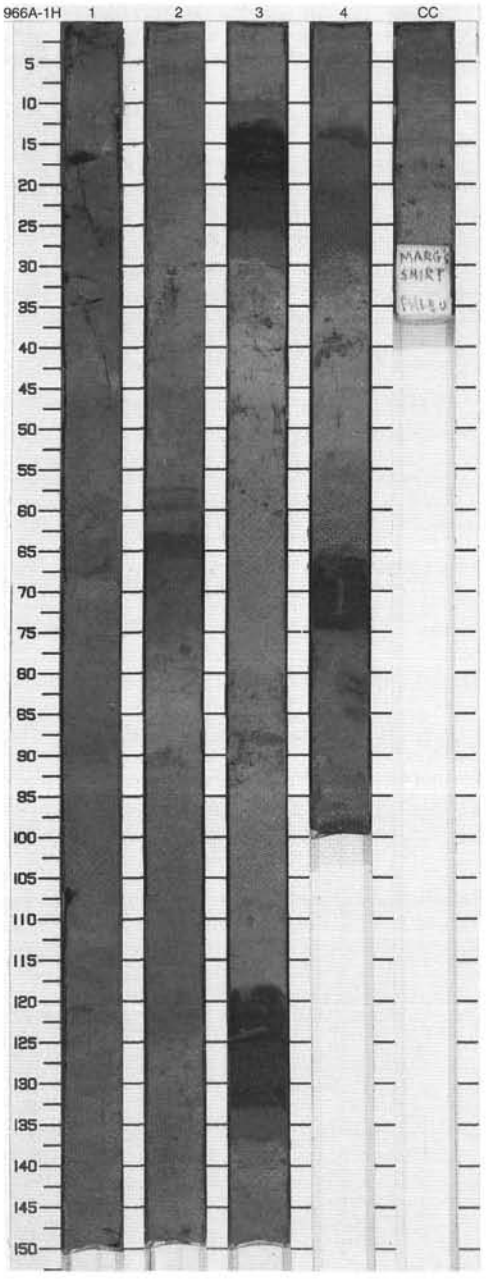
SITE 966 HOLE A CORE 1H CORED 0.0 - 5.8 mbsf

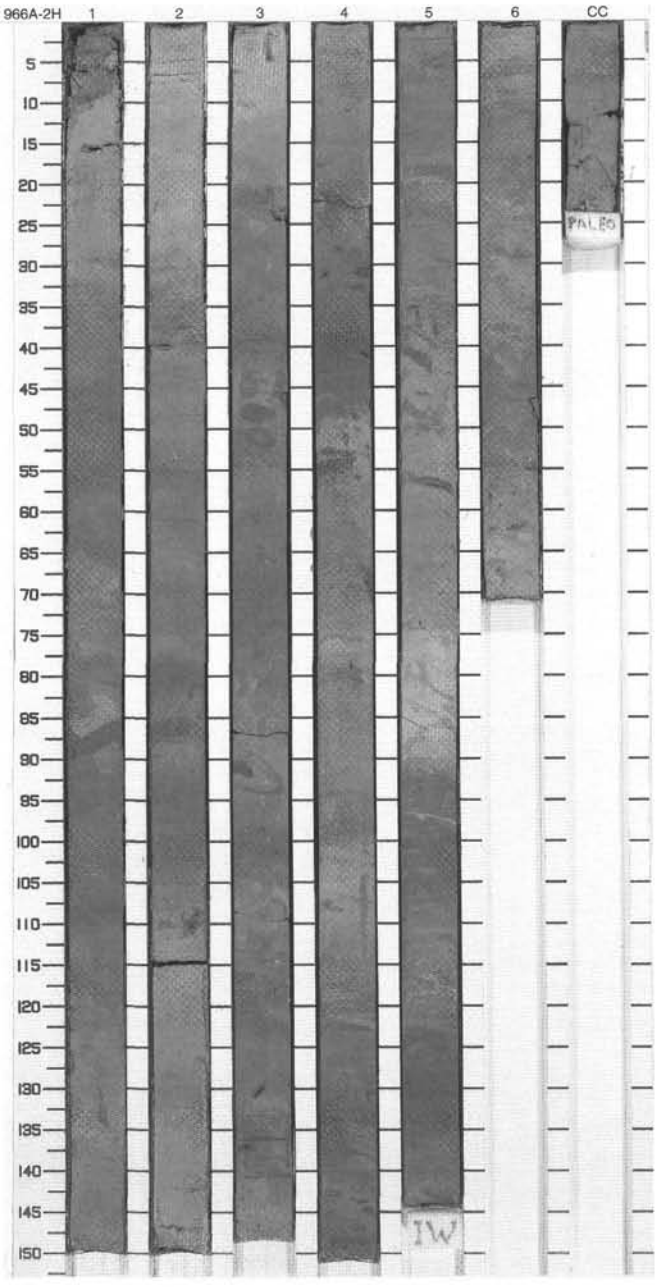
GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 20	0 50 100	1–5		1, 2, 3, 4, CC	late Pleistocene–Holocene	A		S, S, S, S, S, M	10YR 6/3 To 5Y 6/3	CLAYEY NANNOFOSSIL OOZE Major Lithology: The dominant sediment in this core is CLAYEY NANNOFOSSIL OOZE gradationally color banded at meter intervals through browns and grays (10YR 6/3 to 5Y 6/3). Minor Lithologies: Six SAPROPELS, which are less than 10 cm thick, significantly burrowed, and with diffuse boundaries, occur throughout the core. Several thin ASH horizons are scattered through the core. General Description: The sediments in this core are heavily bioturbated throughout.

[1]Instrument units.



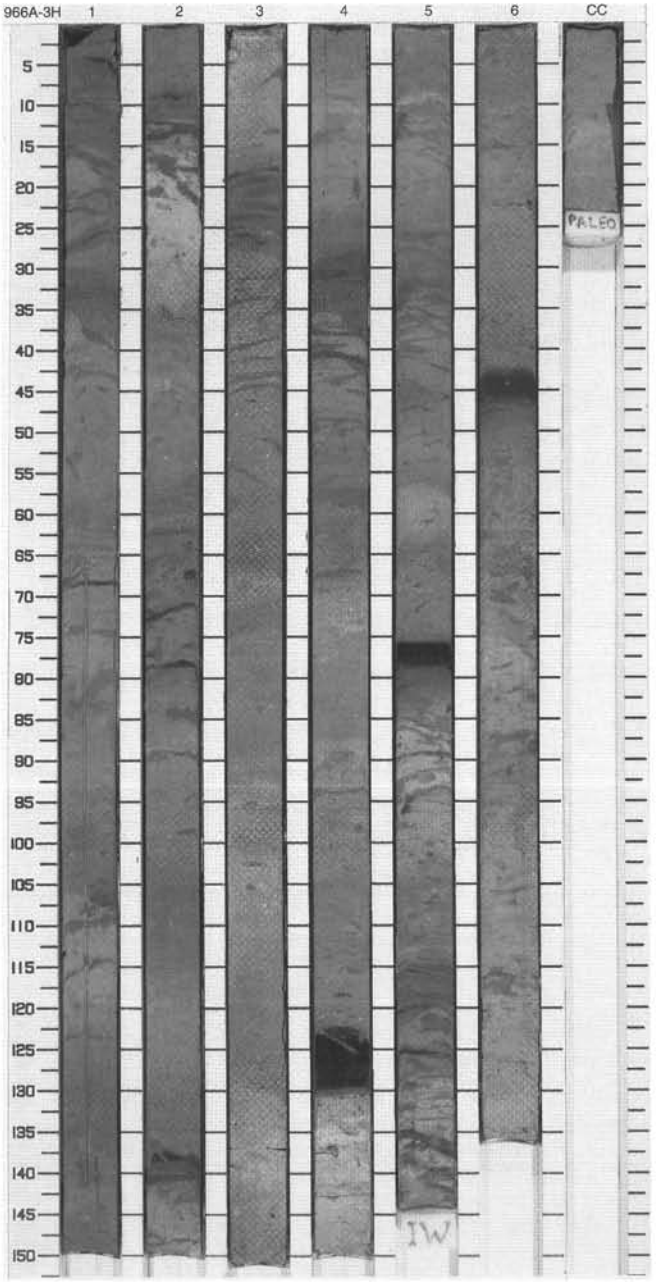
SITE 966 HOLE A CORE 2H CORED 5.8 - 15.3 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 20	−10 0 100	1–8		1–6, CC	middle Pleistocene–late Pleistocene				10YR 6/8 To 5Y 6/2	CLAYEY NANNOFOSSIL OOZE Major Lithology: The sediment in this core is CLAYEY NANNOFOSSIL OOZE, color banded on a meter scale through browns and grays (10YR 6/8 to 5Y 6/2). General Description: The sediments in this core are extensively bioturbated throughout, with numerous patches of foraminifers and occasional pteropod shells.



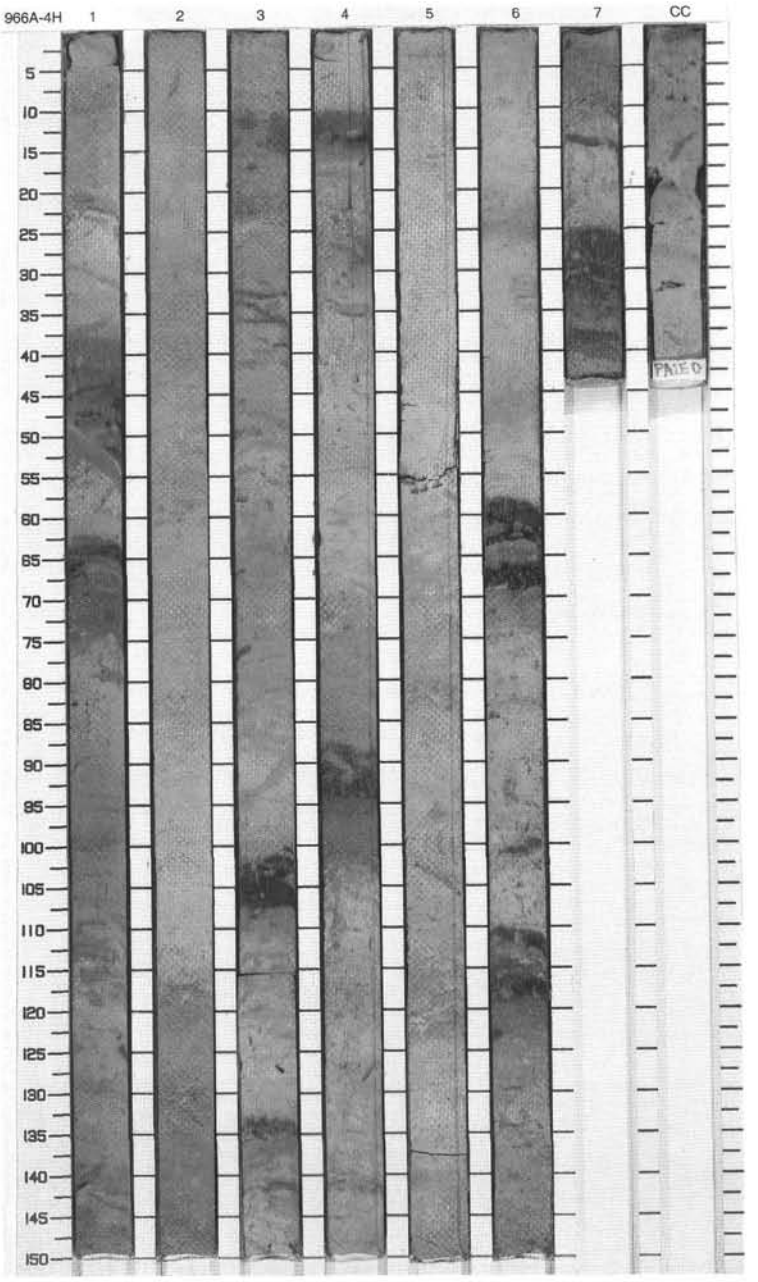
SITE 966 HOLE A CORE 3H CORED 15.3 - 24.8 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 25	0 50 100	1–9		1–6, CC	early Pleistocene	P, A		S, I, M	5Y 6/2	CLAYEY NANNOFOSSIL OOZE Major Lithology: Sediments recovered from this core largely consist of light olive gray (5Y 6/2) color–banded CLAYEY NANNOFOSSIL OOZE. Material is, in part, enriched in foraminifer shells and shows small flecks and blebs of sulfide as well as pteropod shells throughout the core. Sediments are moderately to heavily bioturbated by *Zoophycos*. The burrows are usually filled with fine-grained muds with increased concentrations of foraminifer shells. Minor Lithology: Four SAPROPEL beds ranging from 1 cm to 8 cm in thickness are present in Sections 4–6. Sharp top and basal contacts, occasional foraminifers, and the absence of visible laminations characterize these dark olive gray (5Y 3/2) to black (5Y 2.5/1) layers.



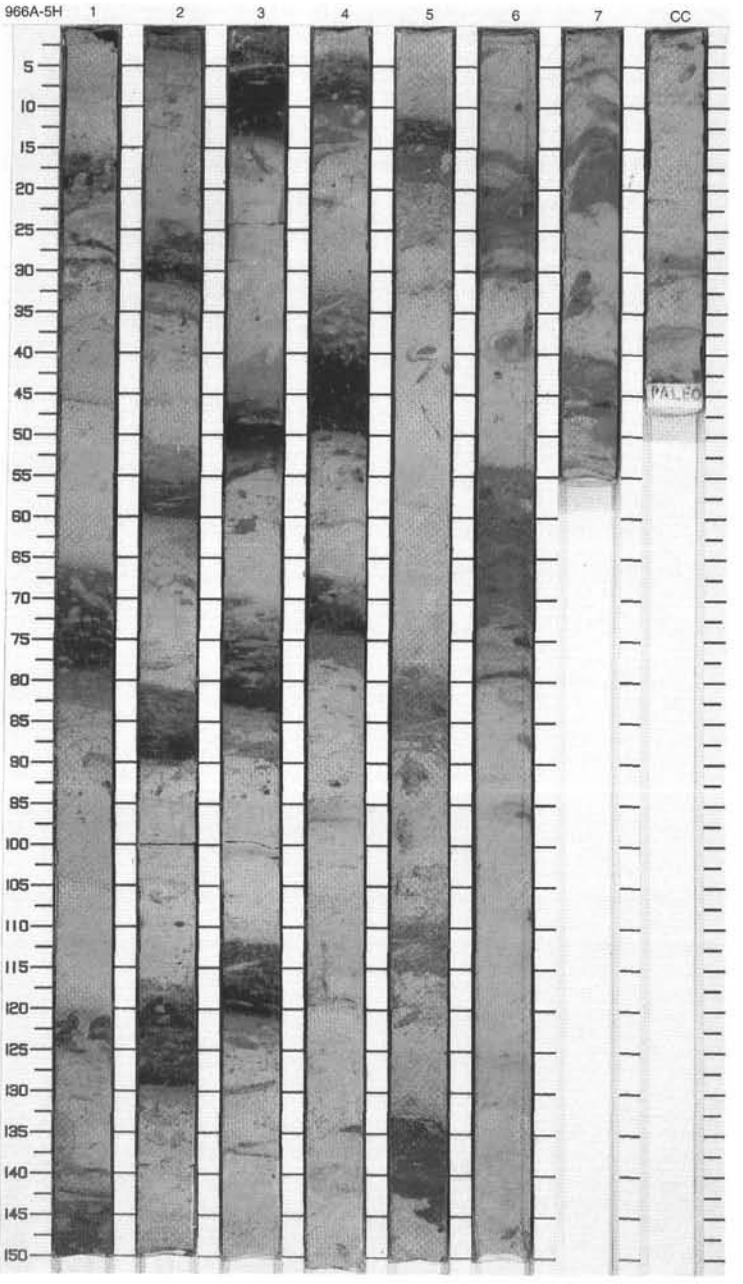
SITE 966 HOLE A CORE 4H CORED 24.8 - 34.3 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 25	0 50 100	1–9		1–7, CC	late Pliocene–early Pleistocene			S, S, S, M	5Y 6/2 To 5Y 7/2	NANNOFOSSIL OOZE WITH FORAMINIFERS and NANNOFOSSIL FORAMINIFER CLAY Major Lithologies: Light olive gray (5Y 6/2) to light gray (5Y 7/2) NANNOFOSSIL OOZE WITH FORAMINIFERS and NANNOFOSSIL FORMINIFER CLAY are the dominant lithologies of this core. Material is moderately to heavily bioturbated, including burrows of *Zoophycos* up to 3 cm in diameter. Minor Lithology: Several SAPROPEL beds are identified in this core, ranging between 1 and 14 cm in thickness. Sapropel beds are oxidized in part and are heavily mottled by burrows of *Zoophycos* and *Chondrites*. Lamination is absent and sharp basal and top contacts are observed. Below most sapropels, a >10-cm-thick "bleached" zone occurs. General Description: Several intervals with enrichment in foraminifers are found throughout. Pteropod shells and pyrite patches are scattered throughout the core.



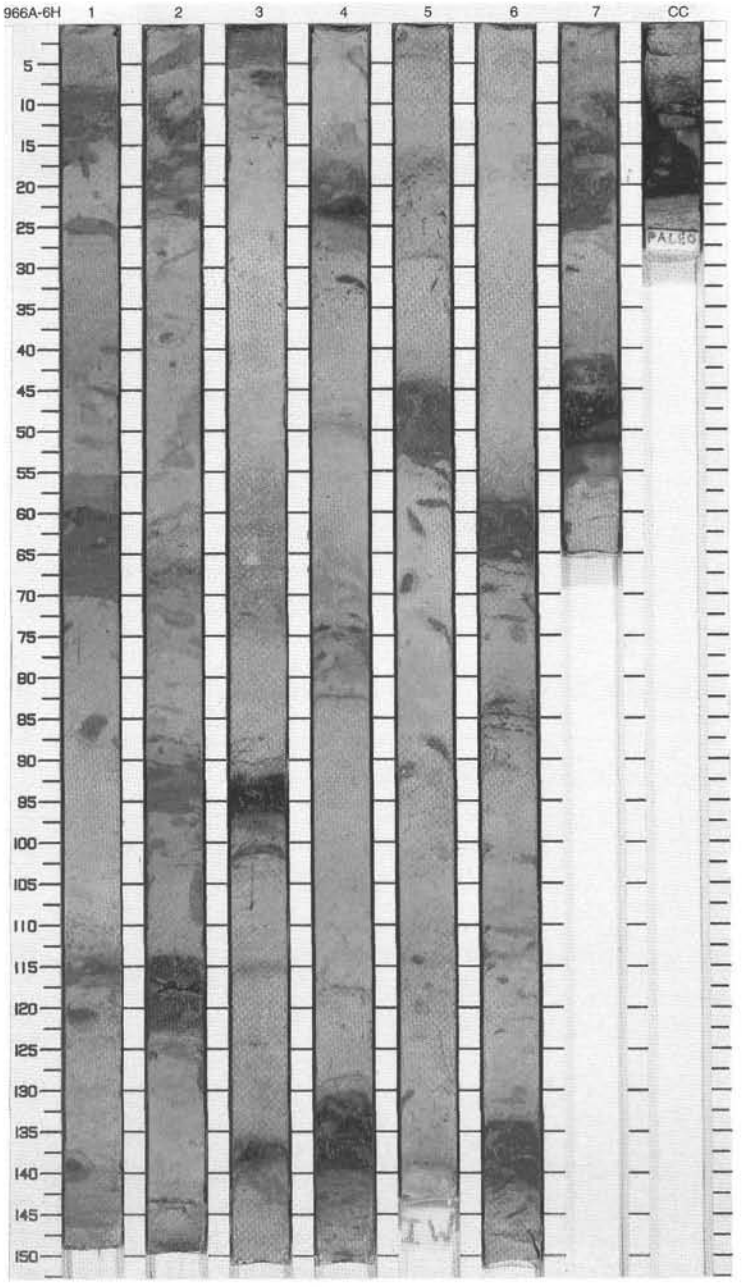
SITE 966 HOLE A CORE 5H CORED 34.3 - 43.8 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 25	−10 0 100	1–10		1–7, CC	Pliocene			S S S S M	5GY 6/1 To 5Y 6/2	NANNOFOSSIL OOZE with FORAMINIFERS Major Lithology: The dominant lithology is a greenish gray (5GY 6/1) to light olive gray (5Y 6/2) NANNOFOSSIL OOZE with FORAMINIFERS. Minor Lithologies: Twenty-three SAPROPEL beds occur in this core. The beds are typically heavily bioturbated throughout, and in some the upper contact is almost totally obscured by burrowing. General Description: Bioturbation is heavy throughout this core, including abundant *Chondrites* and *Planolites*, with larger burrows commonly ringed with a purple diagenetic halo. Flecks of sulfide material and occasional shell fragments are thinly disseminated throughout the core.



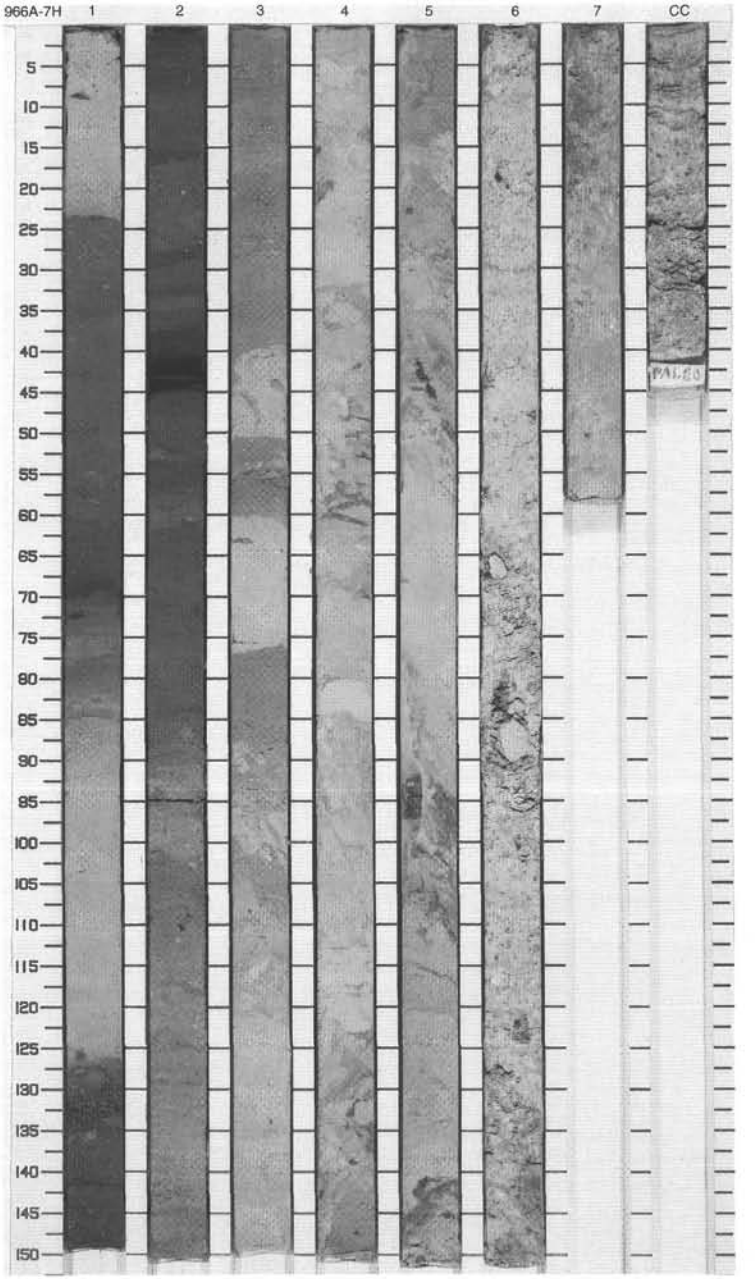
SITE 966 HOLE A CORE 6H CORED 43.8 - 53.3 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 25	0 50 100	1–9		1–7, CC	early Pliocene			S, S, I, M	5Y 7/1	CLAYEY NANNOFOSSIL OOZE Major Lithology: The dominant lithology in this core is light gray to olive (5Y 7/1) CLAYEY NANNOFOSSIL OOZE. Minor Lithologies: Seventeen dark gray to black (5Y 3/1 to 5Y 2.5/1) and gray to dark gray (5Y 5/1 to 5Y 4/1) SAPROPEL beds occur in this core. Most beds are heavily bioturbated. There is very little evidence of lamination, although fissile partings are present in the darkest examples. General Description: Bioturbation is present throughout the core with abundant *Chondrites* and *Planolites*. Darker colored (?sapropel) material is sometimes found as the fill to larger burrows.



SITE 966 HOLE A CORE 7H CORED 53.3 - 62.8 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 2	0 25	−5 0 50			1 2 3 4 5 6 7 CC	early Pliocene			S S S S S S S S S D S M	5Y 7/1 To 5Y 4/2	FORAMINIFER NANNOFOSSIL OOZE and CALCAREOUS SILT Major Lithologies: The major lithologies in this core are FORAMINIFER NANNOFOSSIL OOZE and CALCAREOUS SILT with rare carbonate clasts that vary from greenish-gray (5Y 7/1) to olive (5Y 4/2). Minor Lithologies: This core contains three dark gray (5Y 4/1) SAPROPEL beds. General Description: Lithologically, the core can be dlvided into two parts. Sections 1 through 5 are color banded and bioturbated throughout. Intervals within these sections contain fractures which, in some cases, have small normal offsets. Sections 6, 7, and the Core Catcher contain pale greenish-gray marly calcareous silt (5Y 7/1) contains rare clasts of hard white (5Y 8/1) carbonate up to 5 cm in diameter.

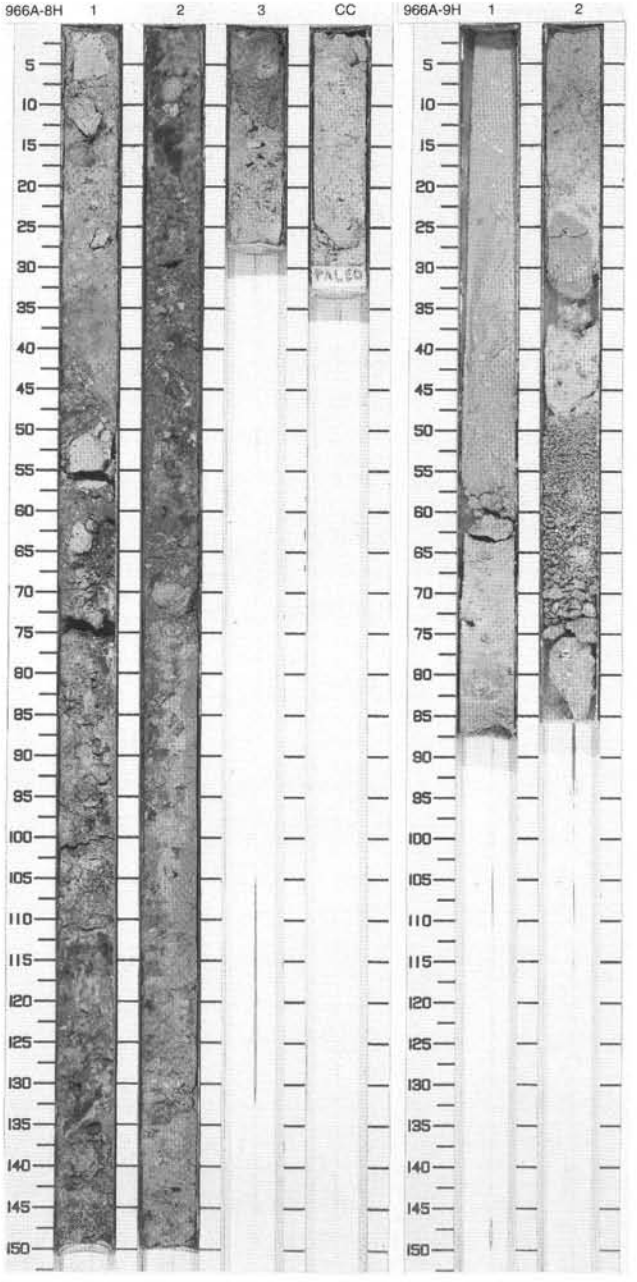


SITE 966 HOLE A CORE 8H CORED 62.8 - 66.3 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–3		1, 2, 3, CC	early Pliocene		W	S, S, S, S, M S		CALCAREOUS SILTY NANNOFOSSIL OOZE WITH CLASTS Major Lithology: This core is composed of white (5Y 8/1) CARBONATE SILTY NANNOFOSSIL OOZE with CLASTS. The clasts are composed of white (5Y 8/1) limestone, and greenish gray (5G 6/1) mudstone, and vary in size from 1 to 5 cm. The matrix is mainly micritic, particularly in Section 3 and the Core Catcher. General Description: There is evidence of drilling disturbance, some of the structures are likely to have been generated by coring.

SITE 966 HOLE A CORE 9H CORED 66.3 - 68.3 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1		1, 2	early Pliocene		W	D	5Y 6/1	CALCAREOUS CONGLOMERATE and CALCAREOUS SAND Major Lithologies: The sediment in the top meter of this core is a graded, unconsolidated to semi-consolidated, fine-to-medium grained, gray (5Y 6/1) CALCAREOUS SAND. Sediment in the bottom part of the core is a CALCAREOUS matrix supported CONGLOMERATE with limestone clasts in a micrite matrix. General Description: Drilling disturbance is moderate to severe throughout this core, and may have disturbed primary depositional structure and fabric.



SITE 966 HOLE A CORE 10X CORED 68.3 - 78.0 mbsf

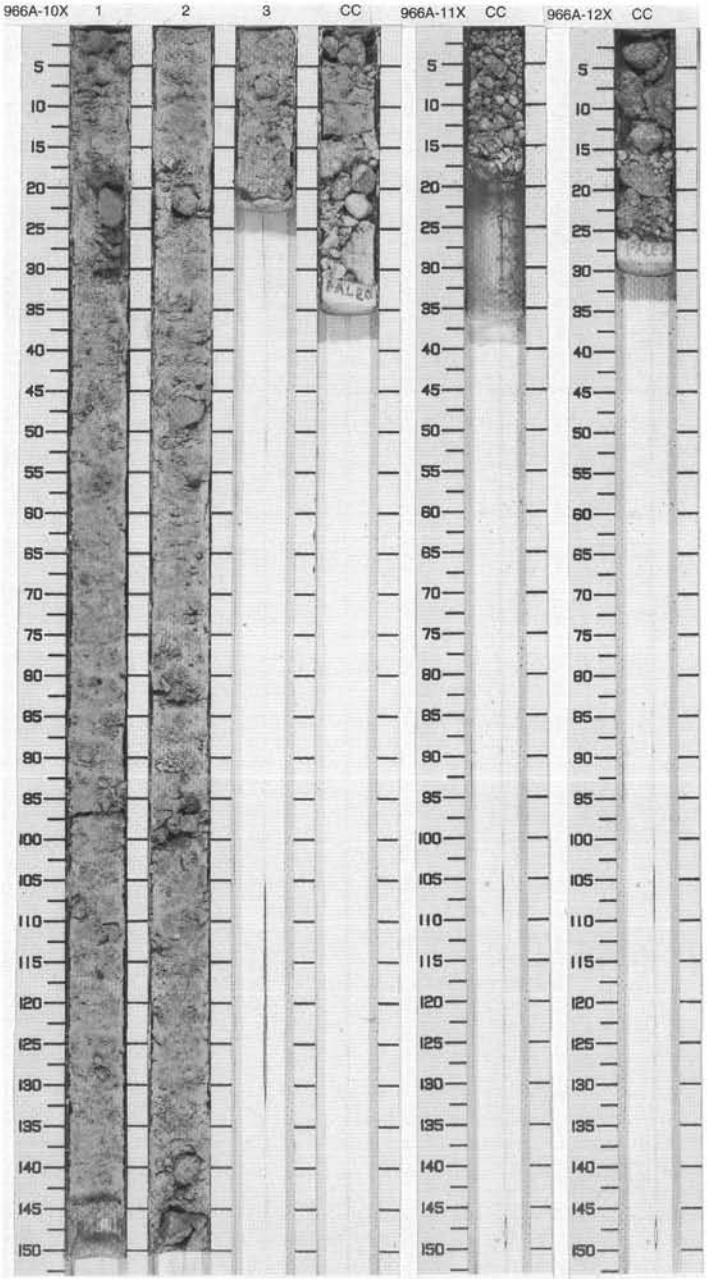
Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–3		1, 2, 3, CC	early Pliocene	◇	WWW	S S S S M		CALCAREOUS CONGLOMERATE Major Lithology: The sediment in this core is a matrix supported CALCAREOUS CONGLOMERATE with limestone clasts up to 4 cm in diameter in a micrite matrix.

SITE 966 HOLE A CORE 11X CORED 78.0 - 87.6 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC						LIMESTONE Major Lithology: The contents of this core are rounded chips of gray (5Y 5/1), very hard LIMESTONE. General Description: Core recovery 1%.

SITE 966 HOLE A CORE 12X CORED 87.6 - 97.2 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC				M		CALCAREOUS CONGLOMERATE Major Lithology: The sediment in this core is matrix supported CALCAREOUS CONGLOMERATE that contains limestone clasts in a micrite matrix. General Description: Core recovery 3%. Drilling disturbance may have altered primary structure and fabric.

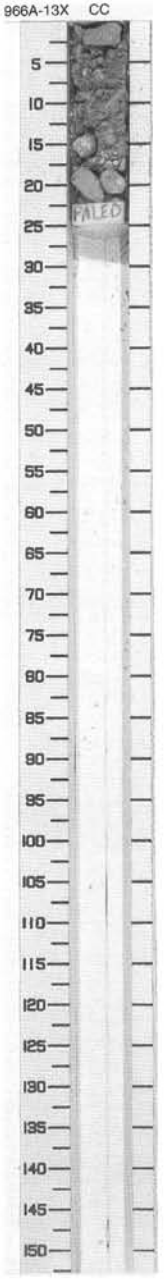


SITE 966 HOLE A CORE 13X CORED 97.2 - 106.8 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC				M		CALCEREOUS CONGLOMERATE

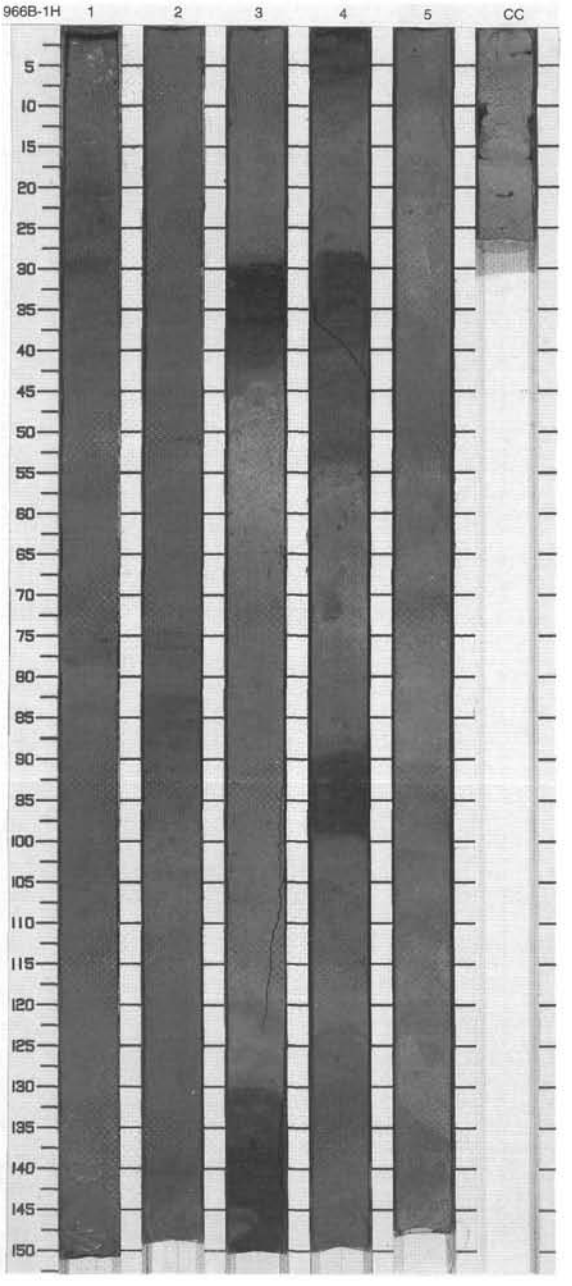
Major Lithology:
The material recovered in this core consists of a matrix-supported CALCAREOUS CONGLOMERATE. The conglomerate is composed of a sand-sized carbonate matrix together with 5 subangular, and 1 well-rounded LIMESTONE CLASTS (1–5 cm in diameter). Some clasts display faint internal color-banded lamination.

General Description:
Core recovery 2%. Drilling disturbance has probably altered primary structure and fabric in this core.



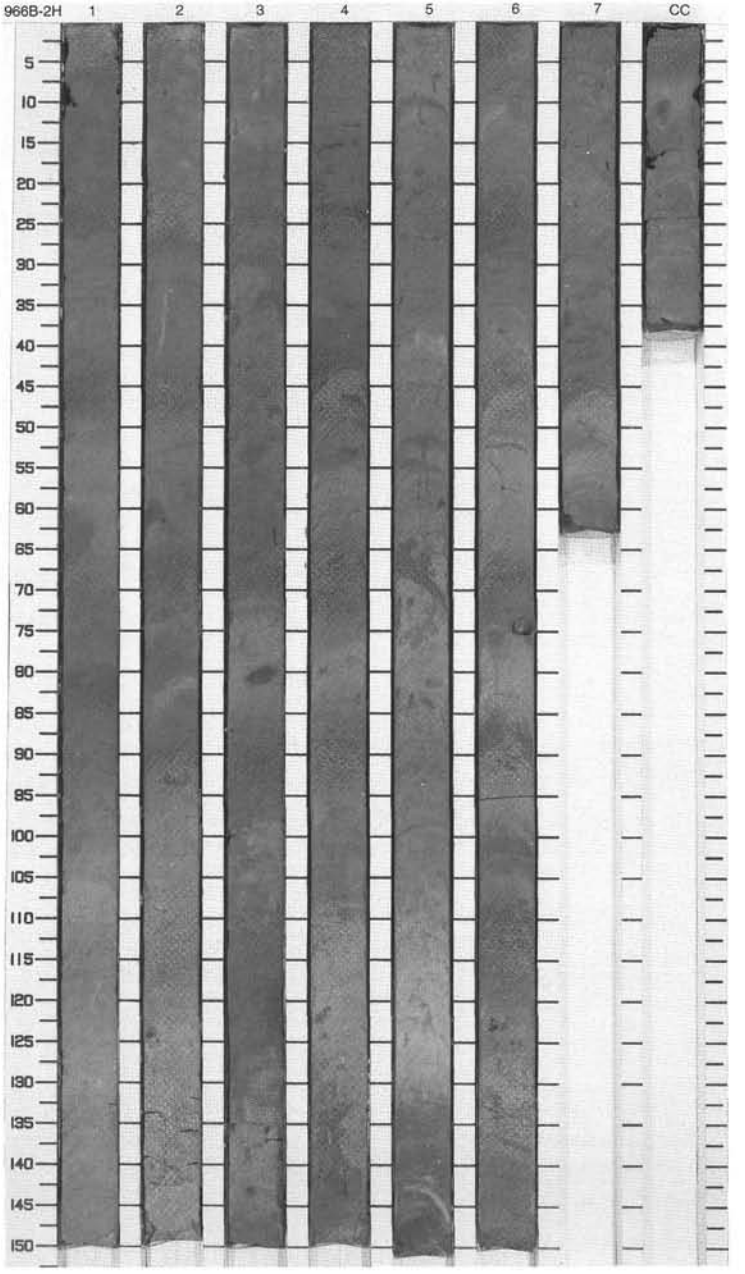
SITE 966 HOLE B CORE 1H CORED 0.0 - 7.7 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 20	0 100 200	1–7		1, 2, 3, 4, 5, CC	late Pleistocene–Holocene			S	10YR 5/4; 5Y 5/1; 10YR 6/3; 10YR 6/4; 10Y 3/1 To 5Y 6/1	CLAYEY NANNOFOSSIL OOZE and CLAYEY NANNOFOSSIL OOZE WITH FORAMINIFERS Major Lithologies: This core consists of pale brown (10YR 6/3) to gray (5Y 5/1) to light gray (10Y 7/1) CLAYEY NANNOFOSSIL OOZE and CLAYEY NANNOFOSSIL OOZE WITH FORAMINIFERS. Minor Lithologies: Five dark gray to black (5Y 3/1 to 5Y 2.5/1) and gray to dark gray (5Y 5/1 to 5Y 4/1) SAPROPEL beds occur in this core. All are heavily bioturbated. There is no evidence of lamination.

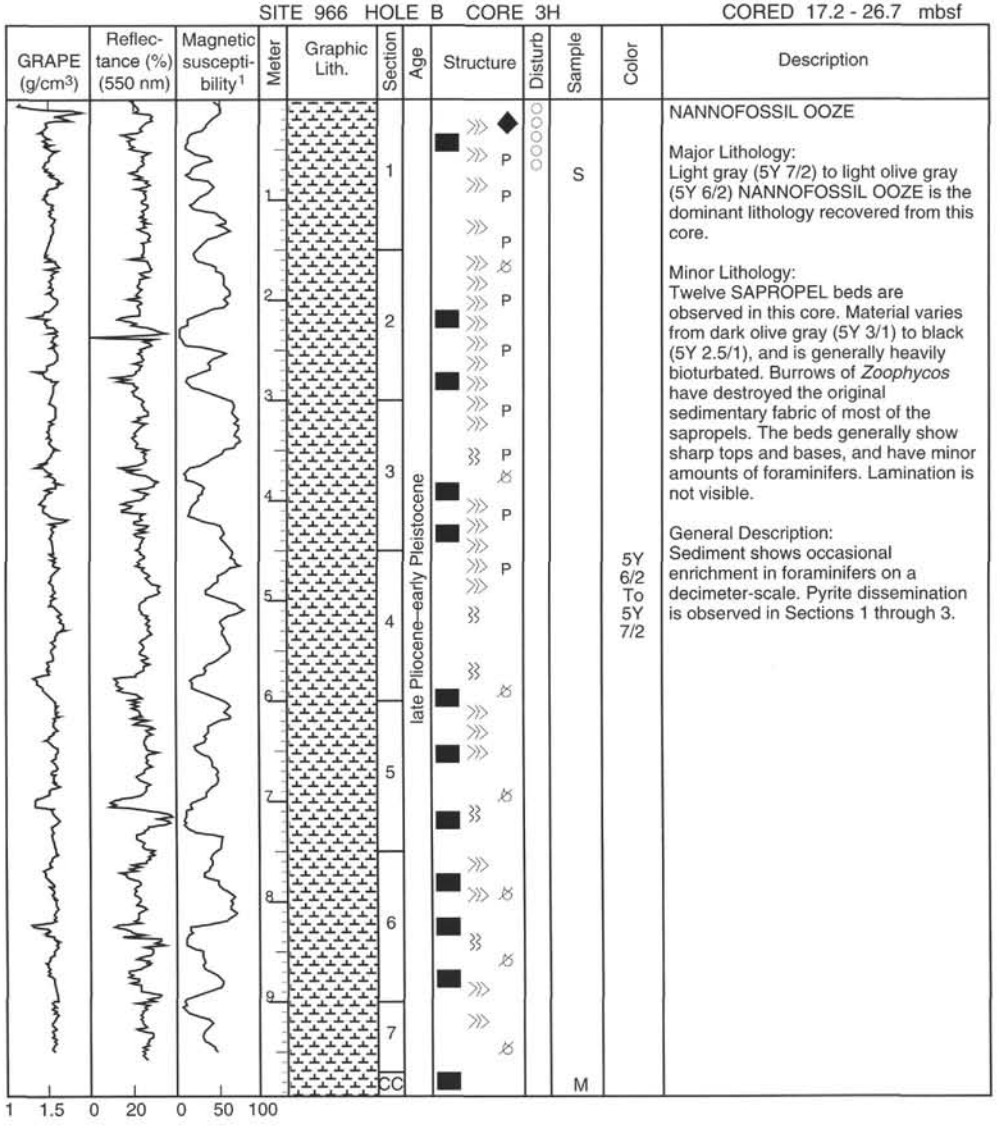


SITE 966 HOLE B CORE 2H CORED 7.7 - 17.2 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1.4 1.6	0 20	0 100 200	1–10		1–7, CC	early Pleistocene–middle Pleistocene			M	10YR 7/1 To 5Y 7/2	NANNOFOSSIL OOZE Major Lithology: Sediments recovered from this core consist of light gray (10YR 7/1 to 5Y 7/2) NANNOFOSSIL OOZE with slight color variation throughout. General Description: Material is moderately to heavily bioturbated, showing burrows of *Zoophycos* and *Chondrites* up to 3 cm in diameter. Occasional shell fragments of pteropods and mollusks are found. Lamination on a mm-scale results from changes in color.



SITE 966 HOLE B CORE 3H CORED 17.2 - 26.7 mbsf

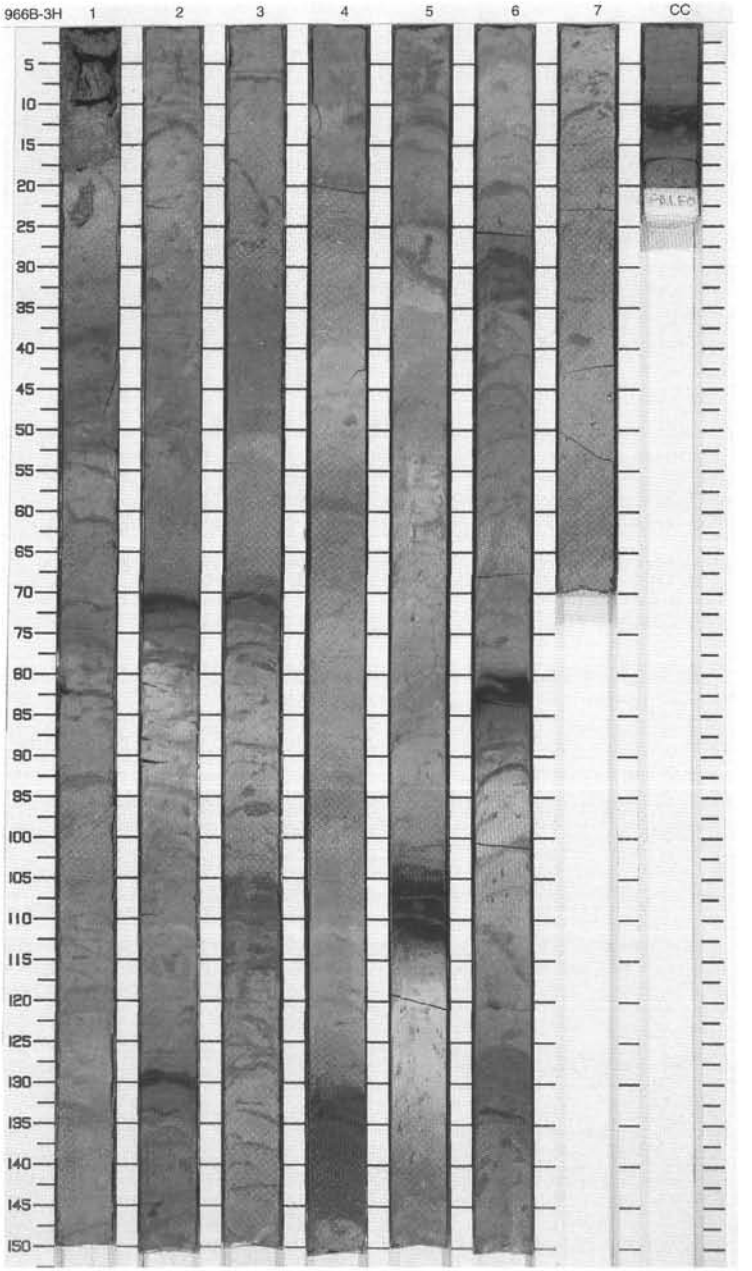


NANNOFOSSIL OOZE

Major Lithology:
Light gray (5Y 7/2) to light olive gray (5Y 6/2) NANNOFOSSIL OOZE is the dominant lithology recovered from this core.

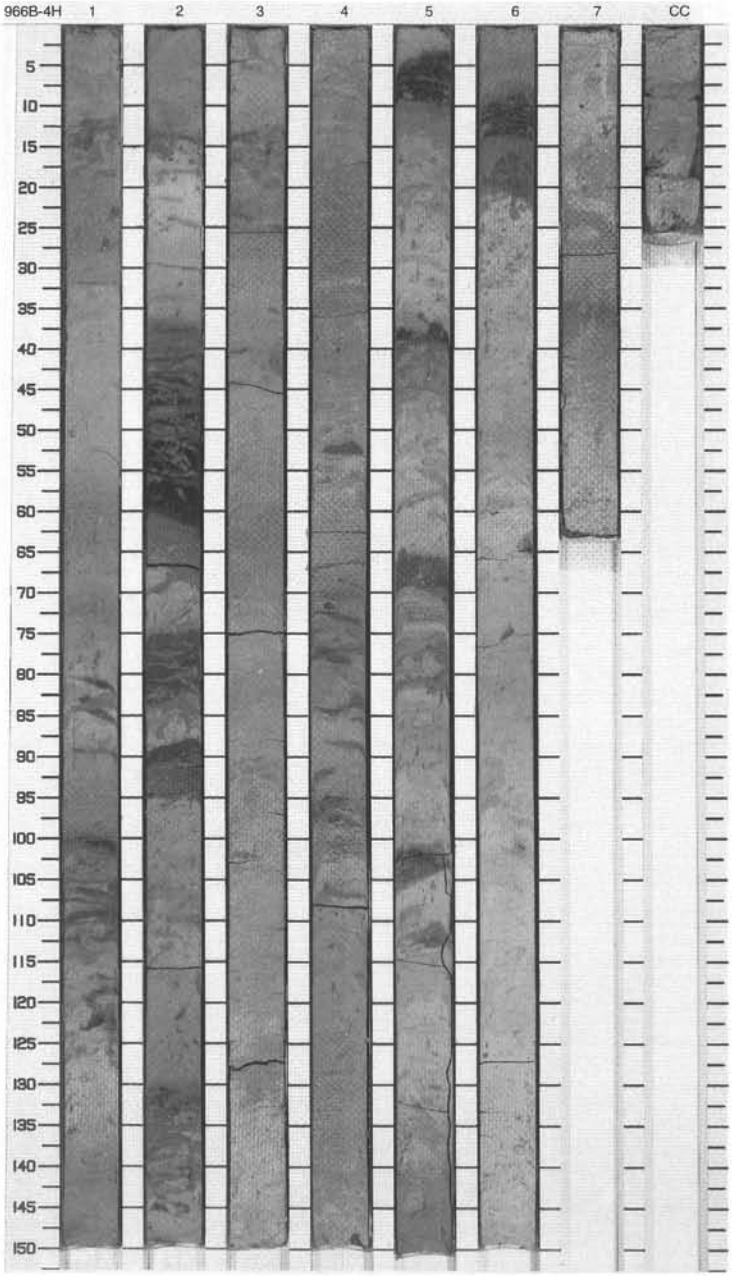
Minor Lithology:
Twelve SAPROPEL beds are observed in this core. Material varies from dark olive gray (5Y 3/1) to black (5Y 2.5/1), and is generally heavily bioturbated. Burrows of *Zoophycos* have destroyed the original sedimentary fabric of most of the sapropels. The beds generally show sharp tops and bases, and have minor amounts of foraminifers. Lamination is not visible.

General Description:
Sediment shows occasional enrichment in foraminifers on a decimeter-scale. Pyrite dissemination is observed in Sections 1 through 3.



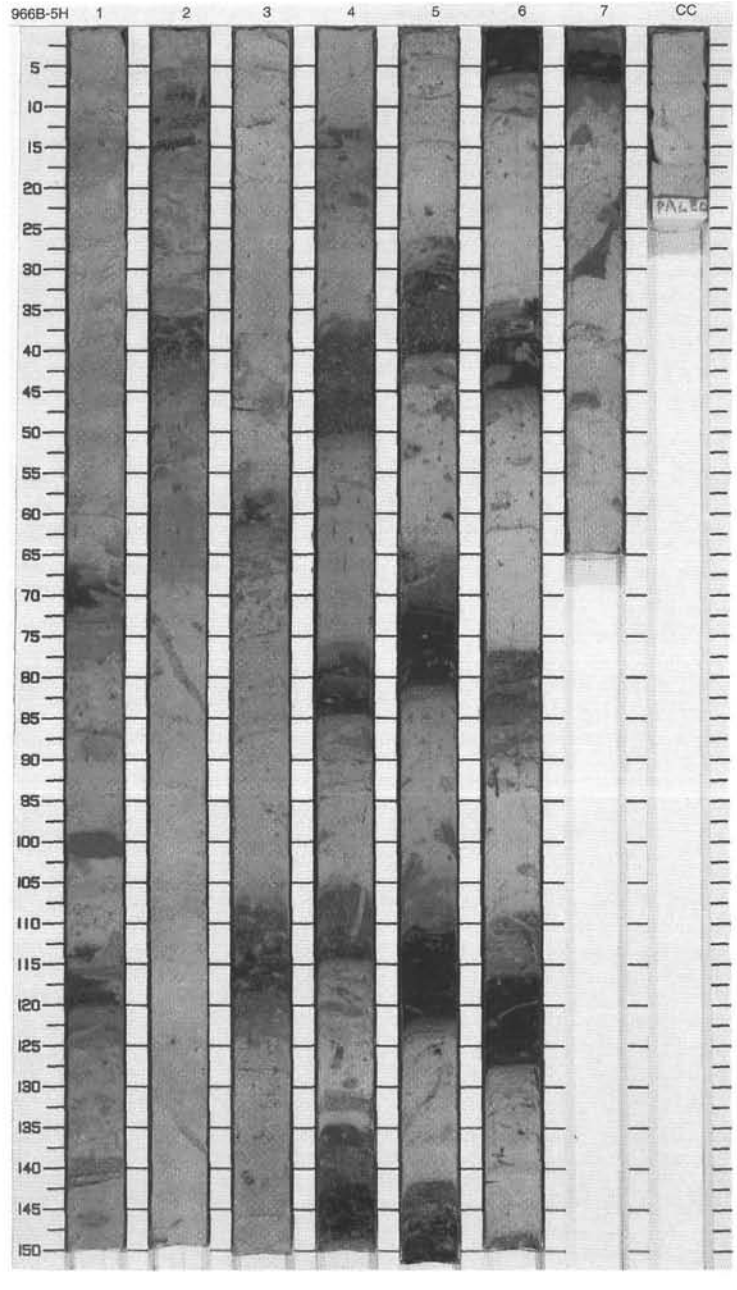
SITE 966 HOLE B CORE 4H CORED 26.7 - 36.2 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 25	0 50 100	1–9		1–7, CC	late Pliocene	P		S	5Y 6/2	NANNOFOSSIL OOZE Major Lithology: Light olive gray (5Y 6/2) NANNOFOSSIL OOZE with subdominant clayey foraminifer nannofossil ooze and clayey nannofossil ooze with foraminifers are the major lithologies recovered from this core. Minor Lithology: Twelve SAPROPEL beds are observed in this core. Sapropel beds are heavily burrowed and therefore commonly show irregular contacts with the surrounding oozes. Laminations are absent. Foraminifers are found in minor amounts, and are especially enriched in the burrows. Sharp top and basal contacts are found in fewer cases. Color varies as a function of bioturbation of *Zoophycos* from black (5Y 2.5/1) to greenish gray (5Y 4/1). General Description: The material in this core is largely homogeneous in composition. Moderate to heavy bioturbation (*Zoophycos*, *Chondrites*) and occasional shell fragments and tiny patches of pyrite are found throughout the core.



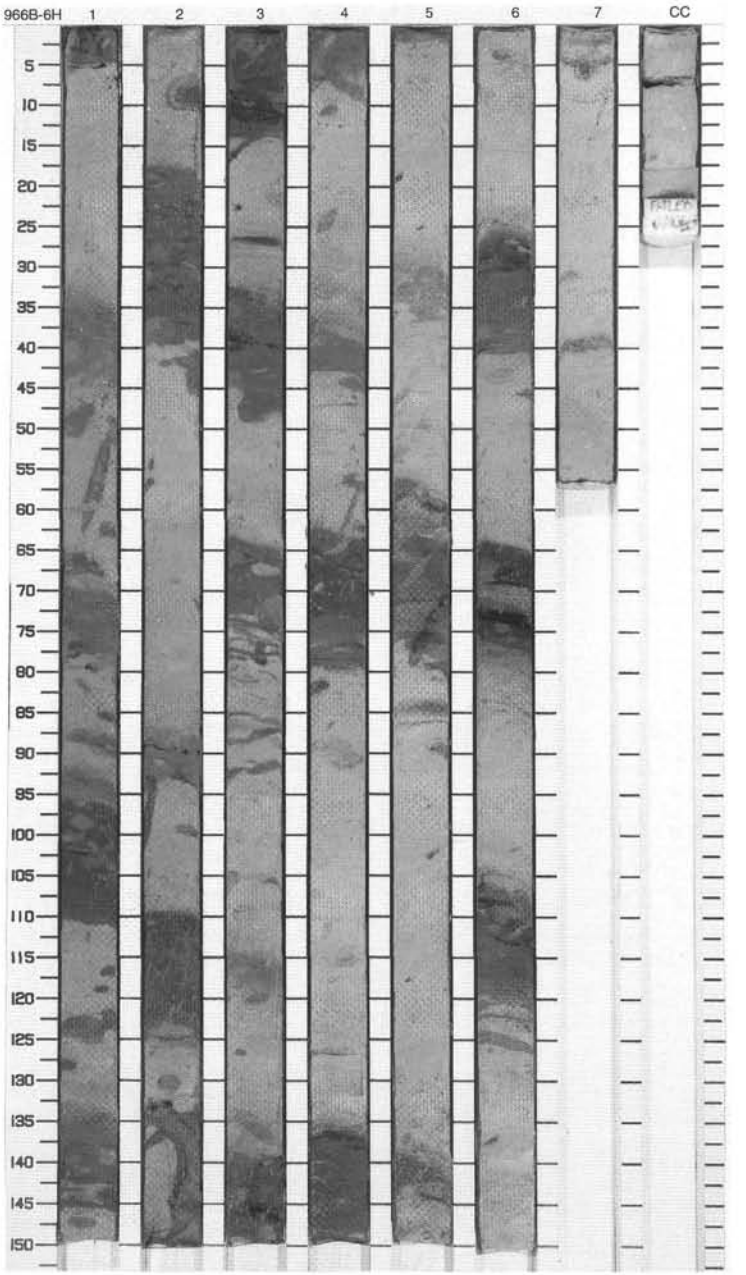
SITE 966 HOLE B CORE 5H CORED 36.2 - 45.7 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 20	0 50 100	1–10		1–7, CC	Pliocene	P, S, M			5Y 3/2 To 5Y 6/1	NANNOFOSSIL OOZE Major Lithology: Dark olive gray (5Y 3/2) to gray (5Y 6/1) NANNOFOSSIL OOZE is the dominant lithology recovered from this core. Clayey nannofossil ooze with foraminifers is subdominant. Minor Lithology: Eighteen SAPROPEL beds are identified in this core, varying from 7 to 16 cm in thickness. Bases and tops are generally disturbed by burrows of *Zoophycos*. Laminations and foraminifers are absent or occur in negligible amounts. Color ranges from dark gray to black (5Y 4/1 to 5Y 2.5/1). General Description: Slight color banding and moderate to heavy bioturbation occur throughout the core. Horizons rich in foraminifers and disseminated pyrite are found. Shell fragments are scattered through the whole core.



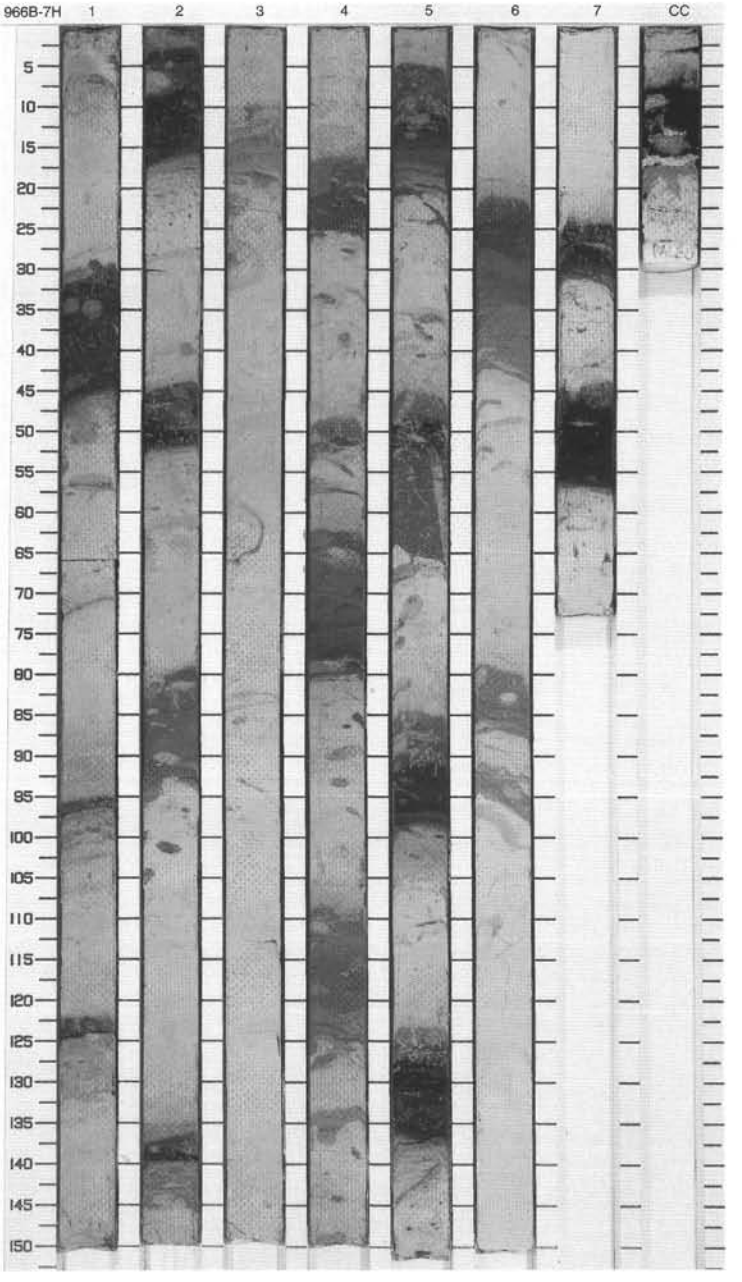
SITE 966 HOLE B CORE 6H CORED 45.7 - 55.2 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 20	0 25 50	1–9		1–7, CC	early Pliocene	P, S, M		S, S, M	5Y 6/2 To 5Y 6/1	NANNOFOSSIL OOZE Major Lithology: Sediment recovered from this core is gray (5Y 6/1) to light olive gray (5Y 6/2), heavily bioturbated NANNOFOSSIL OOZE, with subdominant nannofossil ooze with foraminifers and clay. Minor Lithology: Thirteen SAPROPEL beds are identified in this core varying from 7 to 16 cm in thickness. Bases and tops of the beds are generally disturbed by burrows of *Zoophycos*. Laminations and foraminifers are absent or occur in negligible amounts. Color ranges from dark gray to black (5Y 4/1 to 5Y 2.5/1).



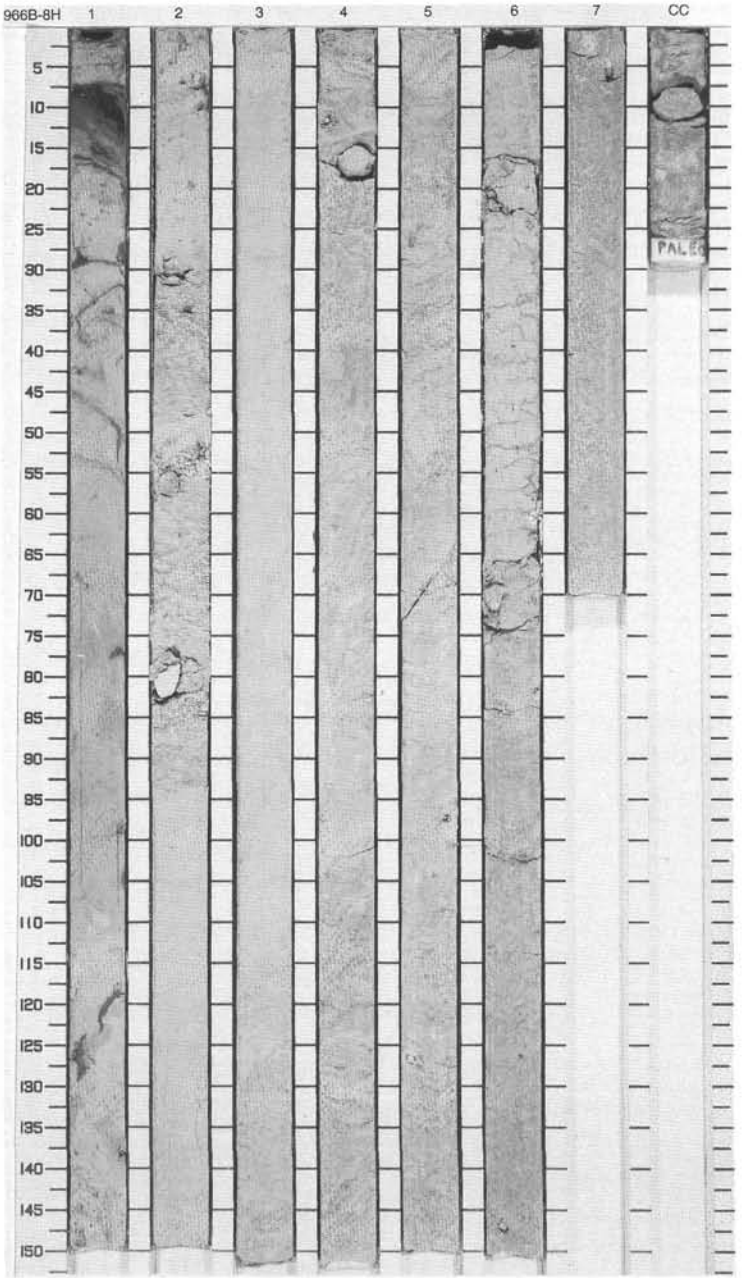
SITE 966 HOLE B CORE 7H CORED 55.2 - 64.7 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 25	0 50 100	1–10		1–7, CC	early Pliocene	P		S, M	5Y 6/1 To 5Y 6/2	NANNOFOSSIL OOZE Major Lithology: Sediments cored consist mainly of faintly color banded, gray (5Y 6/1) to light olive gray (5Y 6/2) NANNOFOSSIL OOZE, with subdominant clayey nannofossil ooze with foraminifers, clayey nannofossil ooze, and nannofossil clay. Minor Lithology: Twenty-one SAPROPEL beds are identified in this core, varying from 7 to 16 cm in thickness. Bases and tops of the beds are generally disturbed by burrows of *Zoophycos*. Laminations and foraminifers are absent or occur in negligible amounts. Color ranges from dark gray to black (5Y 4/1 to 5Y 2.5/1). General Description: Material is moderately to heavily burrowed (both *Zoophycos* and *Chondrites*) and shows significant enrichment in foraminifers at several horizons.



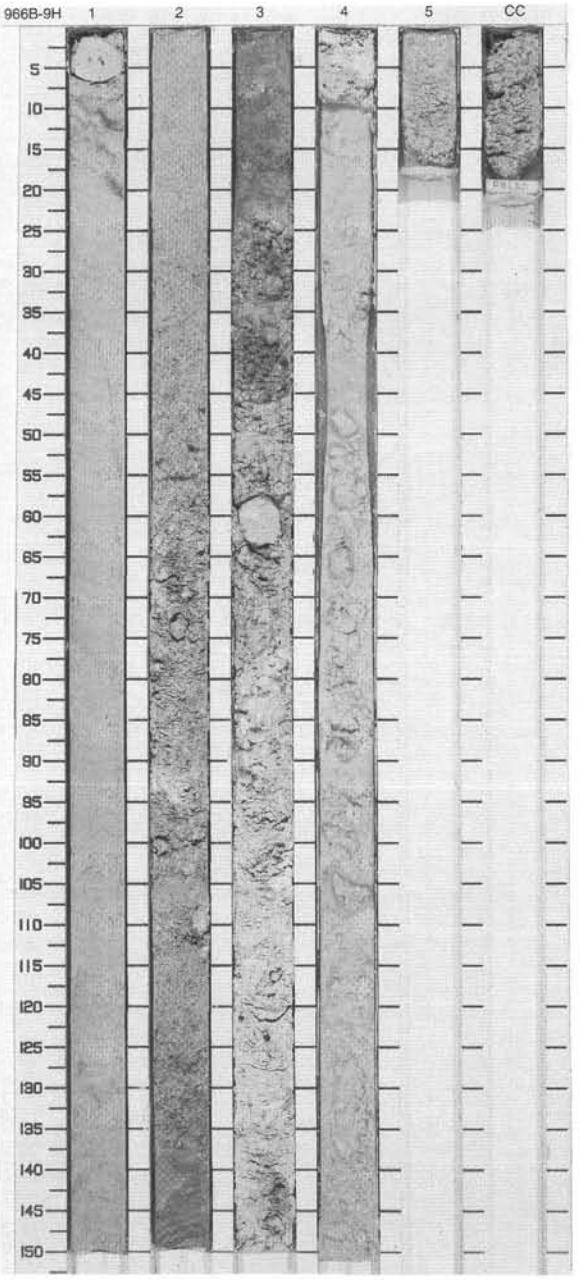
SITE 966 HOLE B CORE 8H CORED 64.7 - 74.2 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–9		1–7, CC	early Pliocene			S, M, P	5Y 7/1 To 5Y 8/1	NANNOFOSSIL OOZE Major Lithologies: Light gray (5Y 7/1) to white (5Y 8/1) NANNOFOSSIL OOZE is the dominant lithology recovered from this core, with subdominant calcareous silt, calcareous nannofossil ooze, and nannofossil ooze with foraminifers. Minor Lithology: One 5-cm-thick, dark gray (5Y 3/1) SAPROPEL bed occurs in Section 1, 7 through 12 cm. The base of the bed is irregular and is slightly burrowed. Laminations and foraminifers are absent. General Description: Sediments are homogeneous and show occasional enrichment in foraminifers (Section 2). Limestone lithoclasts are found in Sections 4 to 7.



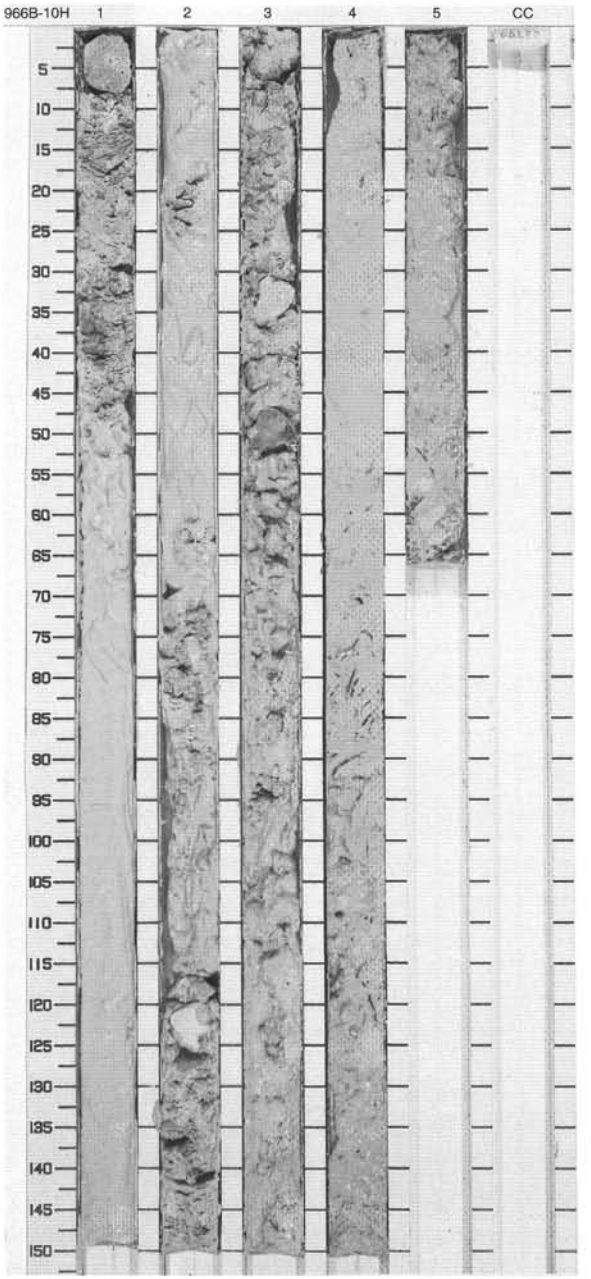
SITE 966 HOLE B CORE 9H CORED 74.2 - 83.7 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–6		1, 2, 3, 4, 5, CC	early Pliocene	◇	W	S, M	5GY 7/1	NANNOFOSSIL OOZE Major Lithology: The dominant lithology recovered in this core is a light greenish gray (5GY 7/1) NANNOFOSSIL OOZE. Below Section 1 there are several crudely bedded layers with large (up to 3 cm) limestone clasts embedded in a silty calcareous matrix.



SITE 966 HOLE B CORE 10H CORED 83.7 - 90.3 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–6		1, 2, 3, 4, 5, CC	early Pliocene	◇	WWW OOOOOOOOOO W	M	5Y 6/1 TO 7.5YR N8/0	CALCAREOUS CONGLOMERATE and CALCARENITE Major Lithologies: The sediment in this core is a gray (5Y 6/1) to white (7.5YR N8/0) matrix-supported CALCAREOUS CONGLOMERATE with clasts of limestone up to 5 cm in diameter. Intervals of CALCARENITE are also present. General Description: The sediment in this core is highly disturbed with only short intervals (less than 1 m) of original structure preserved.



SITE 966 HOLE B CORE 11X CORED 90.3 - 97.9 mbsf

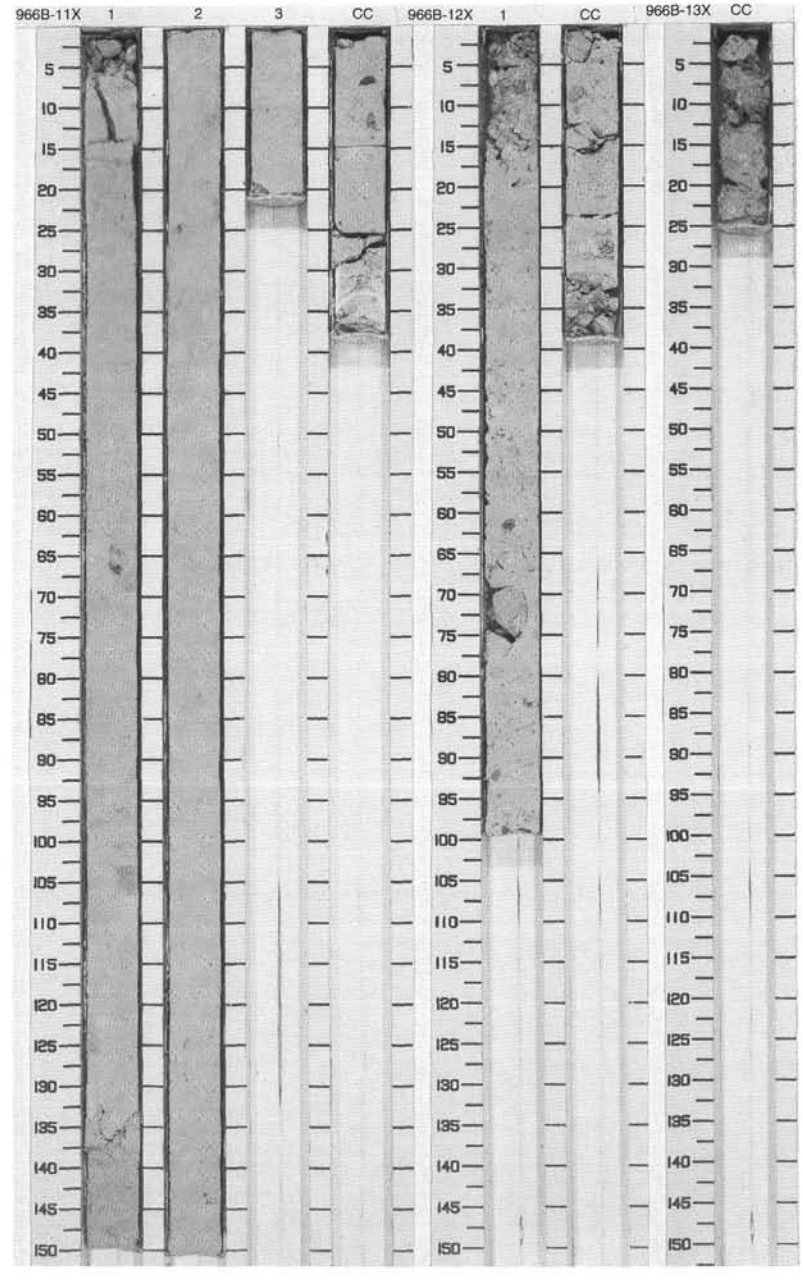
Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 2 3		1 2 3 CC	early Pliocene			S S M	10Y 7/1	NANNOFOSSIL OOZE Major Lithology: The sediment in this core is a light gray (10Y 7/1), semi-compacted NANNOFOSSIL OOZE with scattered carbonate clasts.

SITE 966 HOLE B CORE 12X CORED 97.9 - 107.5 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1		1 CC				S M	10Y 8/1	CALCAREOUS CONGLOMERATE Major Lithology: The sediment in this core is a compacted, white matrix-supported (10Y 8/1) CALCAREOUS CONGLOMERATE with white to blue-green limestone clasts in a micrite matrix.

SITE 966 HOLE B CORE 13X CORED 107.5 - 117.1 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC				M		CALCAREOUS CONGLOMERATE Major Lithology: The sediment in this core is a matrix-supported CALCAREOUS CONGLOMERATE with limestone clasts in a micrite matrix. General Description: Core recovery 2%.



SITE 966 HOLE B CORE 14X CORED 117.1 - 126.7 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC						CARBONATE PEBBLES

Major Lithology:
CARBONATE PEBBLES were the only material recovered in this core.

General Description:
Core recovery 1%.

SITE 966 HOLE B CORE 15X CORED 126.7 - 136.3 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		1						LIMESTONE

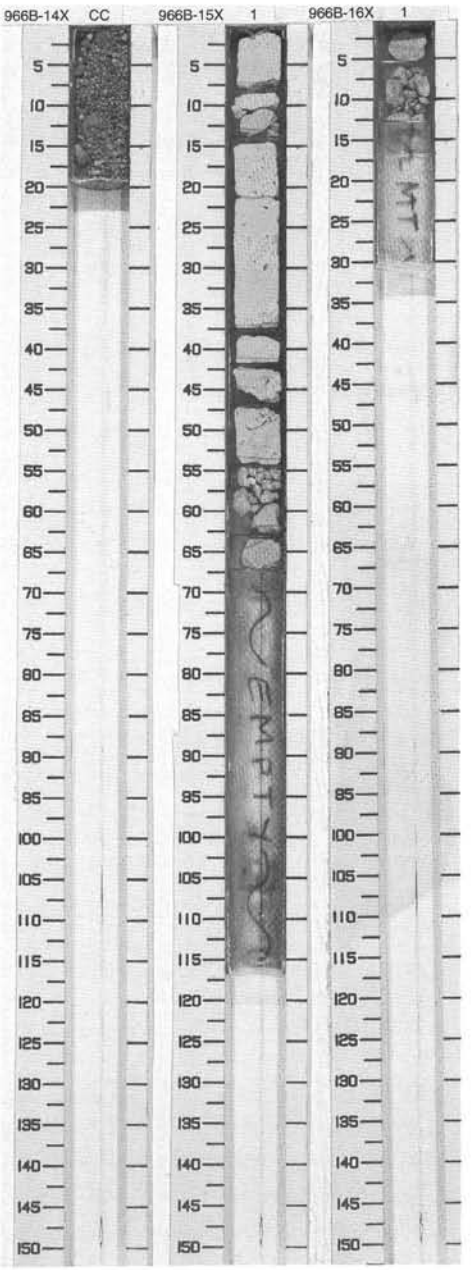
Major Lithology:
The rock recovered in this core is a weakly cross-bedded LIMESTONE, with shells throughout.

SITE 966 HOLE B CORE 16X CORED 136.3 - 146.0 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
								LIMESTONE

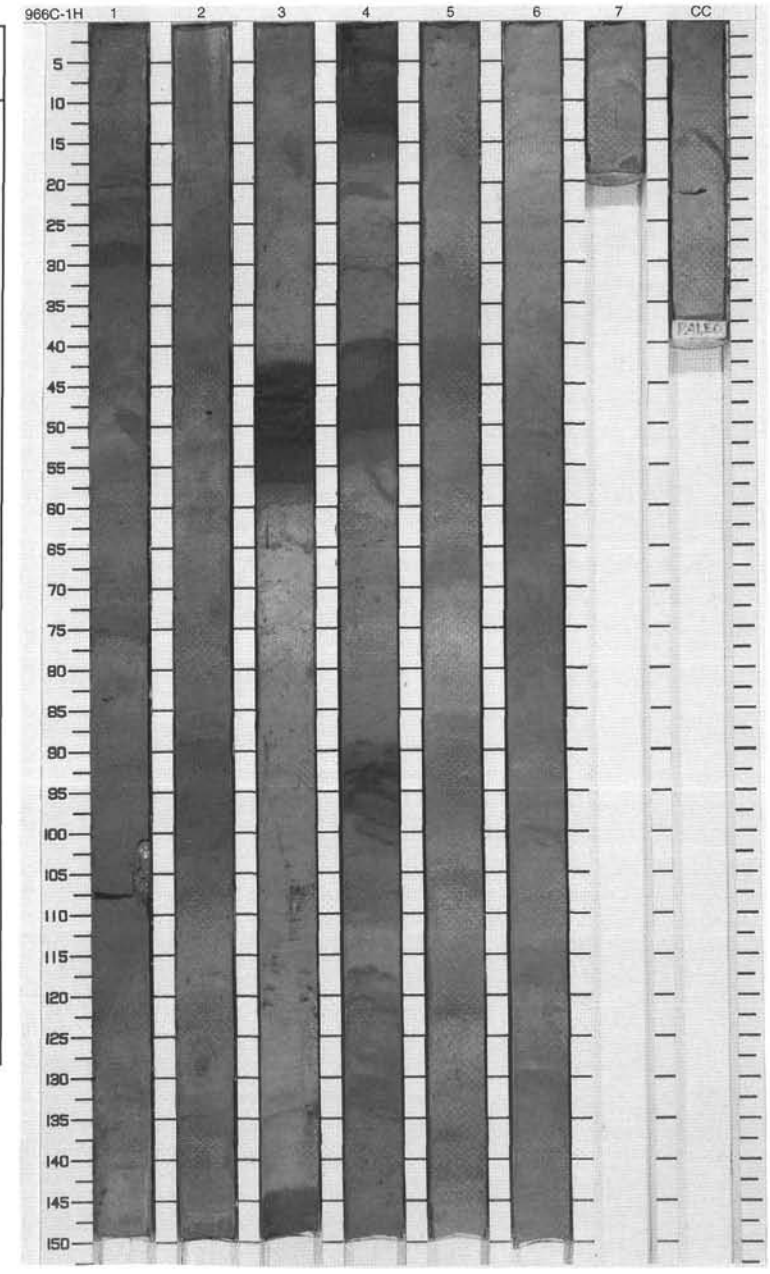
Major Lithology:
LIMESTONE clasts from approximately 1 to 4 cm in diameter were the only material recovered in this core.

General Description:
Core recovery 1%.

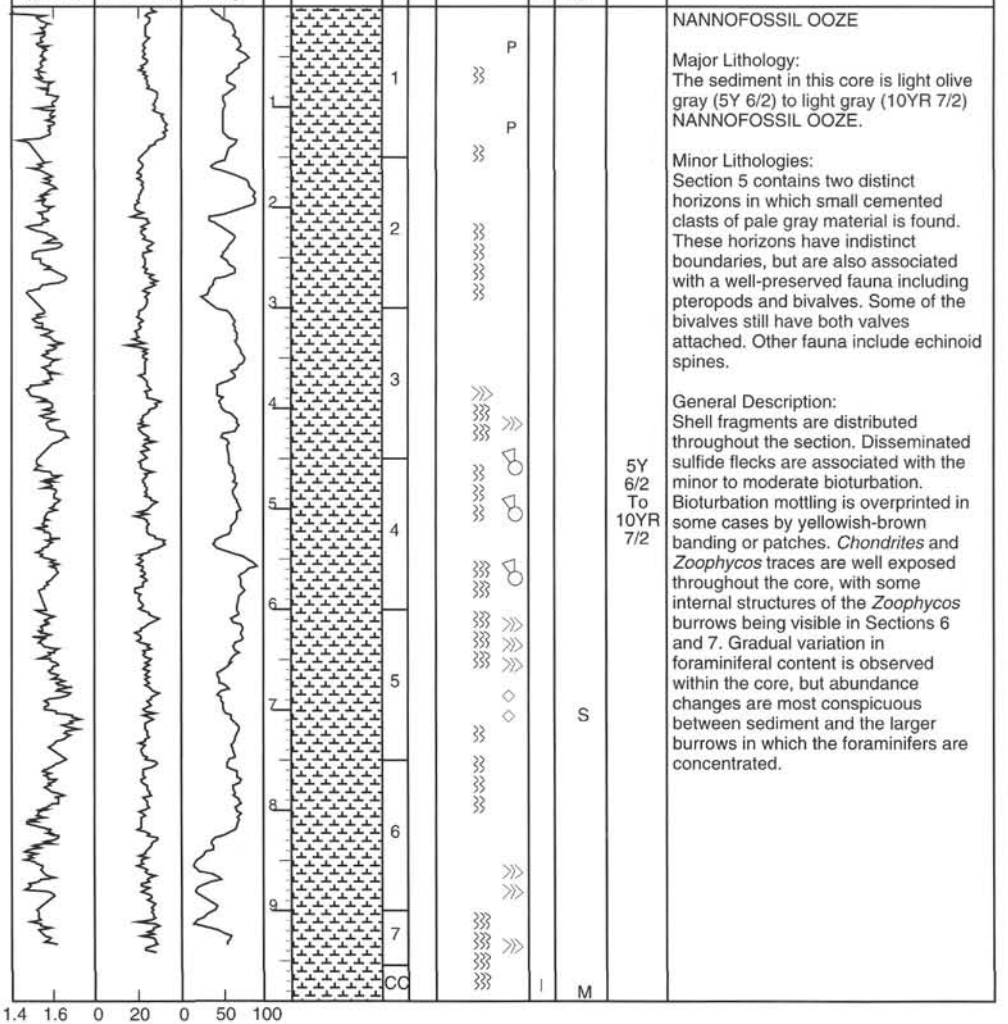


SITE 966 HOLE C CORE 1H CORED 0.0 - 9.5 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 20	0 100 200	1–9		1–7, CC	late Pleistocene–Holocene			M	10YR 6/6 To 5Y 6/2	NANNOFOSSIL OOZE Major Lithology: Sediment recovered in this core is a brownish yellow (10YR 6/6) to light olive gray (5Y 6/2) NANNOFOSSIL OOZE. Minor Lithology: Six SAPROPEL beds are observed in this core. Beds vary from 3 to 21 cm in thickness and show both sharp and diffuse contacts to the surrounding oozes. Color ranges from dark olive gray (5Y 4/1) to black (5Y 2.5/1). Foraminifers are disseminated in some of the sapropels. Several layers are oxidized and show burrows of *Zoophycos*.



SITE 966 HOLE C CORE 2H CORED 9.5 - 19.0 mbsf

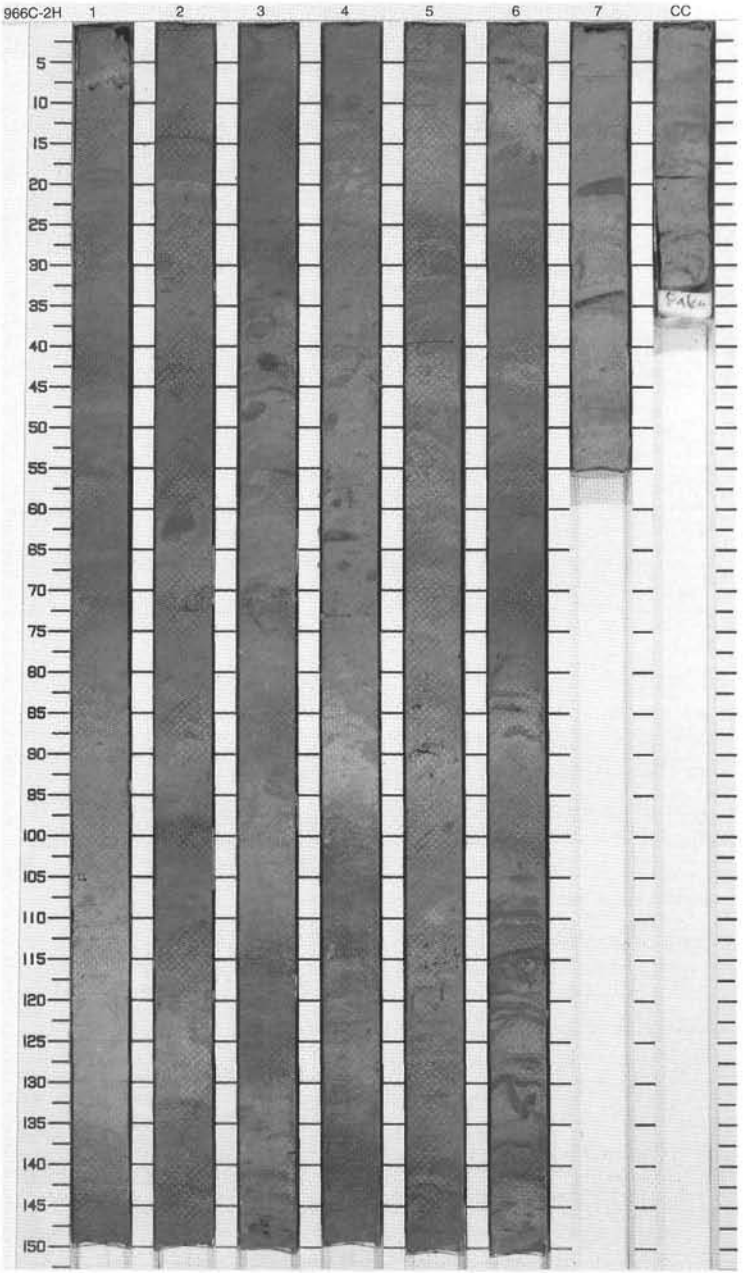


NANNOFOSSIL OOZE

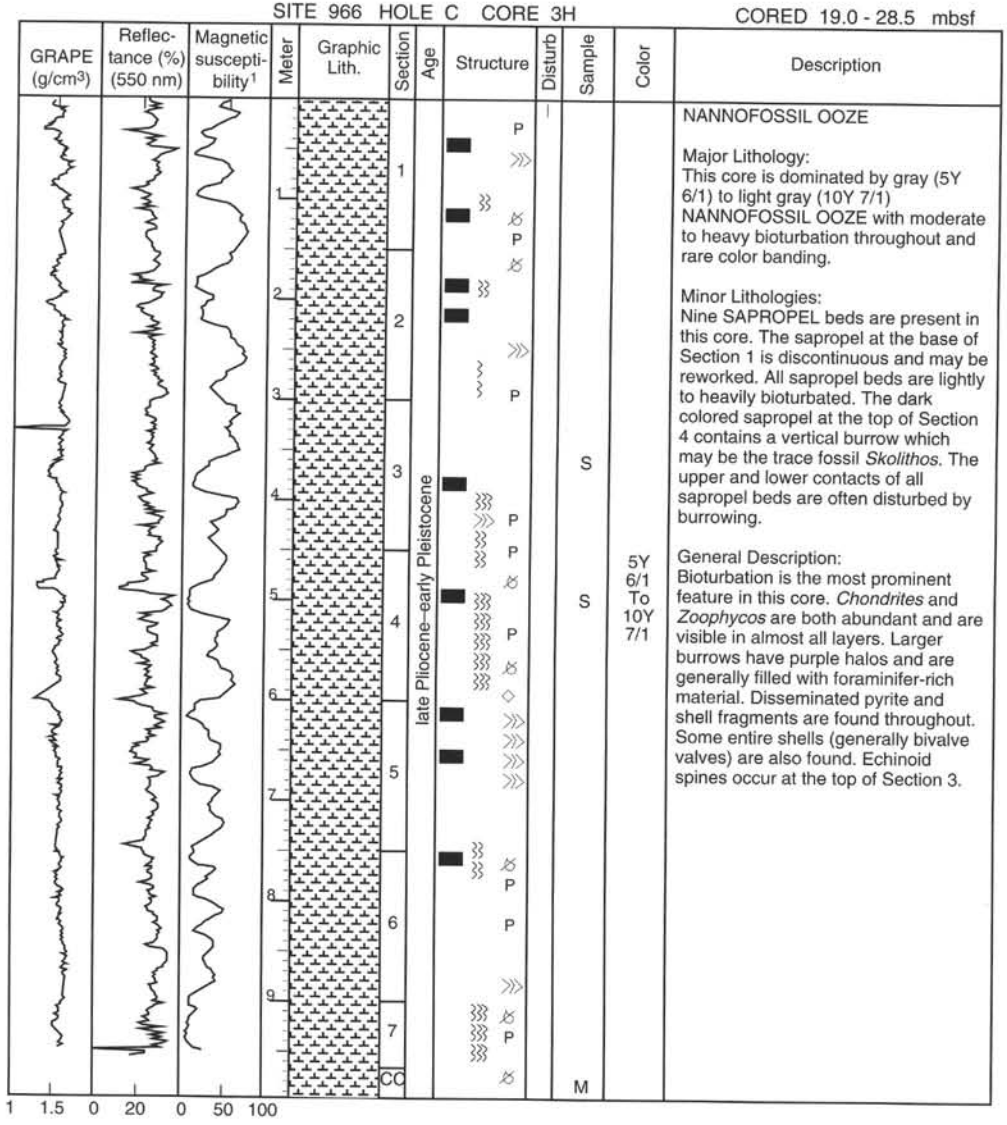
Major Lithology:
The sediment in this core is light olive gray (5Y 6/2) to light gray (10YR 7/2) NANNOFOSSIL OOZE.

Minor Lithologies:
Section 5 contains two distinct horizons in which small cemented clasts of pale gray material is found. These horizons have indistinct boundaries, but are also associated with a well-preserved fauna including pteropods and bivalves. Some of the bivalves still have both valves attached. Other fauna include echinoid spines.

General Description:
Shell fragments are distributed throughout the section. Disseminated sulfide flecks are associated with the minor to moderate bioturbation. Bioturbation mottling is overprinted in some cases by yellowish-brown banding or patches. *Chondrites* and *Zoophycos* traces are well exposed throughout the core, with some internal structures of the *Zoophycos* burrows being visible in Sections 6 and 7. Gradual variation in foraminiferal content is observed within the core, but abundance changes are most conspicuous between sediment and the larger burrows in which the foraminifers are concentrated.



SITE 966 HOLE C CORE 3H CORED 19.0 - 28.5 mbsf



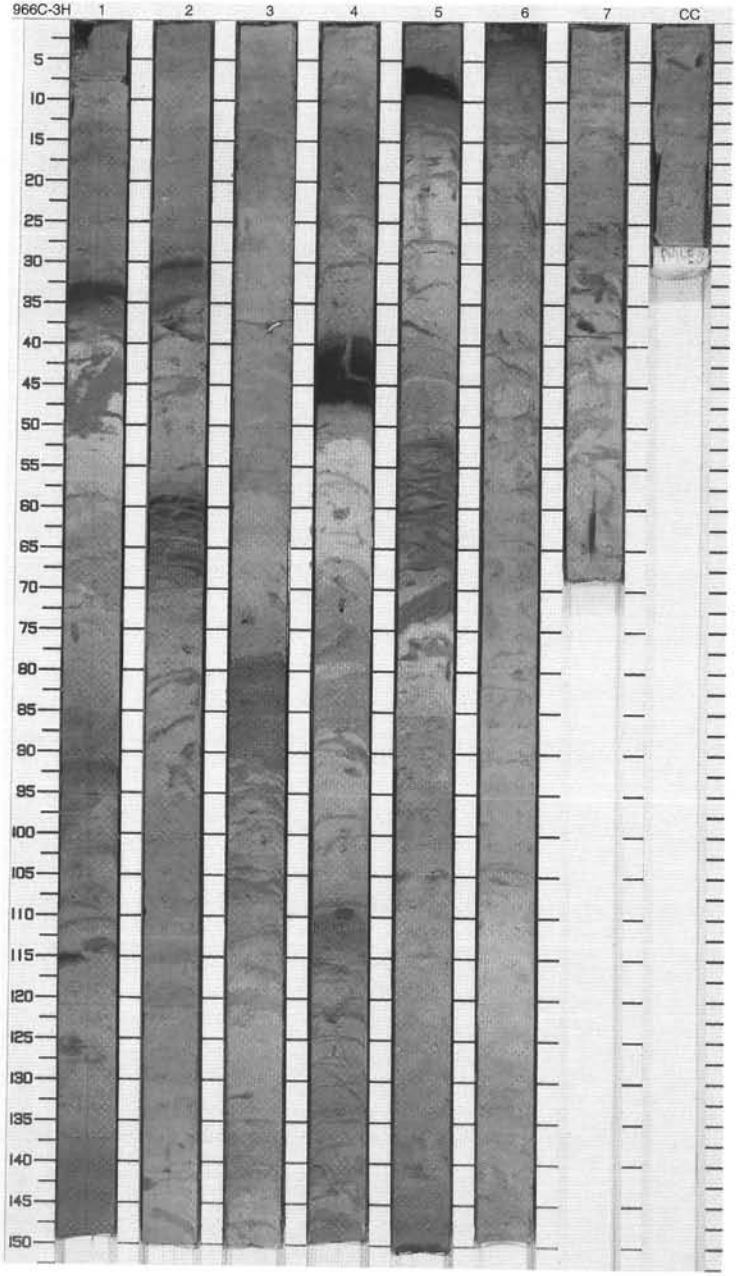
Description

NANNOFOSSIL OOZE

Major Lithology:
This core is dominated by gray (5Y 6/1) to light gray (10Y 7/1) NANNOFOSSIL OOZE with moderate to heavy bioturbation throughout and rare color banding.

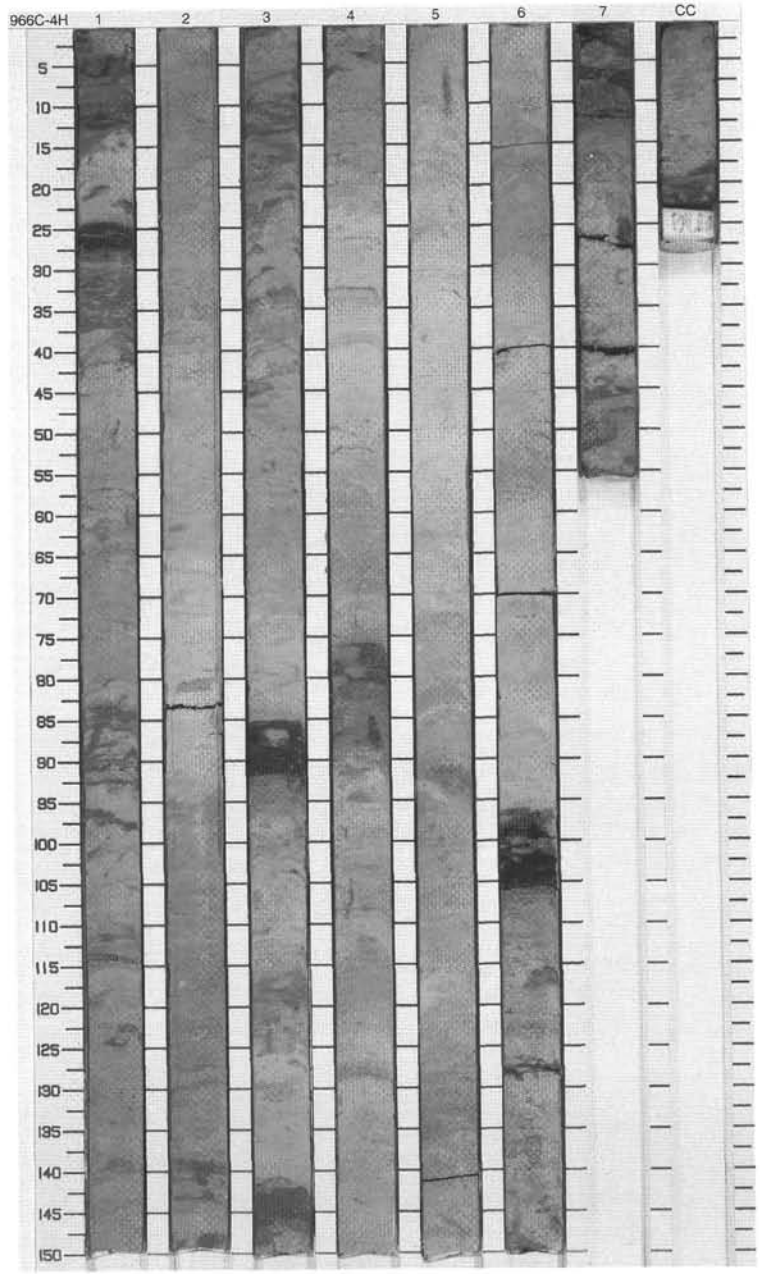
Minor Lithologies:
Nine SAPROPEL beds are present in this core. The sapropel at the base of Section 1 is discontinuous and may be reworked. All sapropel beds are lightly to heavily bioturbated. The dark colored sapropel at the top of Section 4 contains a vertical burrow which may be the trace fossil *Skolithos*. The upper and lower contacts of all sapropel beds are often disturbed by burrowing.

General Description:
Bioturbation is the most prominent feature in this core. *Chondrites* and *Zoophycos* are both abundant and are visible in almost all layers. Larger burrows have purple halos and are generally filled with foraminifer-rich material. Disseminated pyrite and shell fragments are found throughout. Some entire shells (generally bivalve valves) are also found. Echinoid spines occur at the top of Section 3.



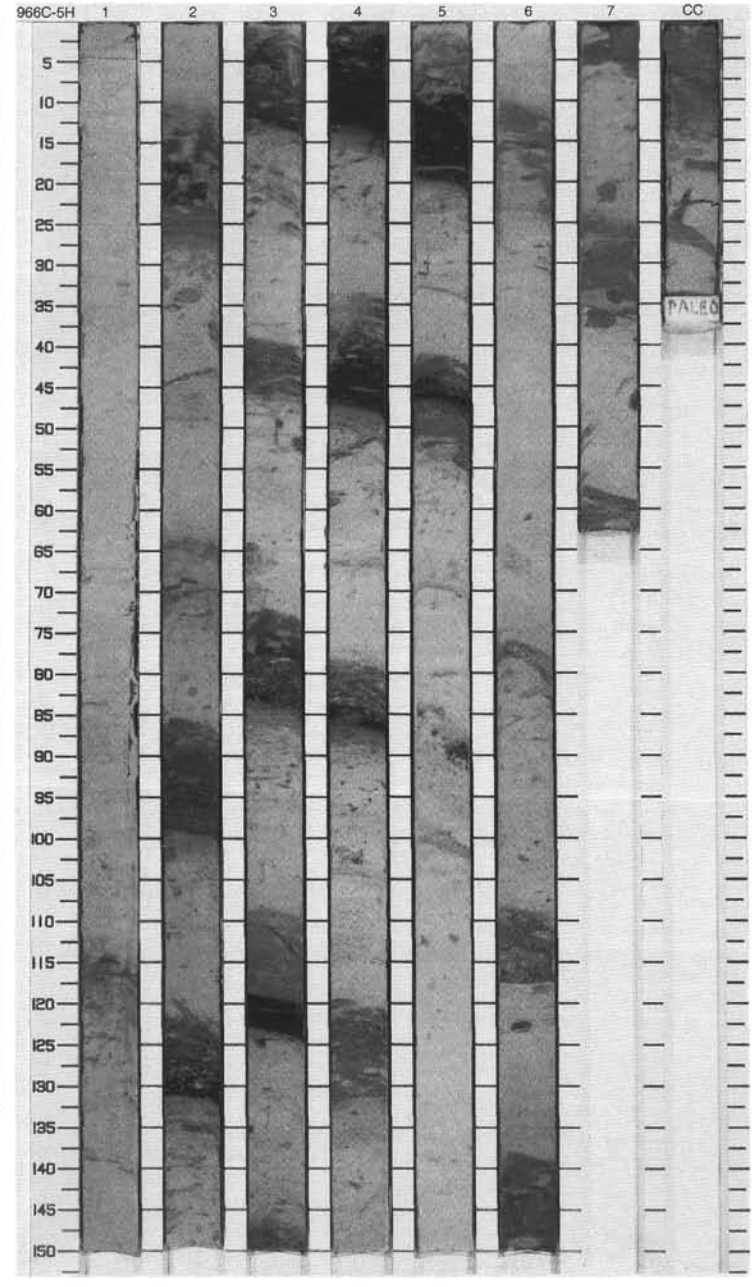
SITE 966 HOLE C CORE 4H CORED 28.5 - 38.0 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 25	0 50 100	1–9		1–7, CC	Pliocene			M	5Y 6/1 To 5Y 7/1; 10YR 7/4; 5Y 6/1 To 5Y 7/1	NANNOFOSSIL OOZE Major Lithology: The dominant lithology in this core is gray (5Y 6/1) to light gray (5Y7/1) NANNOFOSSIL OOZE. The sediment has a mottled appearance and is moderately to heavily bioturbated. Minor Lithologies: This core contains thirteen SAPROPEL beds. All of these beds are moderately to heavily bioturbated and contain foraminifers. General Description: The characteristic green color of the core is replaced by a rust-colored hue in Section 5. *Chondrites* and rare *Zoophycos* burrows are visible.



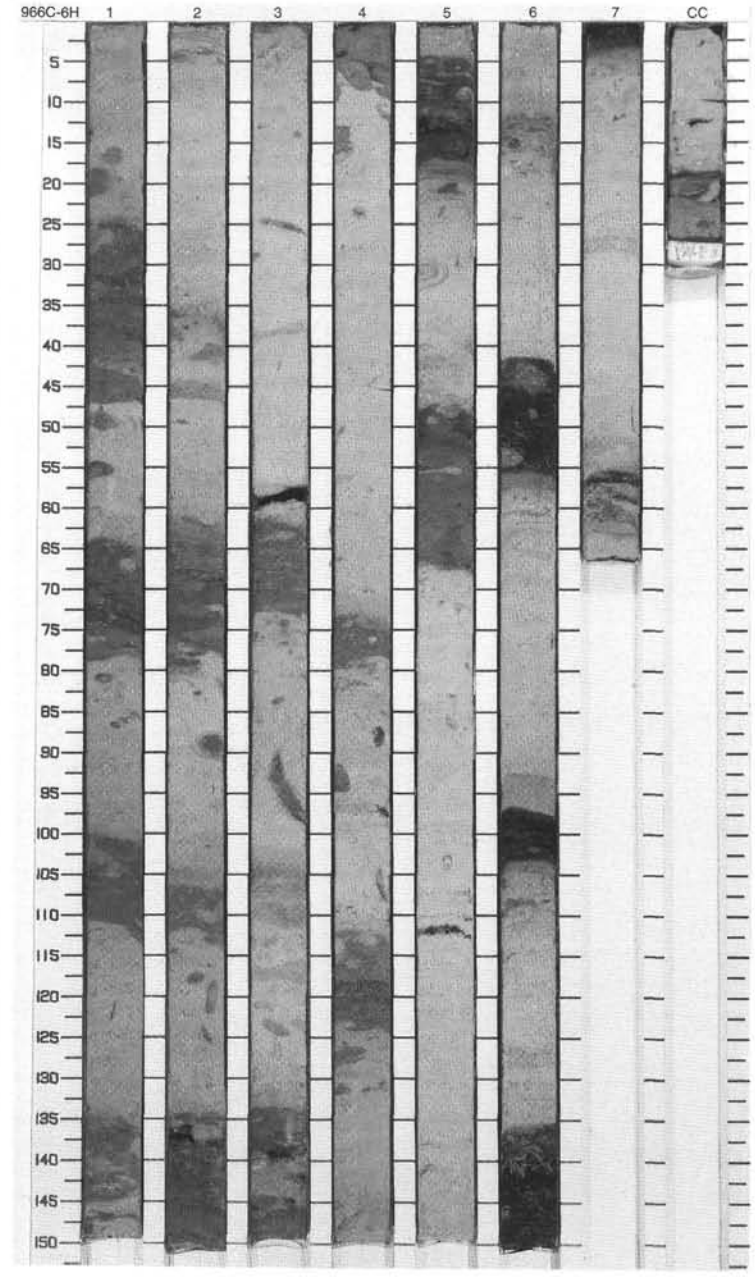
SITE 966 HOLE C CORE 5H CORED 38.0 - 47.5 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 25	0 50 100	1–10		1–7, CC	early Pliocene	P		S, M	5Y 7/1; 5Y 5/2; 5Y 7/1; 5Y 6/1; 5Y 7/1; N7; 5Y 6/2; 5Y 5/2; 5Y 6/2	NANNOFOSSIL OOZE Major Lithology: Mottled light gray (5Y 7/1) to olive gray (5Y 5/2) NANNOFOSSIL OOZE dominates this core, with subdominant clayey foraminifer nannofossil ooze. The sediment is moderately to heavily burrowed and contains traces of geochemical fronts particularly around the larger burrows. Minor Lithologies: The succession contains eighteen SAPROPEL beds. All of these beds show significant bioturbation and gradational contacts are common. Sharp contacts occur, particularly associated with the darker layers. Toward the bottom of Section 6 a FORAMINIFERAL SAND with a sharp basal contact is found. General Description: The sequence contains abundant *Chondrites* and *Zoophycos* burrows. Disseminated pyrite is found throughout as small dark flecks and shell fragments a few millimeters in size are characteristic of the upper two sections of the core. Foraminifers are abundant throughout.



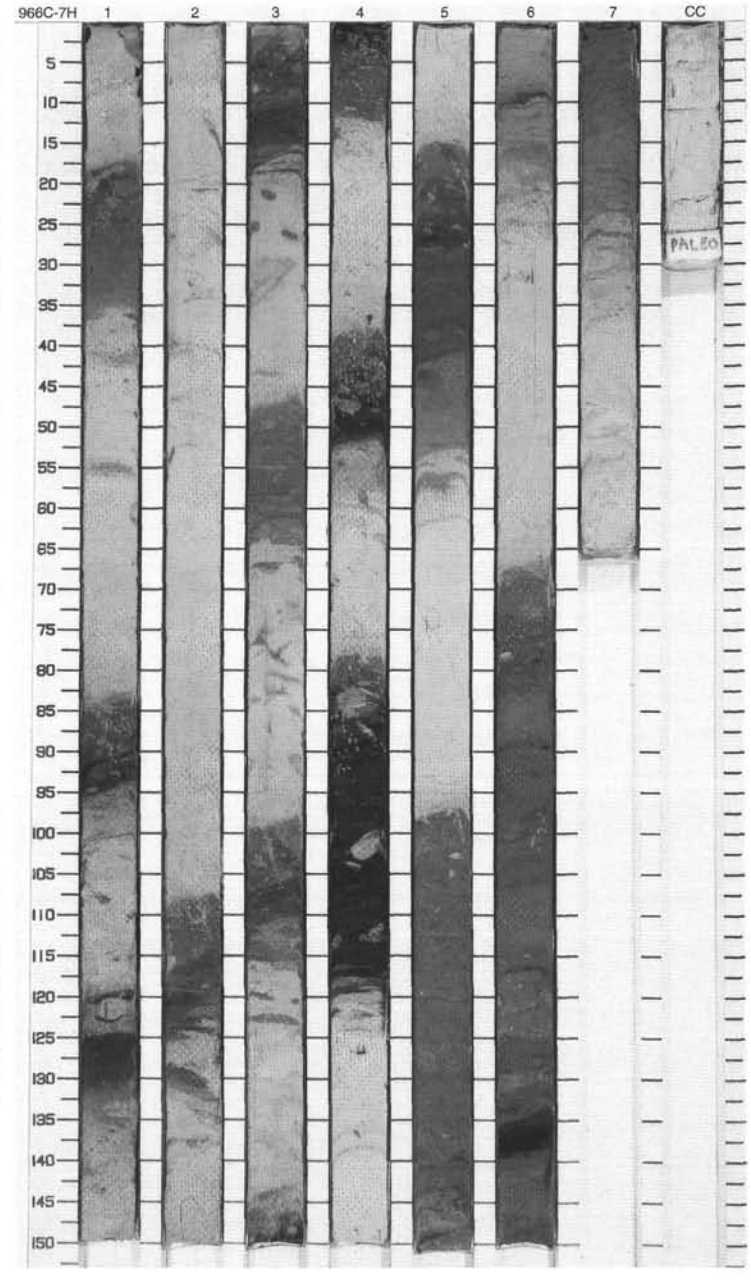
SITE 966 HOLE C CORE 6H CORED 47.5 - 57.0 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 25	0 25 50	1–9		1–7, CC	early Pliocene	P, S, M			5Y 4/2 To 5Y 6/2	NANNOFOSSIL OOZE Major Lithology: Sediment recovered from this core is mainly olive gray (5Y 4/2) to light olive gray (5Y 6/2) NANNOFOSSIL OOZE, with subdominant clayey foraminifer nannofossil ooze and clayey nannofossil ooze with foraminifers. Minor Lithology: Eighteen SAPROPEL beds with sharp and diffuse contacts to the nannofossil oozes are identified. Lamination is not visible. Material is burrowed and of dominantly dark olive gray (5Y 4/2) color. Significant amounts of foraminifers, which are enriched in the burrows, are found in all beds. Varying degrees of oxidization are observed. General Description: The sediment is bioturbated throughout. Slight color banding on a mm-scale and enrichment in foraminifers is found in several intervals.



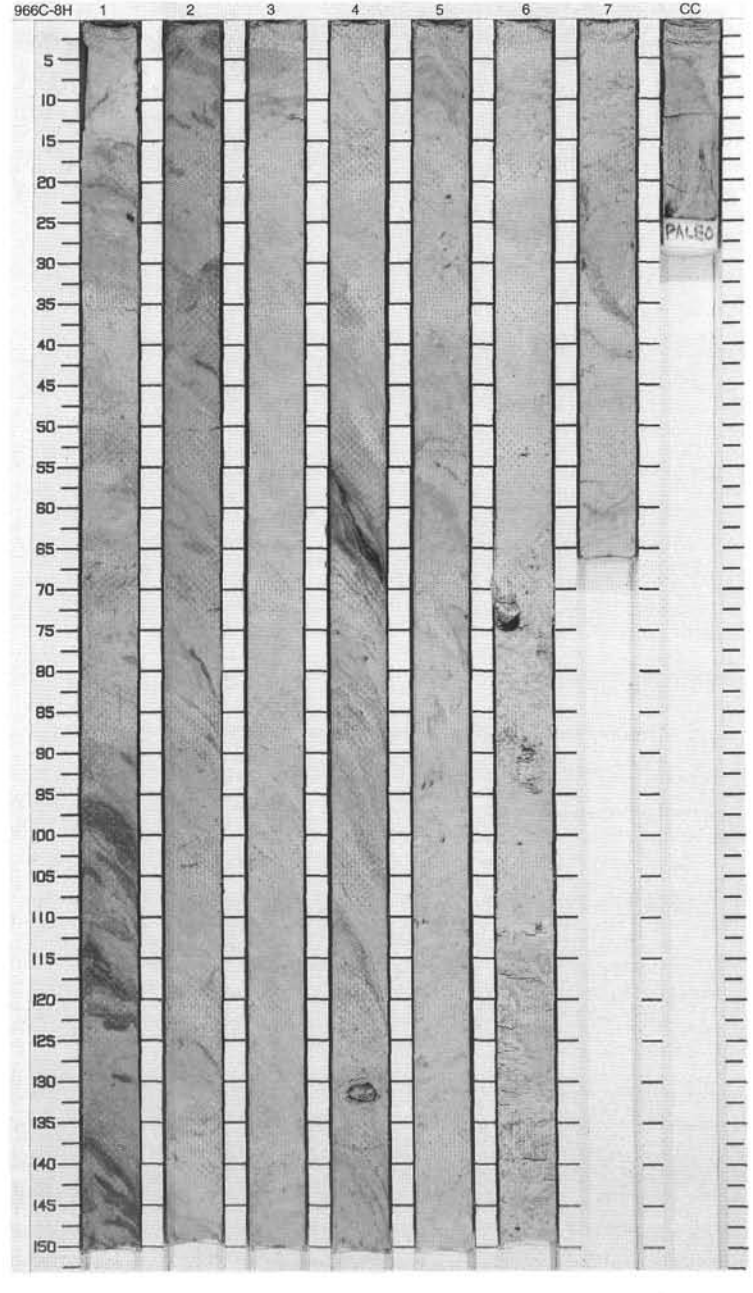
SITE 966 HOLE C CORE 7H CORED 57.0 - 66.5 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 2	0 25	−50 0 50	1–9		1–7, CC	early Pliocene	P, A		M	5Y 7/1 To 5Y 3/2	NANNOFOSSIL OOZE Major Lithology: NANNOFOSSIL OOZE is the dominant lithology recovered from this core. Sediments are largely bioturbated (*Zoophycos* and *Chondrites*) and contain disseminated pyrite in several sections. Faint changes in color (5Y 7/1 to 5Y 3/2) are observed throughout. Minor Lithologies: Fourteen SAPROPEL beds occur in this core. The beds extend to a maximum of 52 cm in thickness. Most beds are largely oxidized and heavily burrowed. Both sharp and irregular contacts to the surrounding sediment are observed. Laminations are faint or absent. Foraminifers occur in significant, but variable amounts in all dark gray layers (5Y 4/1 to 5Y 3/1). Three thin ash layers (up to 6 mm in thickness) are found in Section 6.



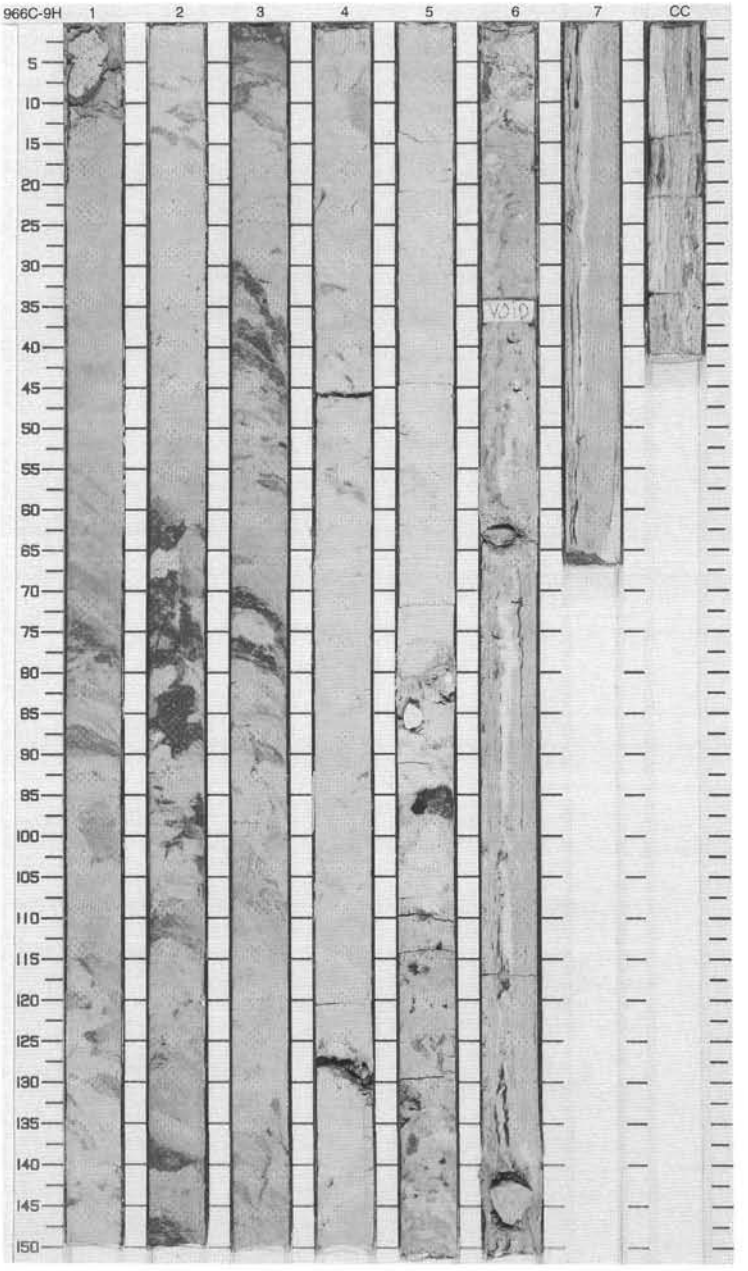
SITE 966 HOLE C CORE 8H CORED 66.5 - 76.0 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–9		1	early Pliocene	P		S	5Y 5/1 To 5Y 8/1	NANNOFOSSIL OOZE and NANNOFOSSIL OOZE WITH FORAMINIFERS Major Lithologies: Gray (5Y 5/1) to white (5Y 8/1) NANNOFOSSIL OOZE and NANNOFOSSIL OOZE WITH FORAMINIFERS are the dominant lithologies recovered from this core. The sediment is largely homogeneous and slightly to moderately bioturbated. General Description: Dipping thin color bands are present in Sections 1 through 5. Sections 4 and 6 contain subangular limestone clasts.
		2		P				
		3		P				
		4		P, P, P, P				
		5		P				
		6						
		7						
		CC				M		



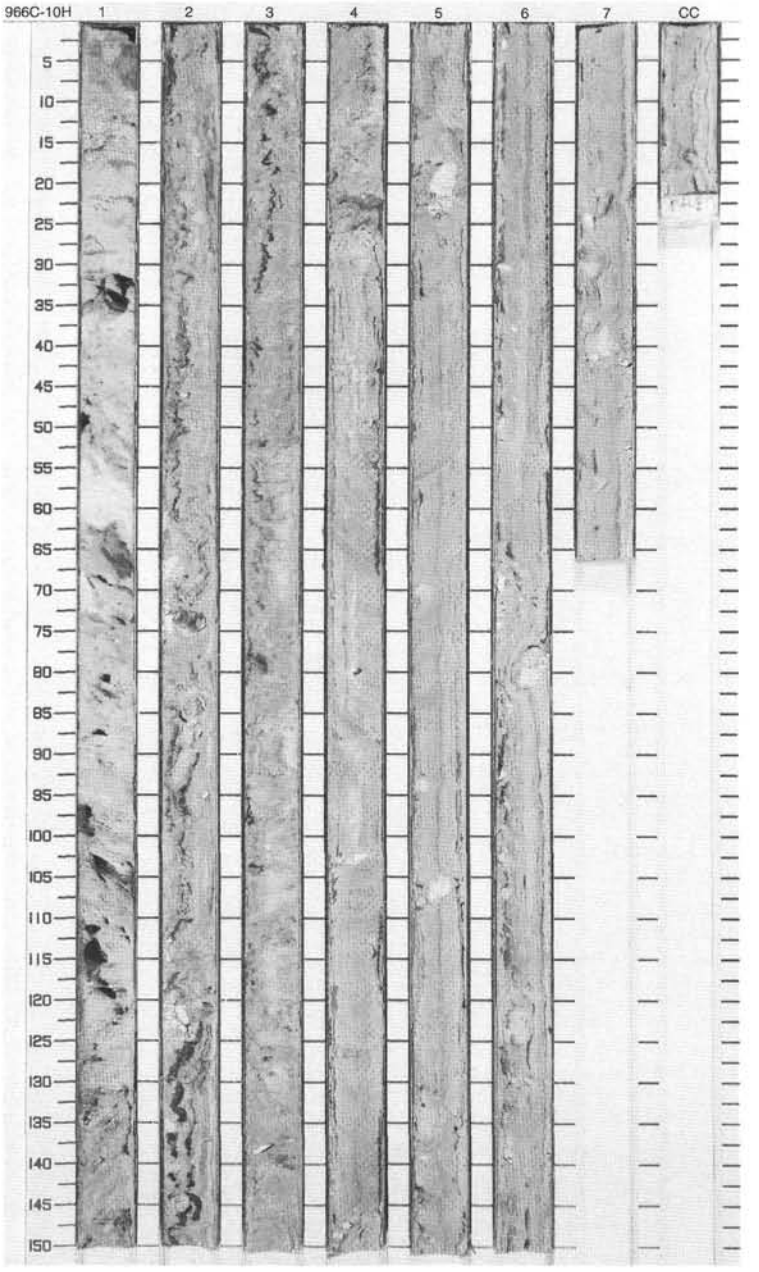
SITE 966 HOLE C CORE 9H CORED 76.0 - 85.5 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1		1	early Pliocene			S	5Y 6/1 To 5GY 4/1	NANNOFOSSIL OOZE Major Lithologies: Sediment recovered from this core is gray (5Y 6/1) to dark greenish gray (5GY 4/1) NANNOFOSSIL OOZE, which is moderately to heavily bioturbated. Subdominant lithologies included calcareous sand and silt and siliceous calcareous sand with rock fragments. Minor Lithology: Three SAPROPELS with diffuse tops and bases are found in this core. Laminations and foraminifers are absent. Sapropels are heavily burrowed and of olive gray color (5Y 4/2). General Description: The sediment in this core is homogeneous and shows occasional color banding. Lithoclasts of limestone reach up to 10 cm in diameter and occur both in nannofossil oozes and in a brownish matrix that may represent oxidized and burrowed sapropels. Foraminifers and pyrite are observed in several intervals. The material found below Section 6, 35 cm, shows irregular sedimentary patterns and was sucked into the core liner during the drilling process.
2		2				S		
3		3				S		
4		4				S S		
5		5						
6		6						
7		7						
10		CC				M		



SITE 966 HOLE C CORE 10H CORED 85.5 - 95.0 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–9		1–7, CC	early Pliocene	◆ ◇ ◇	WWW	M	7.5YR N8/0	CALCAREOUS OOZE Major Lithology: White (7.5 YR N8/0) CALCAREOUS OOZE is the dominant lithology recovered from this core. In Section 1, 0–50 cm, the material is rich in pebbles and lithoclasts of limestone. Below that interval, the fine-grained sediment is foraminifer-bearing and homogeneous. General Description: Sediment of Sections 2 through 7 was sucked into the core liner during the drilling process. Smashed plastic pieces of the core liner and several limestone particles are scattered throughout this interval.



SITE 966 HOLE C CORE 11H CORED 95.0 - 95.1 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
								CALCARENITE Major Lithology: One CALCARENITE clast was the only material recovered in this core.

SITE 966 HOLE C CORE 12X CORED 95.1 - 102.8 mbsf

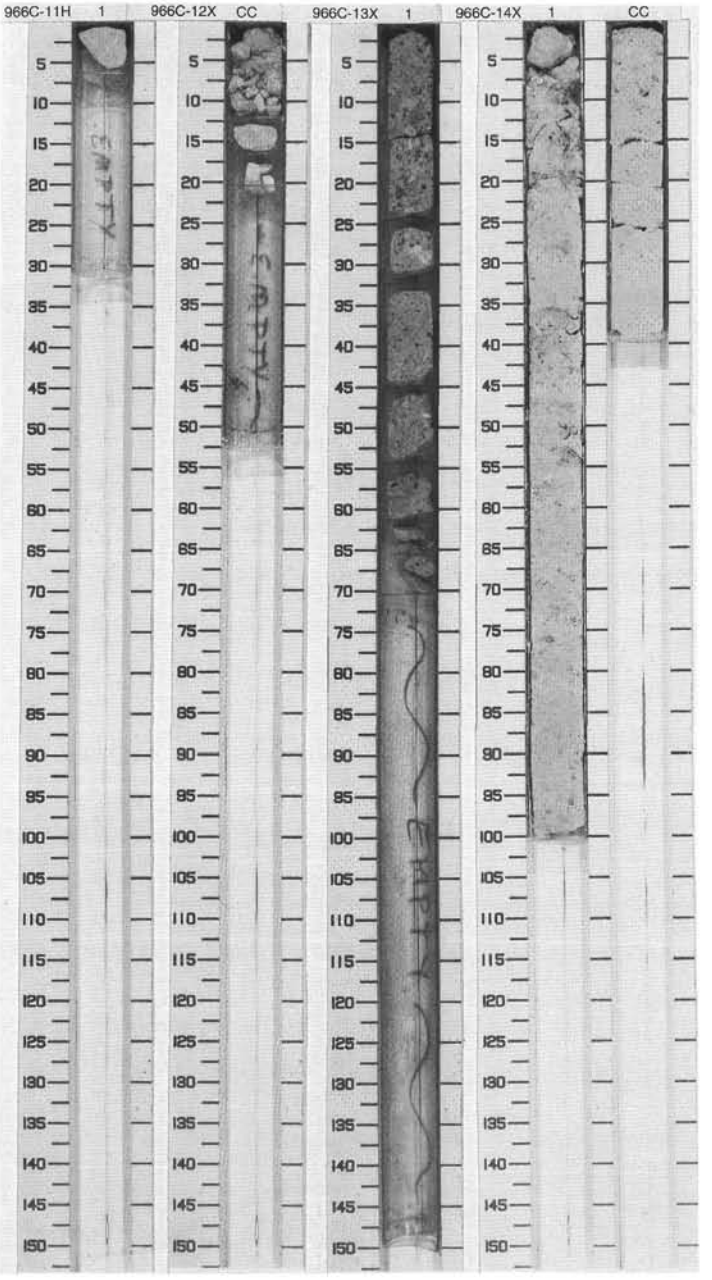
Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC						CALCARENITE Major Lithology: The only material recovered in this core consists of clasts of vuggy, bioclastic CALCARENITE interbedded with a finer grained CALCARENITE with packstone to grainstone fabric. General Description: Thin section sample taken from clast.

SITE 966 HOLE C CORE 13X CORED 102.8 - 107.8 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		1				S		CALCAREOUS CONGLOMERATE Major Lithologies: The sediment in this core contains subrounded to rounded clasts of CALCAREOUS CONGLOMERATE up to 5 cm in diameter. These clasts contain calcareous algae, sparry limestone, gastropods, and soft brown material identified as opaline silica. A few clasts show evidence of tectonic brecciation.

SITE 966 HOLE C CORE 14X CORED 107.8 - 112.6 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1		1 CC	Miocene			S		CALCEREOUS CONGLOMERATE Major Lithology: The rock in this core is a matrix-supported CALCEREOUS CONGLOMERATE with angular clasts up to 5 cm in diameter in a greenish calcareous muddy or silty matrix.



SITE 966 HOLE C CORE 15X CORED 112.6 - 117.4 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC						CALCARENITE and MICRITIC LIMESTONE Major Lithologies: This core consists of coarse CALCARENITE interlaminated with gray-green MICRITIC LIMESTONE. This calcarenite is scoured down into the micrite causing disruption of the laminae and small-scale flame structures.

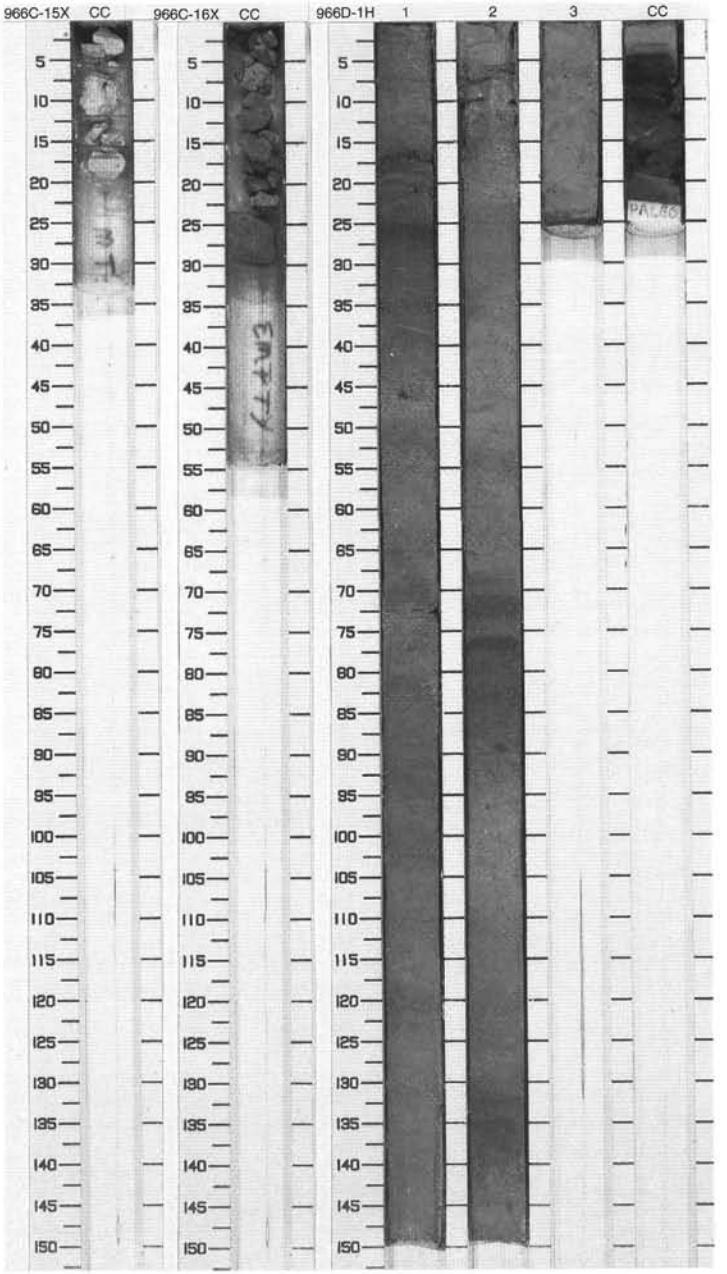
SITE 966 HOLE C CORE 16X CORED 117.4 - 122.2 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC						BRECCIA Major Lithology: This sediment in this core is a BRECCIA with clasts up to 1 cm in size. The clasts are partially calcareous.

966C 17X NO RECOVERY

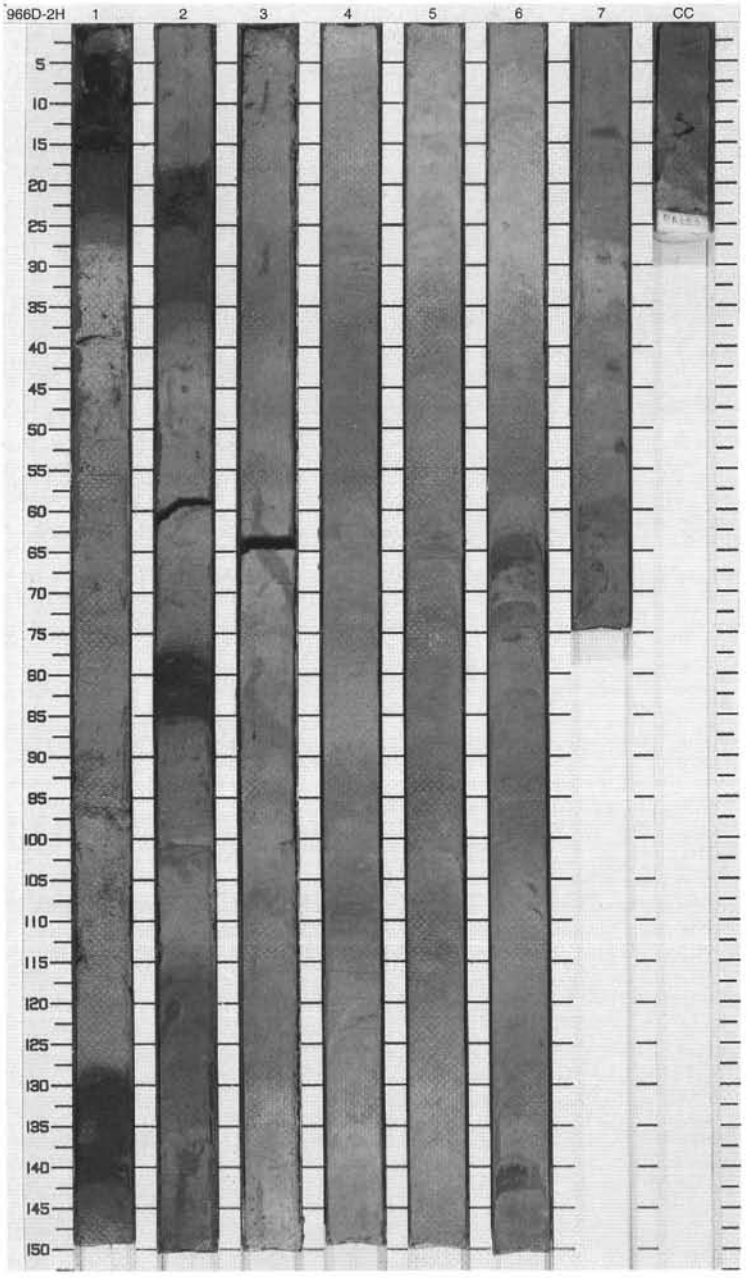
SITE 966 HOLE D CORE 1H CORED 0.0 - 3.5 mbsf

GRAPE (g/cm3)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 20	0 50 100	1 2 3		1 2 3 CC	late Pleistocene			S S S M S	10Y 5/4 To 7.5YR 6/2	NANNOFOSSIL OOZE Major Lithology: Sediment recovered from this core is dominantly yellowish-brown (10YR 5/4) to pinkish-gray (7.5YR 6/2) NANNOFOSSIL OOZE. Foraminifer nannofossil clay and nannofossil foraminifer ooze are subdominant. Material is slightly to moderately burrowed and contains significant amounts of foraminifers. Minor Lithology: The three SAPROPELS found in this core have irregular tops and bases burrows. Color varies from gray (5Y 6/1) to dark olive gray (5Y 3/2). Laminae and foraminifers are observed.



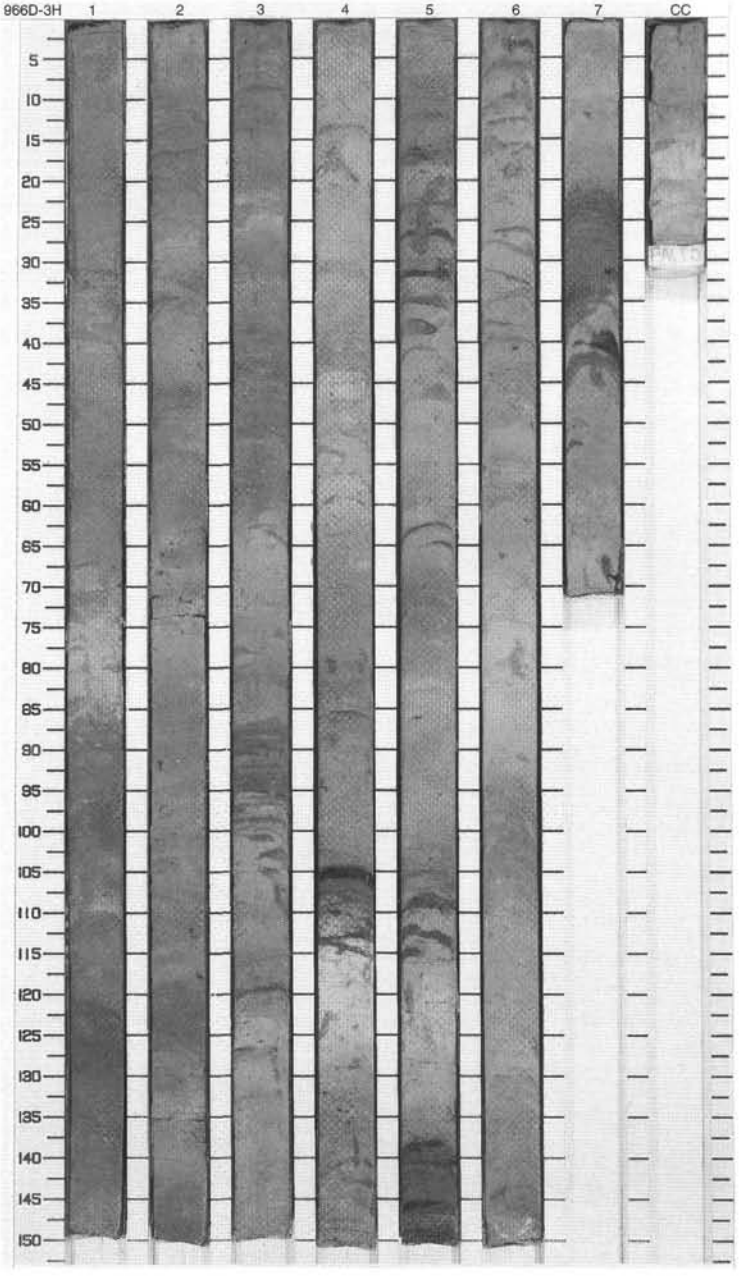
SITE 966 HOLE D CORE 2H CORED 3.5 - 13.0 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 20	0 100 200	1–10		1–7, CC	middle Pleistocene			M	5Y 4/1 To 5Y 6/2	NANNOFOSSIL OOZE Major Lithology: Gray (5Y6/1) NANNOFOSSIL OOZE is the major lithology in this core. Sediments are slightly (Sections 1–3) to heavily burrowed (Sections 4–7). Minor Lithology: Five dark olive gray (5Y 4/1) SAPROPEL beds occur in this core. These beds range in thickness from 4 to 24 cm. Foraminifers and burrows of *Zoophycos* are found in Sections 1 and 6. General Description: Foraminifers, shell fragments, and pyrite flecks occur throughout the core. Color banding (5Y 4/1 to 5Y 6/2) on a centimeter scale is found occasionally.



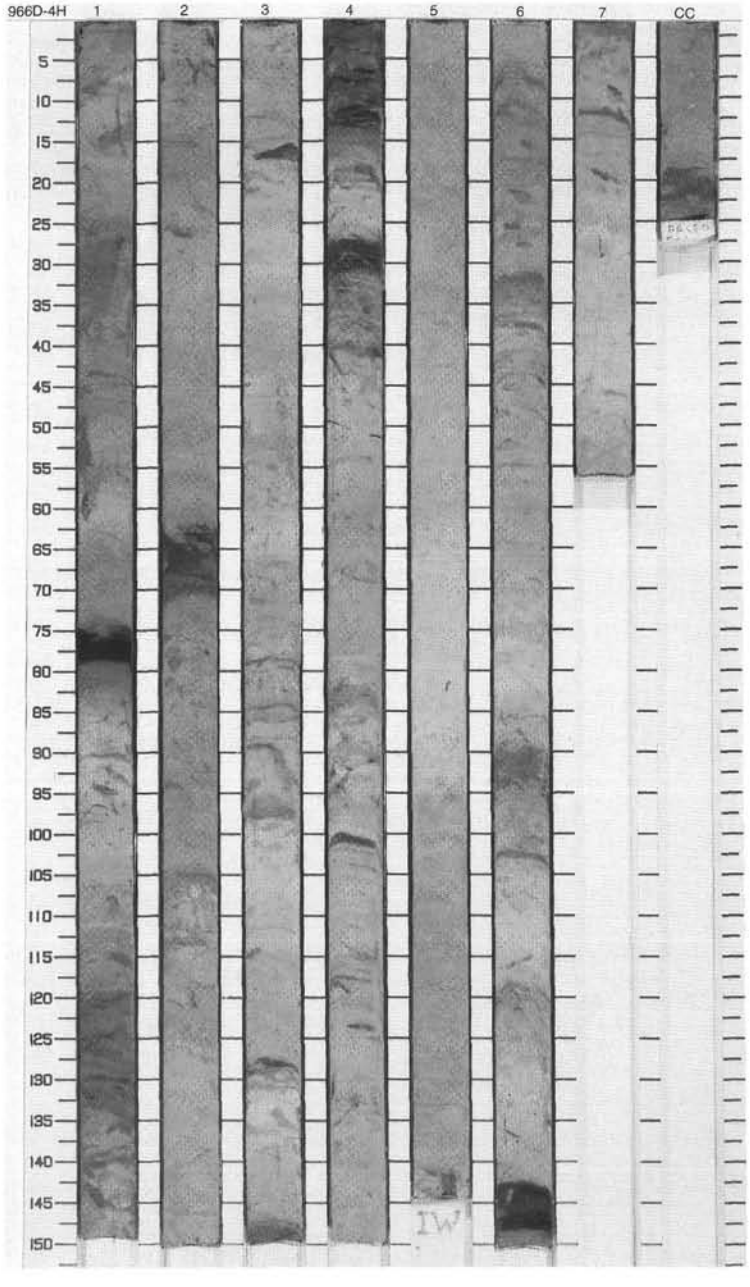
SITE 966 HOLE D CORE 3H CORED 13.0 - 22.5 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 20	0 50 100	1–10		1–7, CC	early Pleistocene–middle Pleistocene			S S S M	5Y 6/1; 10YR 6/2; 5Y 6/1 To 5Y 6/2	FORAMINIFER CLAYEY NANNOFOSSIL OOZE Major Lithology: The dominant lithology in this core is a light olive gray (5Y 6/2) to gray (5Y 6/1) FORAMINIFER CLAYEY NANNOFOSSIL OOZE. Nannofossil ooze and foraminifer nannofossil ooze are subdominant. Minor Lithologies: Three moderately to heavily burrowed dark gray (5Y 4/1) to very dark gray (5Y 3/1) SAPROPELS occur. The topmost, at Section 4, 105–107 cm is underlain by a zone of very pale (relative to the dominant lithology) light gray (5Y 7/1) sediment. General Description: Section 1 through Section 4, 105 cm contains pale to dark color bands and is strongly bioturbated with a variety of trace fossils including *Chondrites*, *Planolites*, and *Zoophycos*. A light brownish gray interval is present in Section 2. There are several foraminifer-rich horizons.



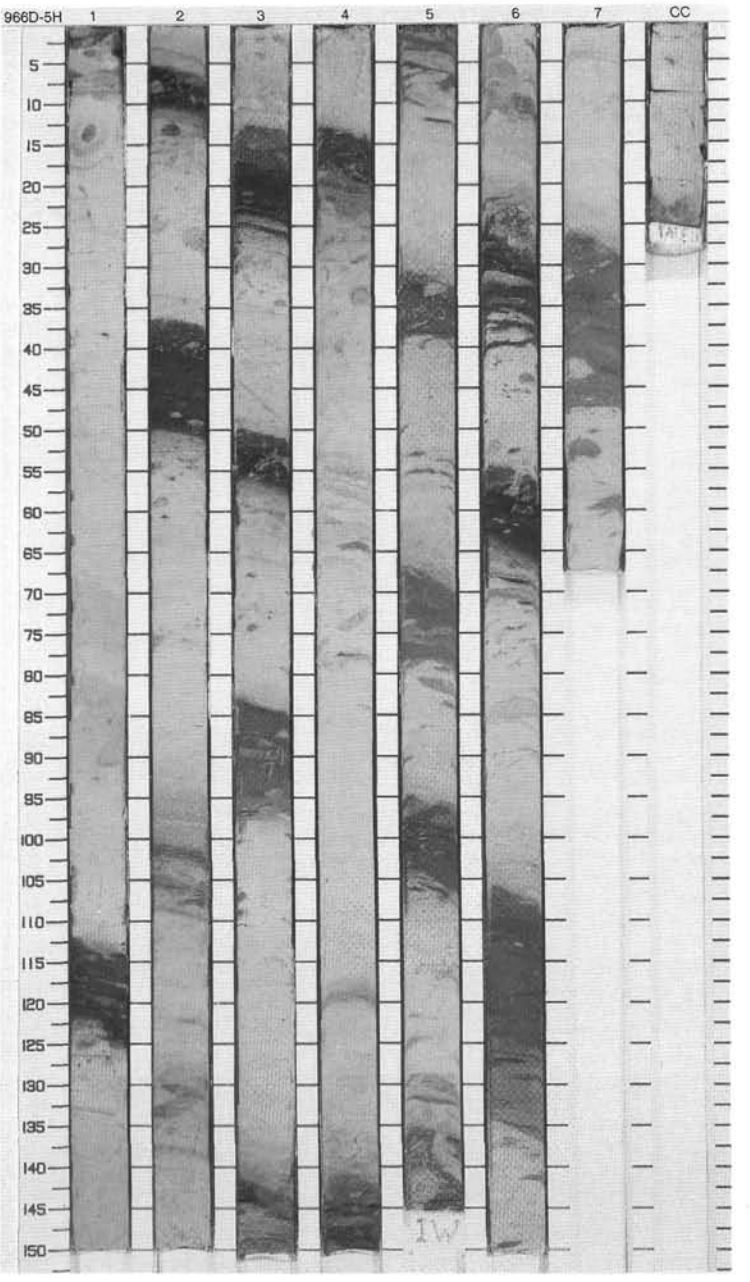
SITE 966 HOLE D CORE 4H CORED 22.5 - 32.0 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 50	0 50 100	1–9		1–7, CC	late Pliocene–early Pleistocene			IW, M	5Y 6/1 To 5G 6/1	FORAMINIFER CLAYEY NANNOFOSSIL OOZE Major Lithology: The dominant lithology is a light gray or gray (5Y 6/1) to greenish gray (5G 6/1) FORAMINIFER CLAYEY NANNOFOSSIL OOZE. Minor Lithologies: Six dark gray (5Y 4/1) to very dark gray (5Y 3/1) SAPROPELS occur in this core. In addition to these beds, several zones of dark burrow fill occur that may represent the bioturbated remnants of sapropels. General Description: The entire core is moderately to strongly bioturbated other than in some of the sapropel horizons (see minor lithology description).



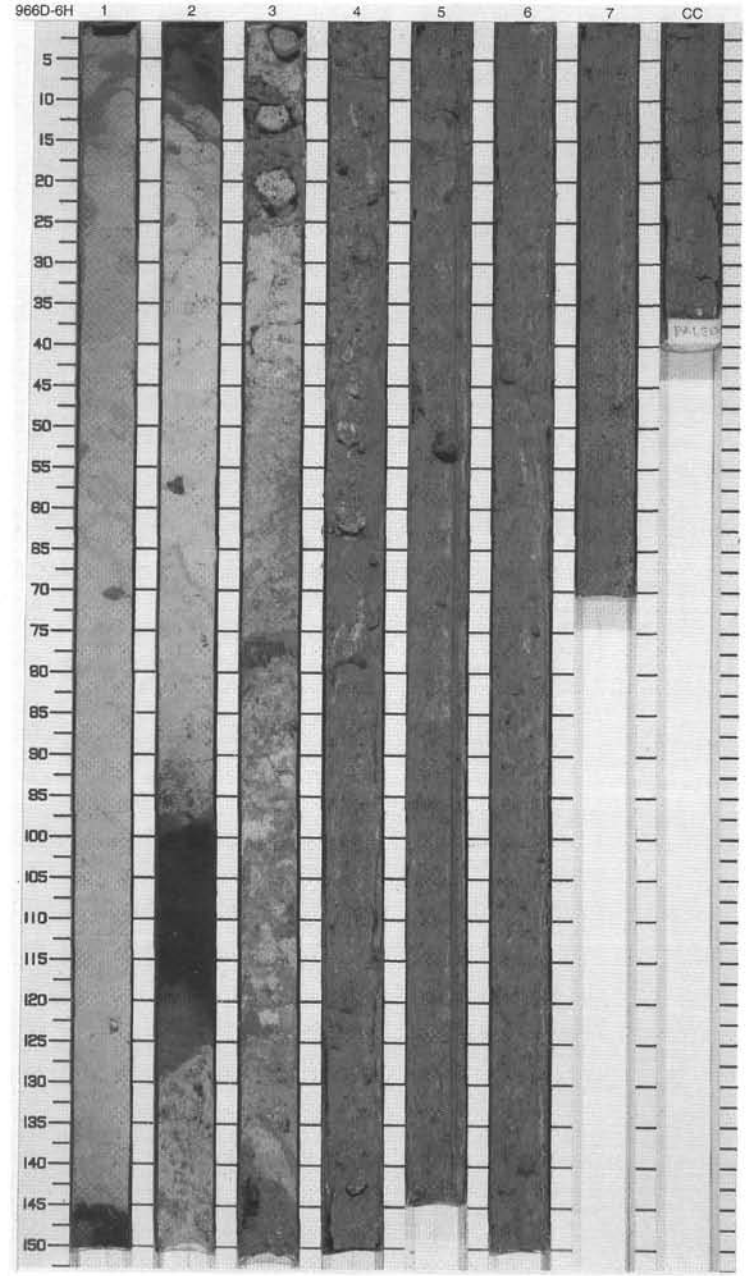
SITE 966 HOLE D CORE 5H CORED 32.0 - 41.5 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 25	0 50 100	1–10		1–7, CC	late Pliocene			I, M	5Y 7/1 To 5Y 6/1	FORAMINIFER CLAYEY NANNOFOSSIL OOZE Major Lithology: The dominant lithology is a light gray (5Y 7/1) to gray (5Y 6/1) or greenish gray (5G 6/1) FORAMINIFER CLAYEY NANNOFOSSIL OOZE. Minor Lithologies: Fifteen olive gray (5Y 5/2) through dark gray (5Y 4/1) to very dark gray (5Y 3/1) SAPROPEL beds were recorded in this core. Most of these beds are heavily bioturbated particularly across the upper boundary; some are relatively undisturbed in the lower part and show sharp lower contacts. General Description: The dominant lithology is moderately to heavily bioturbated throughout with common *Chondrites*, *Planolites*, and probable *Zoophycos* burrows. Foraminifer-sand layers occur in the upper part of the core.



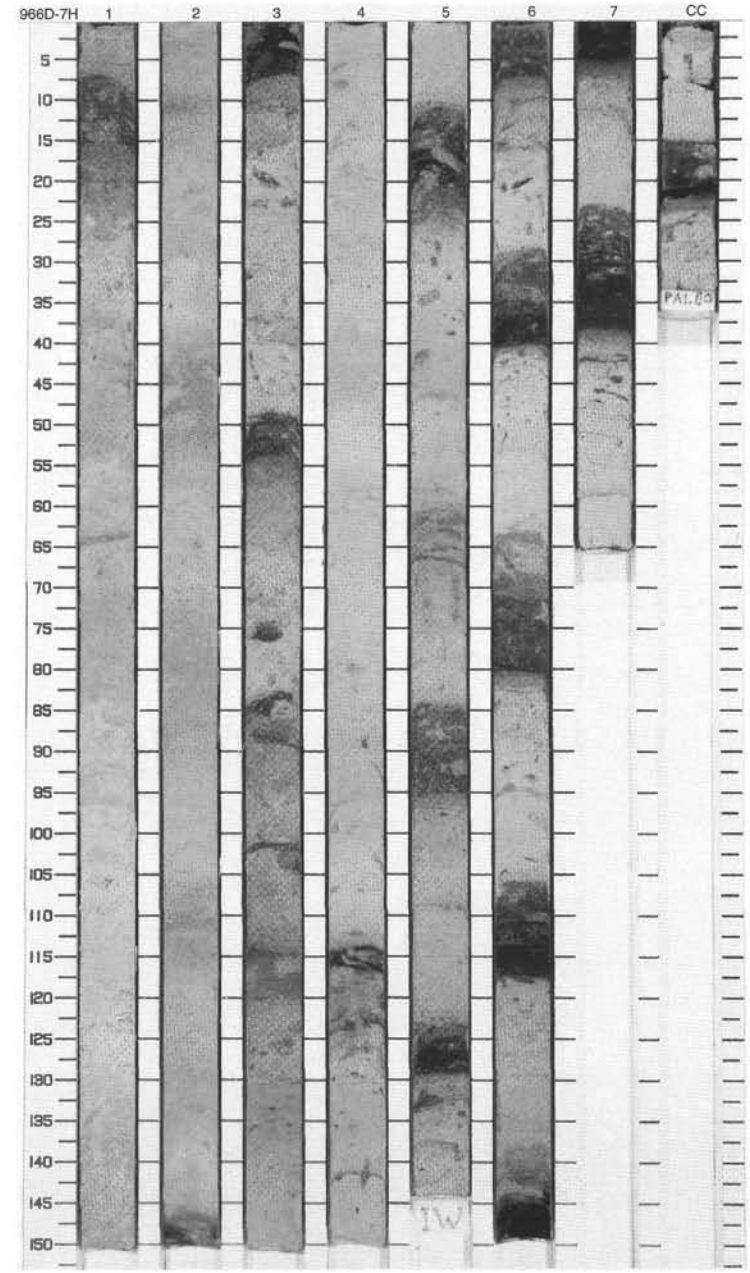
SITE 966 HOLE D CORE 6H CORED 41.5 - 51.0 mbsf

GRAPE (g/cm³)	Reflectance (%) (550 nm)	Magnetic susceptibility[1]	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5	0 25	0 25 50	1–9		1–7, CC	Pliocene			M	5Y 6/1 To 5Y 7/1	FORAMINIFER CLAYEY NANNOFOSSIL OOZE Major Lithology: The dominant lithology is a gray (5Y 6/1) to light gray (5Y 7/1) FORAMINIFER CLAYEY NANNOFOSSIL OOZE. Minor Lithologies: Twenty-one olive gray (5Y 4/2) to very dark gray (5Y 3/1) and black (5Y 2/1) SAPROPEL beds occur in this core. Most of the beds are moderately to heavily bioturbated other than the darkest beds in Section 1, 39–53, and 73–79 cm in which strong bioturbation is restricted to the upper contact. Several horizons of FORAMINIFER SAND occur in this core, including one immediately above the sapropel in Section 1, 73–79 cm. General Description: The core is moderately to heavily bioturbated throughout with abundant *Planolites* and *Zoophycos*. *Chondrites* is particularly common in the sapropel horizons, sometimes as the only trace fossil present.

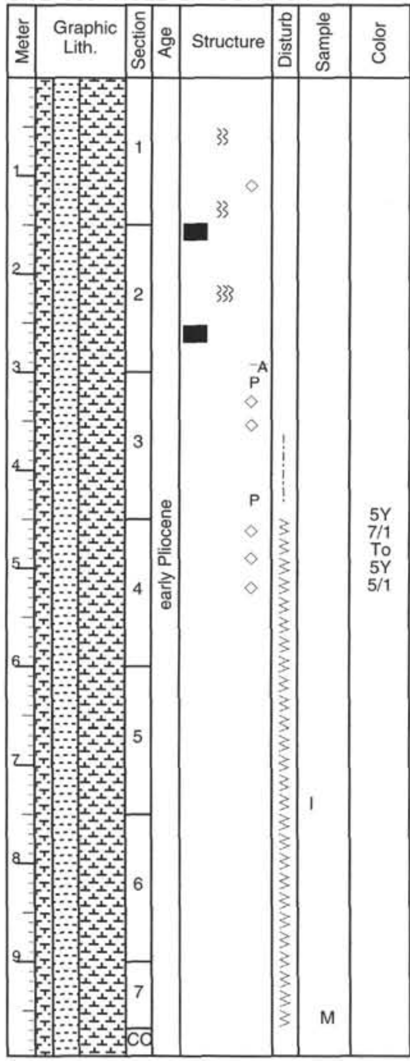


SITE 966 HOLE D CORE 7H CORED 51.0 - 60.5 mbsf

GRAPE (g/cm³)	Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 1.5 2	1–9		1–7, CC	early Pliocene			M	5Y 6/1	FORAMINIFER CLAYEY NANNOFOSSIL OOZE Major Lithology: The dominant lithology is a light gray (5Y 7/1) FORAMINIFER CLAYEY NANNOFOSSIL OOZE. Minor Lithologies: Sixteen gray (5Y 5/1) to very dark gray (5Y 3/1) and black (5Y 2/1) SAPROPELS occur. Some zones of intense burrows filled with darker gray sediment may represent the remnants of such horizons. The sapropel in Section 1, 123 cm, contains a FORAMINIFER SAND. General Description: The core is moderately bioturbated throughout with a range of trace fossils including *Chondrites* which is particularly abundant in the sapropel horizons.



SITE 966 HOLE D CORE 8H CORED 60.5 - 70.0 mbsf



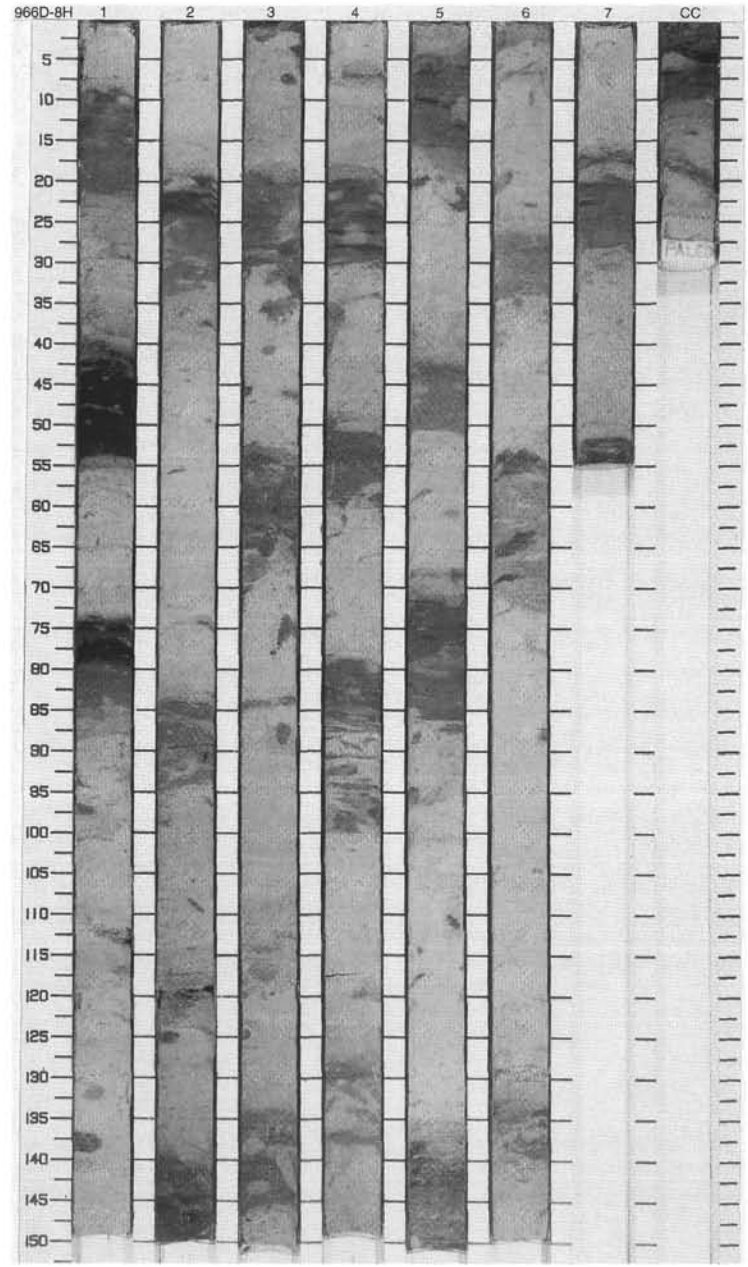
Description

FORAMINIFER CLAYEY NANNOFOSSIL OOZE

Major Lithology:
The dominant lithology in this core consists of light gray (5Y 7/1) to gray (5Y 5/1) FORAMINIFER CLAYEY NANNOFOSSIL OOZE.

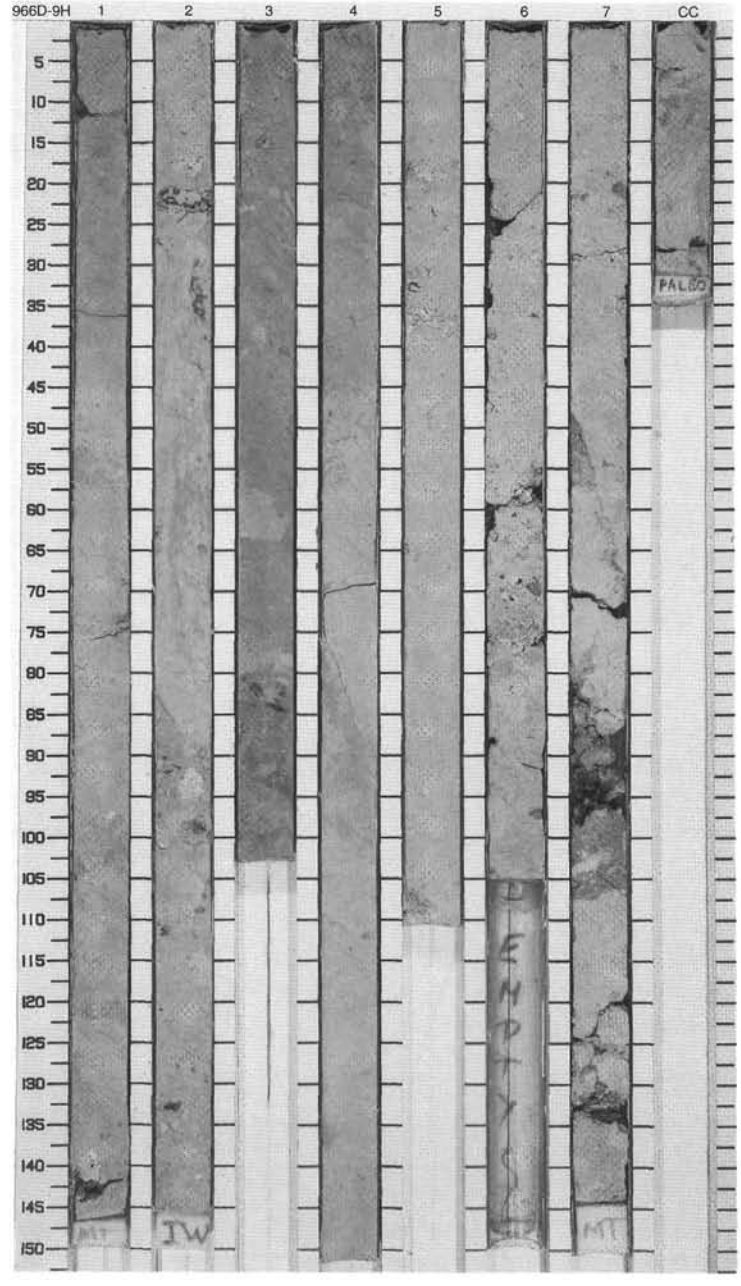
Minor Lithologies:
Two distinct very dark gray (5Y 3/1) and black (5Y 2.5/1) SAPROPELS occur at the top of the cored interval. The sapropels are moderately to heavily bioturbated, especially at the upper boundaries.

General Description:
From the top of Section 4 to the bottom of the core, the primary structure of the sediment has been destroyed by "suck-in" during coring.



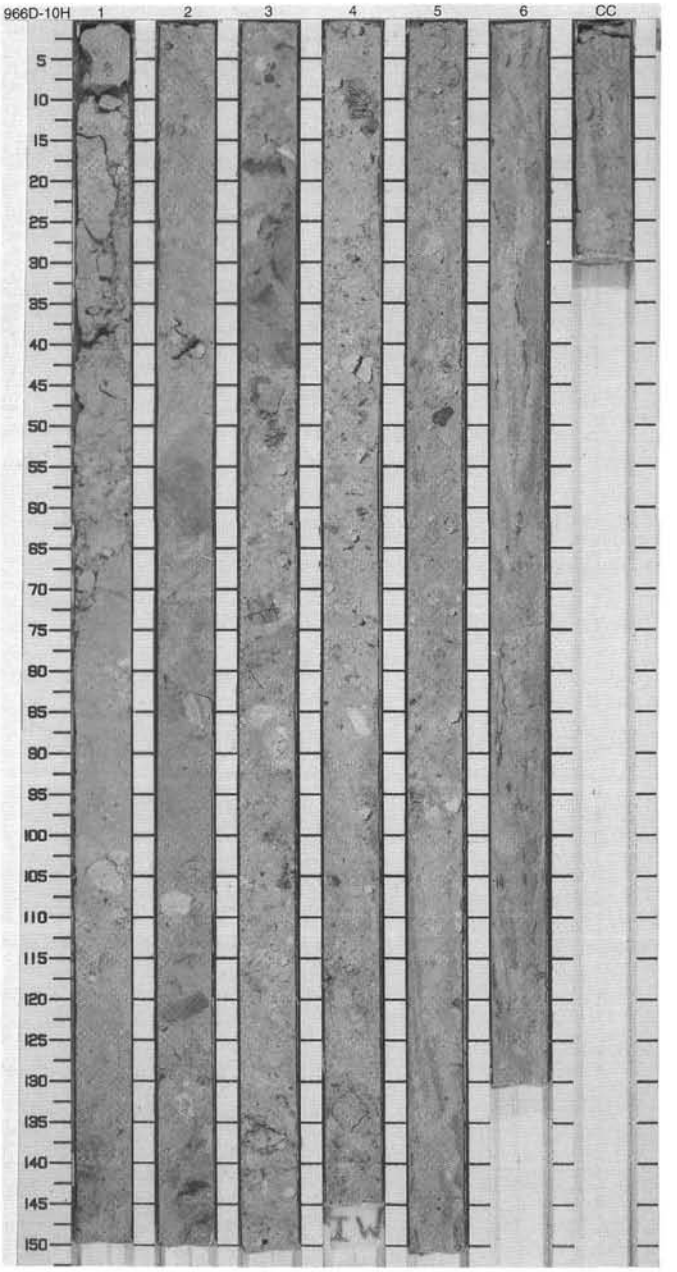
SITE 966 HOLE D CORE 9H CORED 70.0 - 79.5 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–9		1–7, CC	early Pliocene			I, S, M, S, S, M	10Y 8/1; 5Y 6/2; 5Y 8/1; 10Y 3/1	NANNOFOSSIL OOZE AND FORAMINIFER NANNOFOSSIL OOZE Major Lithology: This core contains white (5Y 8/1) to light gray (5Y 6/2) NANNOFOSSIL OOZE and FORAMINIFER NANNOFOSSIL OOZE. Rare LIMESTONE CLASTS (some corals) between 1 and 3 cm in diameter, are scattered throughout. General Description: Primary sedimentary fabric in this core has, in the main, been destroyed by drilling.



SITE 966 HOLE D CORE 10H CORED 79.5 - 84.5 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–9		1–6, CC	early Pliocene	◇		S, I, M	10Y 7/1	CALCAREOUS MIXED SEDIMENT Major Lithology: The major lithology in this core is light gray (10Y 7/1) CALCAREOUS MIXED SEDIMENT with interlayered coarser and finer bands and angular clasts of mainly limestone up to 4.5 cm in size. Limestone clasts include bioclastic and micritic facies. Minor Lithologies: The minor lithologies in this core include a well-indurated CALCAREOUS SILTY CLAY with scattered angular limestone pebbles up to 3 cm in size. Traces of parallel bedding are preserved. Occasional traces of highly disrupted organic rich layers were also noted. General Description: Much of the fabric in this core has been destroyed by drilling.

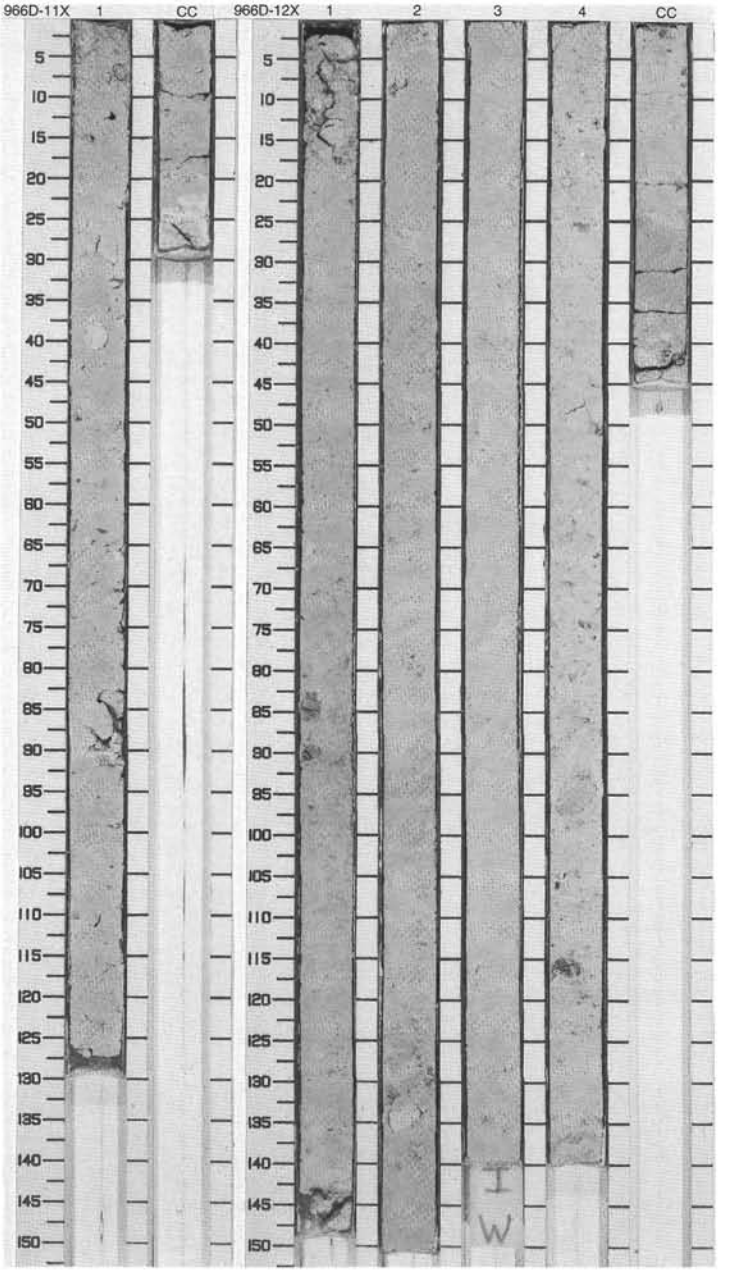


SITE 966 HOLE D CORE 11X CORED 84.5 - 88.5 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1		1			W	S	5Y 7/1	CALCAREOUS MIXED SEDIMENT Major Lithology: This core is dominated by light gray (5Y 7/1) CALCAREOUS MIXED SEDIMENT with angular limestone clasts up to 4 cm in size and a silty nannofossil clay matrix.
		CC				M		

SITE 966 HOLE D CORE 12X CORED 88.5 - 93.3 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1		1					10Y 8/2	CALCAREOUS MIXED SEDIMENT Major Lithology: This core is dominated by white (5Y 8/1) CALCAREOUS MIXED SEDIMENT. The core contains clasts which are typically porous, up to 6 cm in size, and lie within a chalky matrix. Some thin (less than 10 cm) intervals show vague primary lamination and slight size grading. Minor Lithologies: These are intercalations of fine- to medium-grained CALCAREOUS SILTS and CALCAREOUS SILTY CLAYS. Diagenetic chemical fronts crosscut the lamination in places. In addition, minor occurance of laminated BIOCLASTIC CALCARENITE was noted. General Description: This core shows marked drilling disturbance.
2		2						
3		3				I	10Y 8/1	
4								
5		4						
6		CC			W	M		



SITE 966 HOLE D CORE 13X CORED 93.3 - 98.1 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1		1				S	10Y 8/1	CALCAREOUS MIXED SEDIMENT Major Lithology: This core is dominated by white (5Y 8/1) CALCAREOUS MIXED SEDIMENT with limestone clasts. The clasts range from angular to occasionally subrounded. Many clasts are greenish gray (5GY 6/1) and porous. Some clasts show internal fine lamination especially in finer grained micrite.
2		2						
		CC				I S		

Minor Lithology:
Thin (<2 cm) intervals of CALCAREOUS SILT AND CLAY are observed. Clay intervals are finely laminated and relatively well indurated.

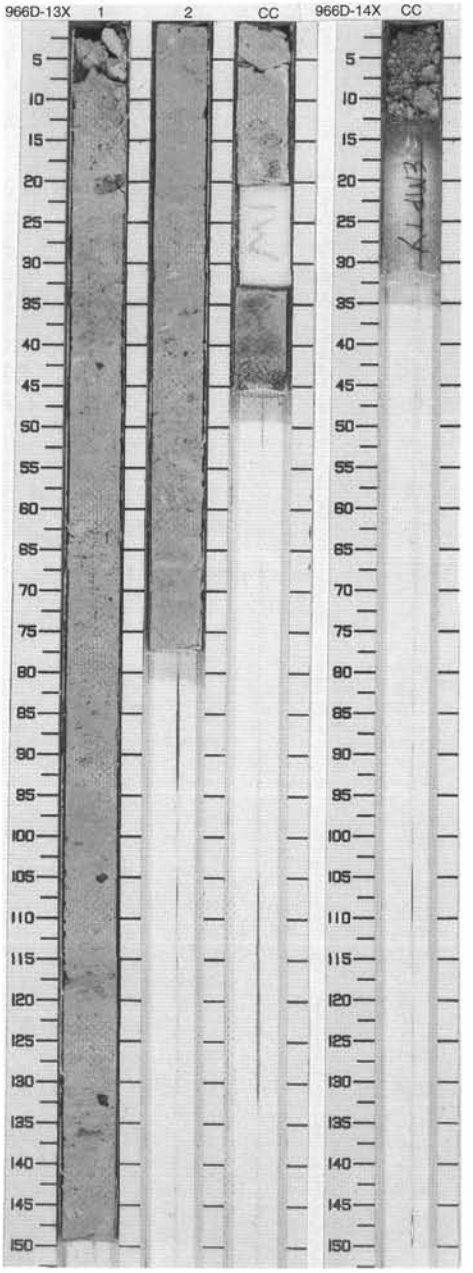
General Description:
Although this core shows evidence of drilling disturbance an original sedimentary fabric could still be recognized in places.

SITE 966 HOLE D CORE 14X CORED 98.1 - 102.9 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC						LIMESTONE

Major Lithology:
This core consists of white (5Y 8/1) and greenish gray (5G 6/1) gravel-sized LIMESTONE clasts.

General Description:
Drilling action may have produced the fabric of this core.



SITE 966 HOLE D CORE 15X CORED 102.9 - 107.7 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC						LIMESTONE BRECCIA

Major Lithology:
This core recovered a white (10Y 8/1) LIMESTONE BRECCIA. The breccia matrix consists of white (10Y 8/1) calcareous clay. The clay is well indurated and laminated. Individual clasts are porous and weathered.

General Description:
Drilling disturbance is evident throughout the core.

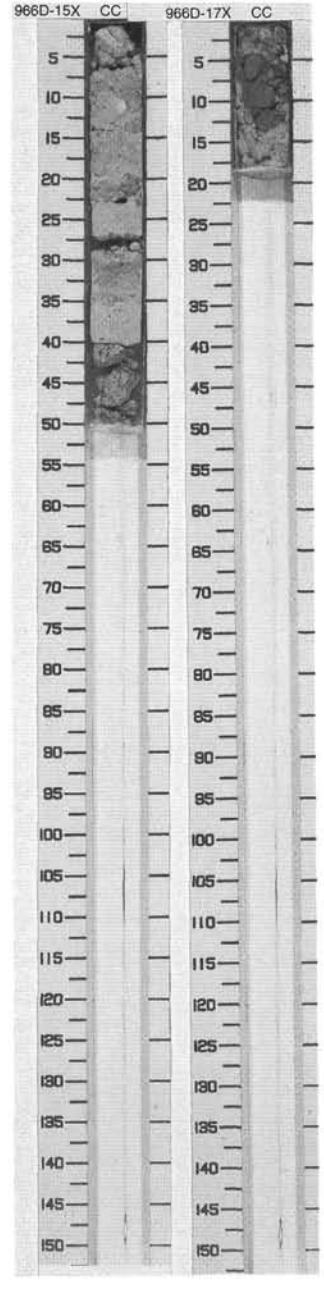
966D 16X NO RECOVERY

SITE 966 HOLE D CORE 17X CORED 112.5 - 117.3 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC						CALCAREOUS BRECCIA

Major Lithology:
This core recovered white (10Y 8/1) CALCAREOUS BRECCIA. The breccia consists of lithified clasts of dark gray (5Y 4/1) limestone. The matrix is composed of micrite and fine calcarenite and shows a fine "swirly" lamination.

General Description:
The lithology in this core has been disturbed by rotary drilling.



SITE 966 HOLE D CORE 18X CORED 117.3 - 122.1 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		1				S		CALCAREOUS BRECCIA Major Lithology: The dominant lithology in this core is white (10Y 8/1) and light gray (5Y 7/1) CALCAREOUS BRECCIA, containing angular silty clay and limestone clasts up to 4 cm in size within a muddy calcareous matrix.
		CC				S		

Minor Lithologies:
Two very dark gray (10Y 3/1) partly lithified SAPROPEL beds occur in Section 1. The beds contain mm-sized microclasts.

General Description:
Although drilling has disturbed much of the sediment in this core some primary lamination can be noted.

SITE 966 HOLE D CORE 19X CORED 122.1 - 126.9 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC				S		BIOCLASTIC CALCARENITE

Major Lithology:
This core recovered well-cemented very pale brown (10YR 8/3) and light gray (5Y 7/1) CALCARENITE with numerous solution cavities formed mainly by dissolution of pelecypods. Some ooids or pisoliths appear to be present.

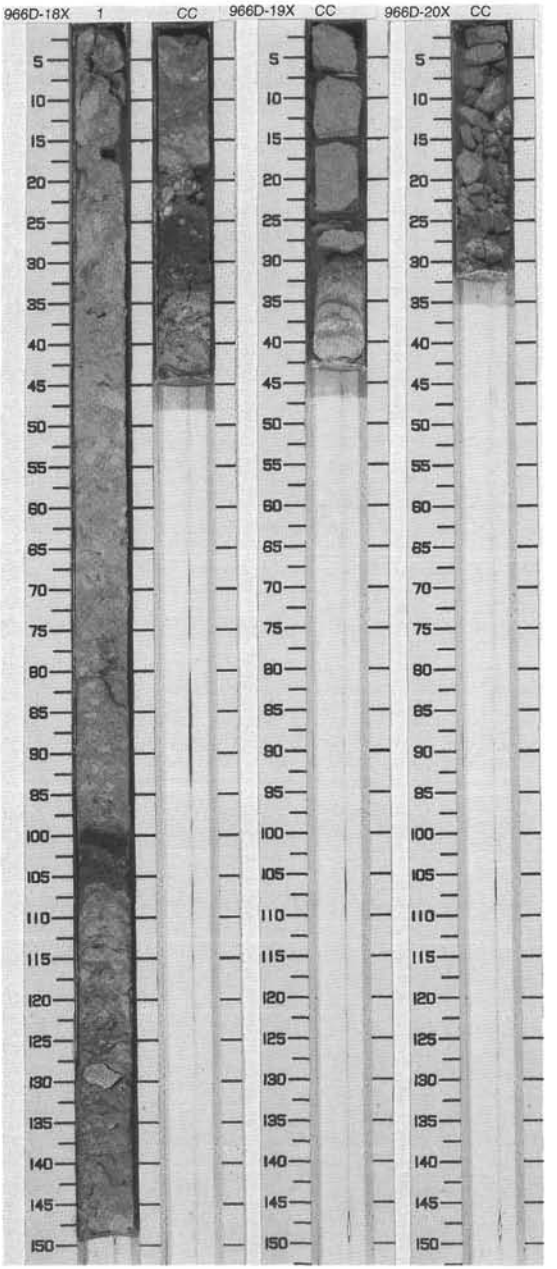
General Description:
This core shows brecciation probably induced by drilling.

SITE 966 HOLE D CORE 20X CORED 126.9 - 136.5 mbsf

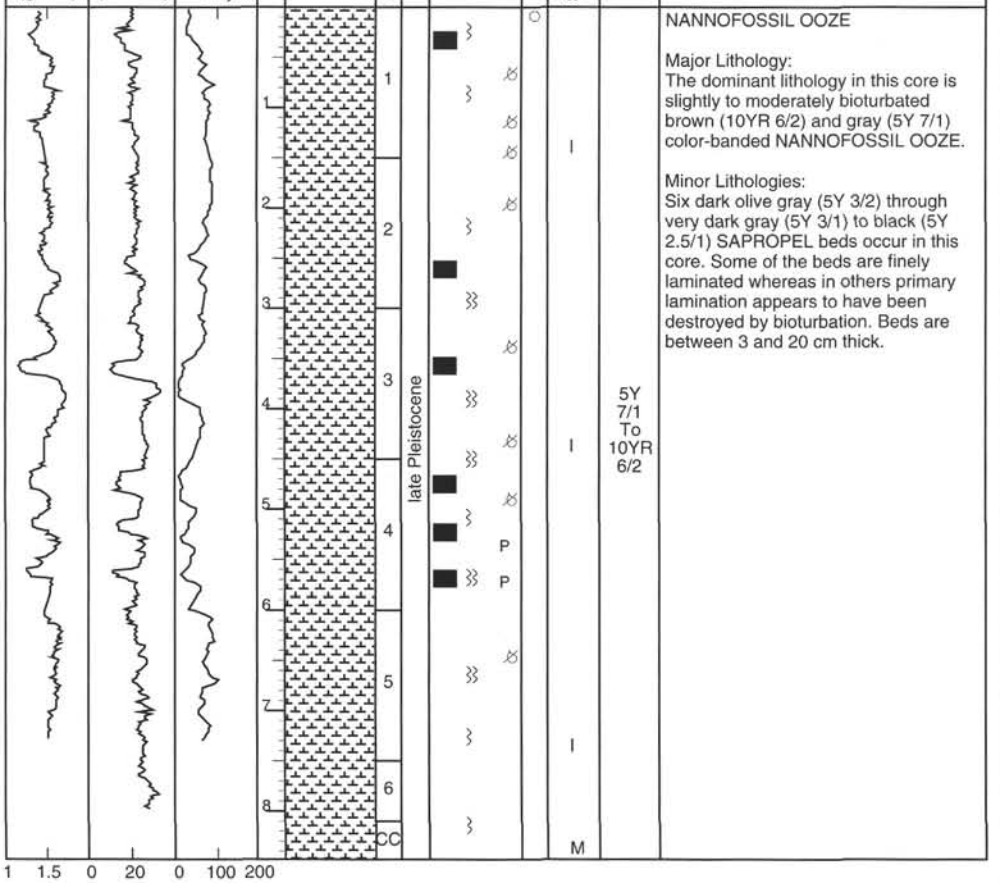
Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC				S		CALCARENITE

Major Lithology:
In this core fragments of very pale brown (10YR 8/3) and light gray (5Y 7/1) CALCARENITE were recovered.

General Description:
Sediment in this core is highly brecciated–this may have resulted from rotary drilling.



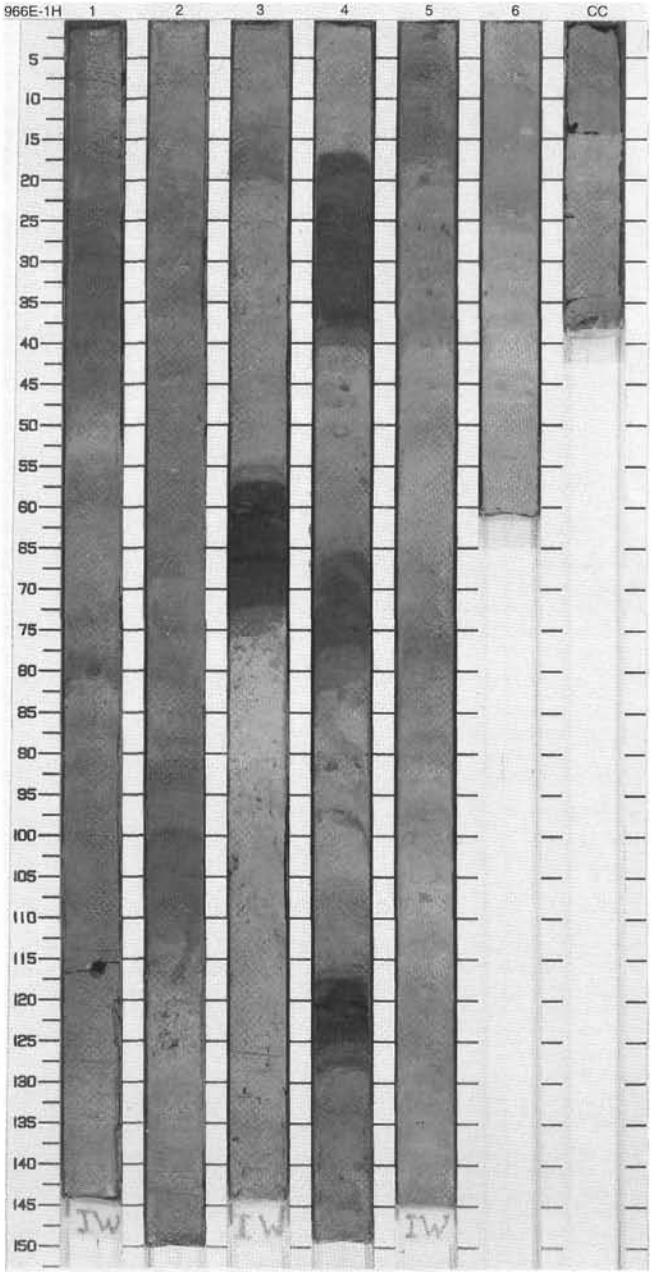
SITE 966 HOLE E CORE 1H CORED 0.0 - 8.5 mbsf



NANNOFOSSIL OOZE

Major Lithology:
The dominant lithology in this core is slightly to moderately bioturbated brown (10YR 6/2) and gray (5Y 7/1) color-banded NANNOFOSSIL OOZE.

Minor Lithologies:
Six dark olive gray (5Y 3/2) through very dark gray (5Y 3/1) to black (5Y 2.5/1) SAPROPEL beds occur in this core. Some of the beds are finely laminated whereas in others primary lamination appears to have been destroyed by bioturbation. Beds are between 3 and 20 cm thick.



SITE 966 HOLE F CORE 1R CORED 59.0 - 68.0 mbsf

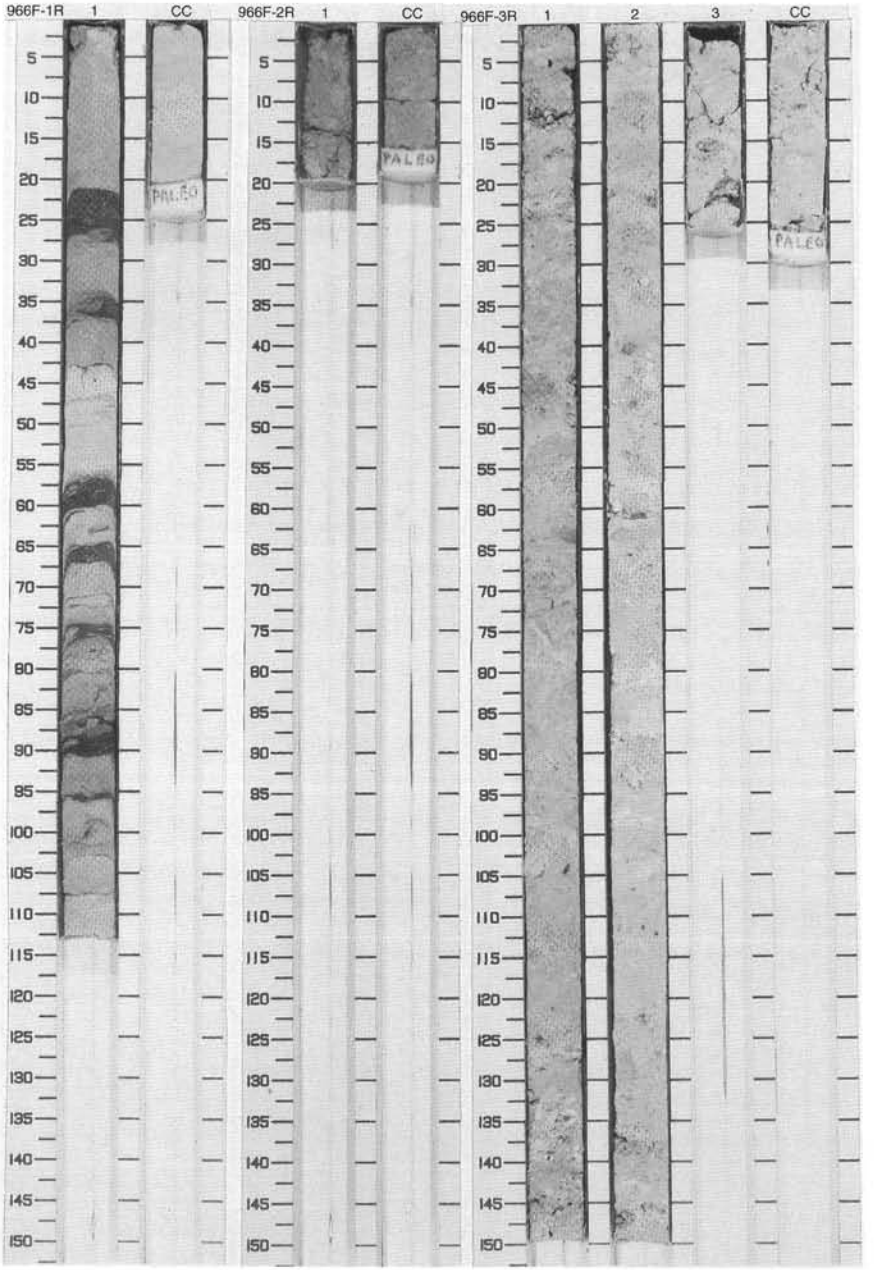
Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1		1 CC	early Pliocene			M	5Y 6/1	NANNOFOSSIL OOZE *Major Lithology:* The sediment in this core is olive gray (5Y 6/1) NANNOFOSSIL OOZE. Minor Lithologies: Three SAPROPEL beds occur in this core. *General Description:* The entire core has been significantly disturbed by the drilling process.

SITE 966 HOLE F CORE 2R CORED 68.0 - 77.0 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		1 CC	early Plio.			M	N8	BIOMICRITE Major Lithology: Rock in this core is BIOMICRITE. Color is very light gray (N8). General Description: Core recovery 4%.

SITE 966 HOLE F CORE 3R CORED 77.0 - 88.6 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 2 3		1 2 3 CC	early Pliocene			M	5Y 8/1 To 5Y 6/1	CALCAREOUS CONGLOMERATE Major Lithology: The sediment in this core is matrix-supported CALCAREOUS CONGLOMERATE which is composed of white (5Y 8/1) micritic limestone clasts in a gray (5Y 6/1) matrix of nannofossil ooze. General Description: Core recovery 37%, probably some drilling disturbance.



SITE 966 HOLE F CORE 4R CORED 86.6 - 96.2 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		1 CC	early Plio.				N8	CALCAREOUS CONGLOMERATE *Major Lithology:* The rock in this core is a very light gray matrix-supported (N8) CALCAREOUS CONGLOMERATE with micritic limestone fragments in a semi-consolidated calcareous matrix. General Description: Core recovery 7%.

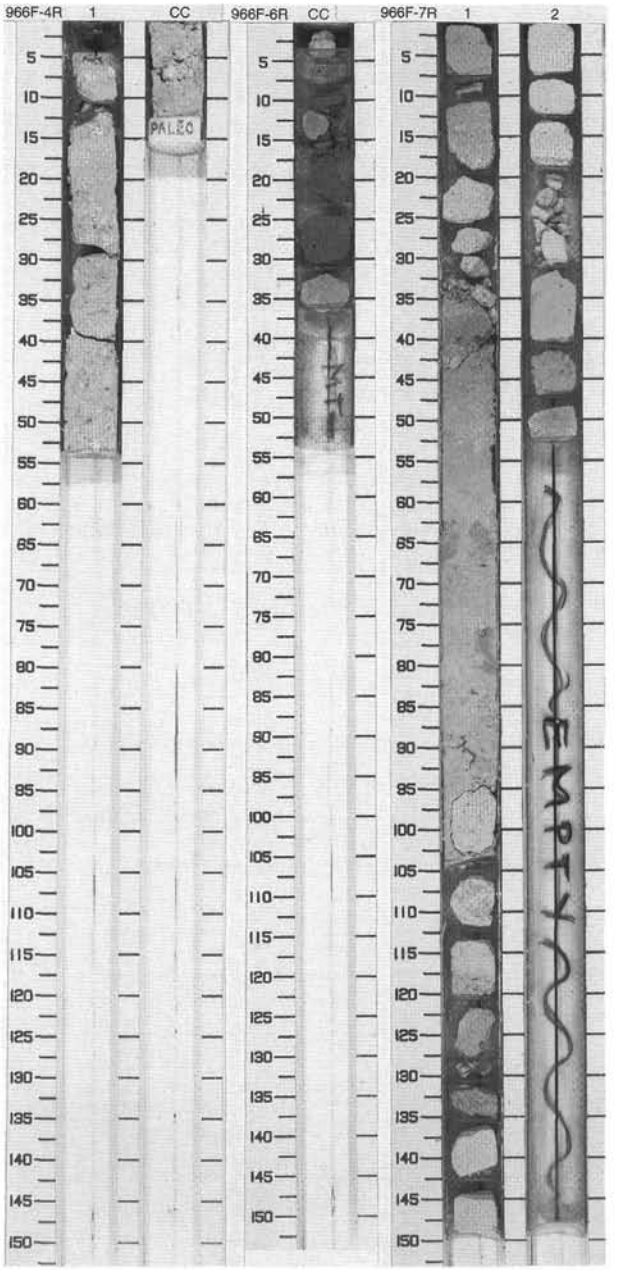
966F 5R NO RECOVERY

SITE 966 HOLE F CORE 6R CORED 105.8 - 115.4 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC	early Plio			T	N5	BIOSPARITE/BIOMICRITE Major Lithologies: The rock in this core is medium gray (N5) BIOSPARITE/BIOMICRITE. Some pieces are possibly dolomitized. General Description: Core recovery 2%.

SITE 966 HOLE F CORE 7R CORED 115.4 - 125.0 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		1 2	early Pliocene			T	N8	BIOCLASTIC CALCARENITE and BIOSPARITE Major Lithologies: The rock in this core is BIOCLASTIC CALCARENITE and BIOSPARITE very light gray (N8) in color with numerous concentrations of mollusks in a well-cemented finer grained matrix of skeletal fragments. General Description: Core recovery 19%.



SITE 966 HOLE F CORE 8R CORED 125.0 - 134.6 mbsf

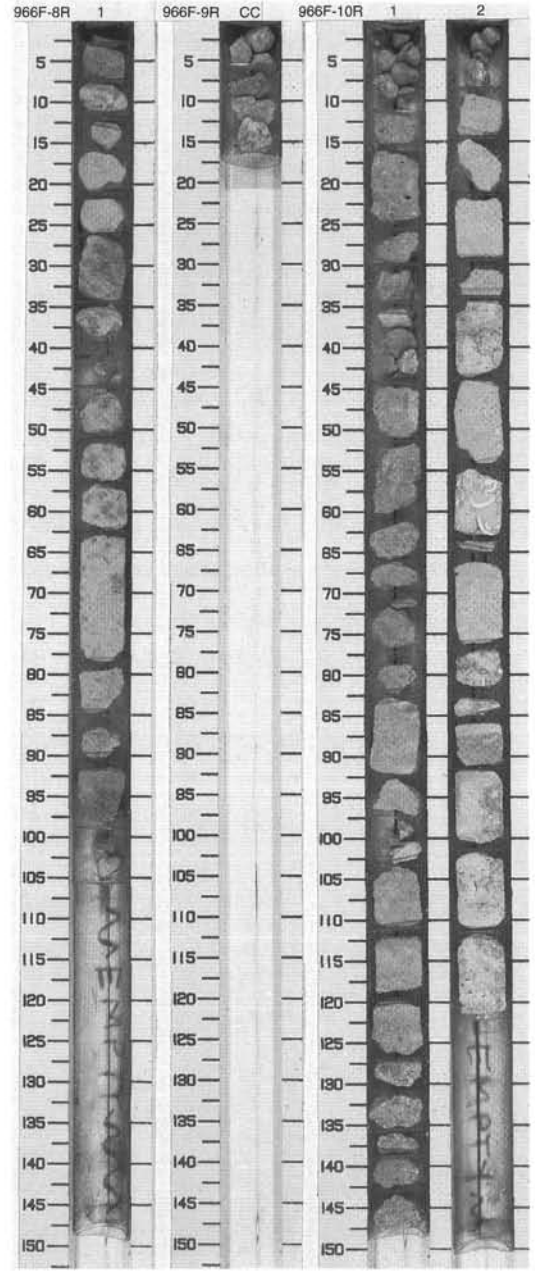
Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1		1	Miocene			T T T	N8	BIOSPARITE, QUARTZ-BEARING BIOMICRITE Major Lithologies: The rock in this core is very light gray (N8) BIOMICRITE and BIOSPARITE which has numerous mollusk concentrations, considerable calcareous algae, and occasional coral fragments cemented by sparry calcite. General Description: Core recovery 9%.

SITE 966 HOLE F CORE 9R CORED 134.6 - 144.2 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		CC						BIOSPARITE Major Lithology: The rock recovered in this core is foraminifer-dominated BIOSPARITE. Color is very light gray (N8). General Description: Core recovery 1%.

SITE 966 HOLE F CORE 10R CORED 144.2 - 153.8 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 2		1 2	Miocene			T	N8	BIOSPARITE and ALGAL BIOSPARITE Major Lithologies: The rock in this core is very light gray (N8) BIOSPARITE and ALGAL BIOSPARITE containing considerable red algae, many benthic foraminifers, mollusks, and other skeletal fragments cemented by sparry calcite.



SITE 966 HOLE F CORE 11R CORED 153.8 - 163.5 mbsf

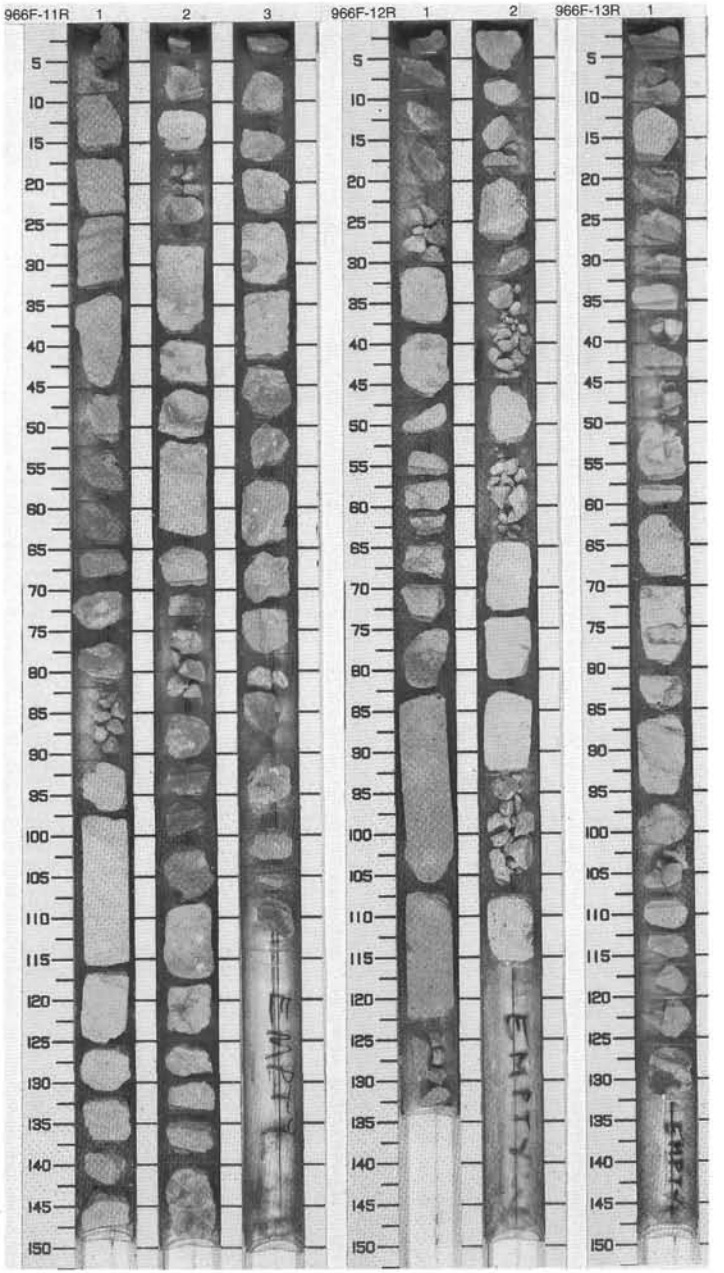
Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–4	G P M	1, 2, 3	Miocene	R		T	N8	BIOCLASTIC PACKSTONE/ GRAINSTONE, ALGAL BIOSPARITE/BIOMICRITE, and RECRYSTALLIZED BIOSPARITE Major Lithologies: The rock in this core is very light gray (N8) BIOCLASTIC GRAINSTONE/ PACKSTONE and BIOSPARITE/ BIOMICRITE with numerous corals (favids), foraminifers, occasional echinoderm fragments, and encrusting red algae cemented by calcite spar. General Description: Core recovery 32%.

SITE 966 HOLE F CORE 12R CORED 163.5 - 173.1 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–2	G P M	1, 2	Miocene	R		T	N8	BIOCLASTIC PACKSTONE/ GRAINSTONE and BIOSPARITE Major Lithologies: The rock in this core is very light gray (N8) BIOCLASTIC PACKSTONE/ GRAINSTONE and BIOSPARITE containing coral, foraminifer, mollusk, echinoderm, and encrusting red algae fragments cemented by sparry calcite. General Description: Core recovery 19%.

SITE 966 HOLE F CORE 13R CORED 173.1 - 182.7 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1	P P M	1	Miocene	R		T	N8	CALCIRUDITE/PACKSTONE and RECRYSTALLIZED (ALGAL?) BIOMICRITE Major Lithologies: The rock in this core is a very light gray (N8) CALCIRUDITE / PACKSTONE and BIOMICRITE containing predominantly large coral fragments (up to 5 cm) encrusted with calcareous red algae. General Description: Core recovery 10%.

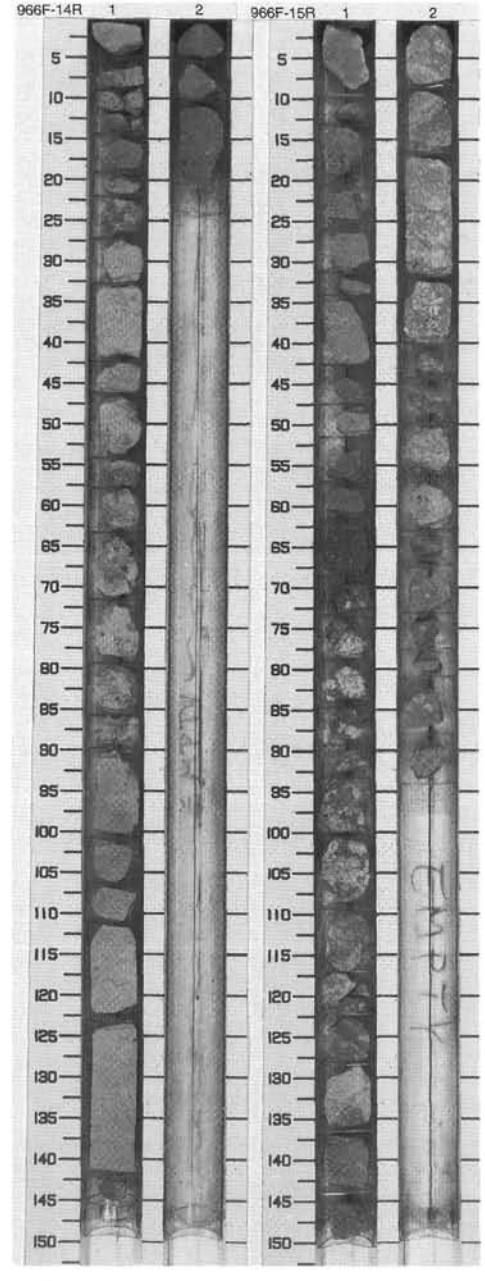


SITE 966 HOLE F CORE 14R CORED 182.7 - 192.4 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		1 2	Miocene			T	N8	ALGAL PACKSTONE and RECRYSTALLIZED BIOMICRITE Major Lithologies: The rock in this core is very light gray (N8) ALGAL PACKSTONE and BIOMICRITE in that encrusting red algae dominates over other bioclasts which include coral, mollusks, and echinoderms, cemented by sparry calcite. Some moldic porosity after mollusks is present and chert occasionally replaces some biota. General Description: Core recovery 15%.

SITE 966 HOLE F CORE 15R CORED 192.4 - 202.0 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		1 2	Miocene			T	10YR 6/1	ALGAL MUDSTONE/ PACKSTONE and DOLOMITIC RECRYSTALLIZED LIMESTONE Major Lithologies: ALGAL MUDSTONE / PACKSTONE and RECRYSTALLIZED LIMESTONE are the dominant lithologies in the rest of the core. Oncolites are scattered throughout the matrix of the mudstone. Minor Lithologies: The rock in the top of this core (Section 1, 0–70 cm) is brown (10YR) CHERT (dolomite?). General Description: Core recovery 20%.

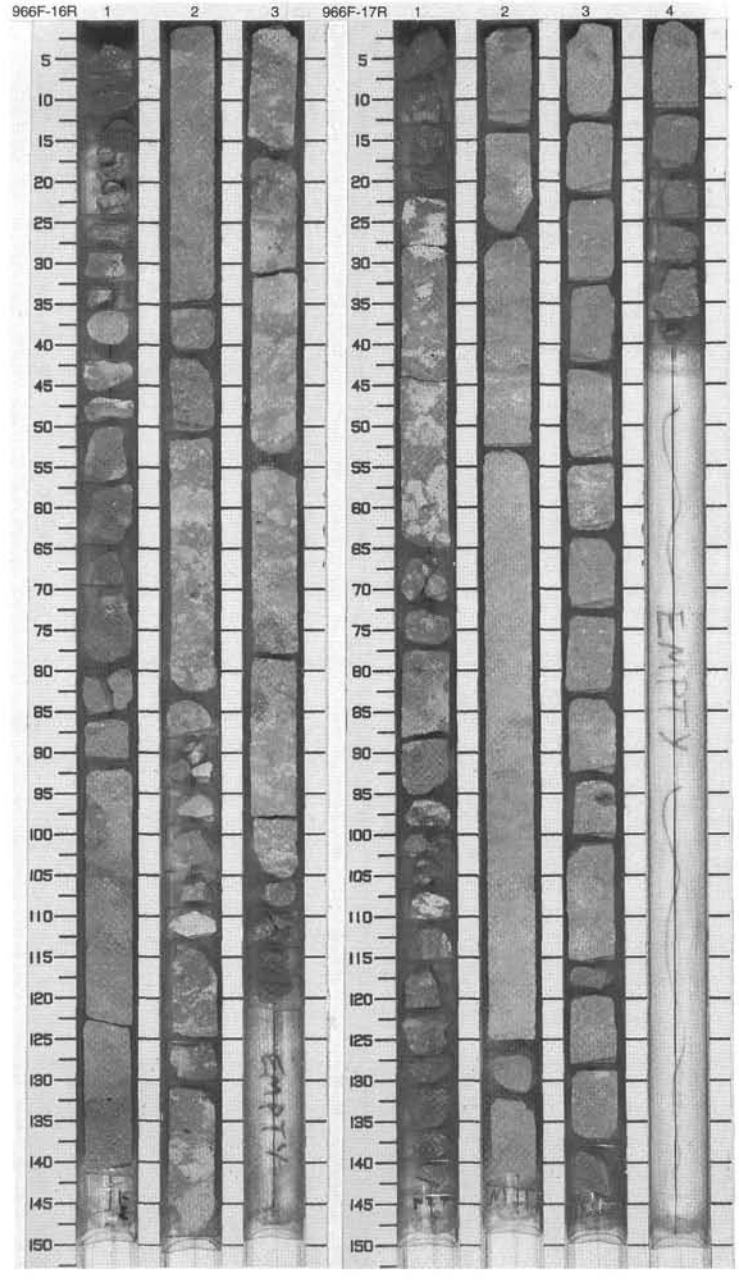


SITE 966 HOLE F CORE 16R CORED 202.0 - 211.6 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 2 3		1 2 3	Miocene	R Ch R R R R R Ch R R R R R R R Ch R R R R		T	N8 To 10YR 6/1	ALGAL MUDSTONE/PACKSTONE and DOLOMITIC RECRYSTALLIZED LIMESTONE Major Lithologies: *The rock in this core is* ALGAL MUDSTONE/MUDSTONE and RECRYSTALLIZED LIMESTONE with oncolites in a very light gray to brown (N8–10YR 6/1) micrite matrix. A small amount of laminated algal mat is present. General Description: Core recovery 37%.

SITE 966 HOLE F CORE 17R CORED 211.6 - 221.3 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 2 3 4		1 2 3 4	Miocene	R R R R R R R R R R R R R R R R R R R R		T	10YR 6/1 To N8	ALGAL MUDSTONE, MOLLUSK DOMINATED MUDSTONE and RECRYSTALLIZED ALGAL LIMESTONE Major Lithologies: The rock in the upper portion of this core is an ALGAL MUDSTONE in which the oncolites are distributed in a brownish (10YR 6/1) micrite matrix. In Section 4, there is a lithological change to a MOLLUSK-DOMINATED MUDSTONE in which numerous bivalves are distributed in a very light gray (N8) micrite matrix. *General Description:* Core recovery 43%.



SITE 966 HOLE F CORE 18R CORED 221.3 - 231.0 mbsf

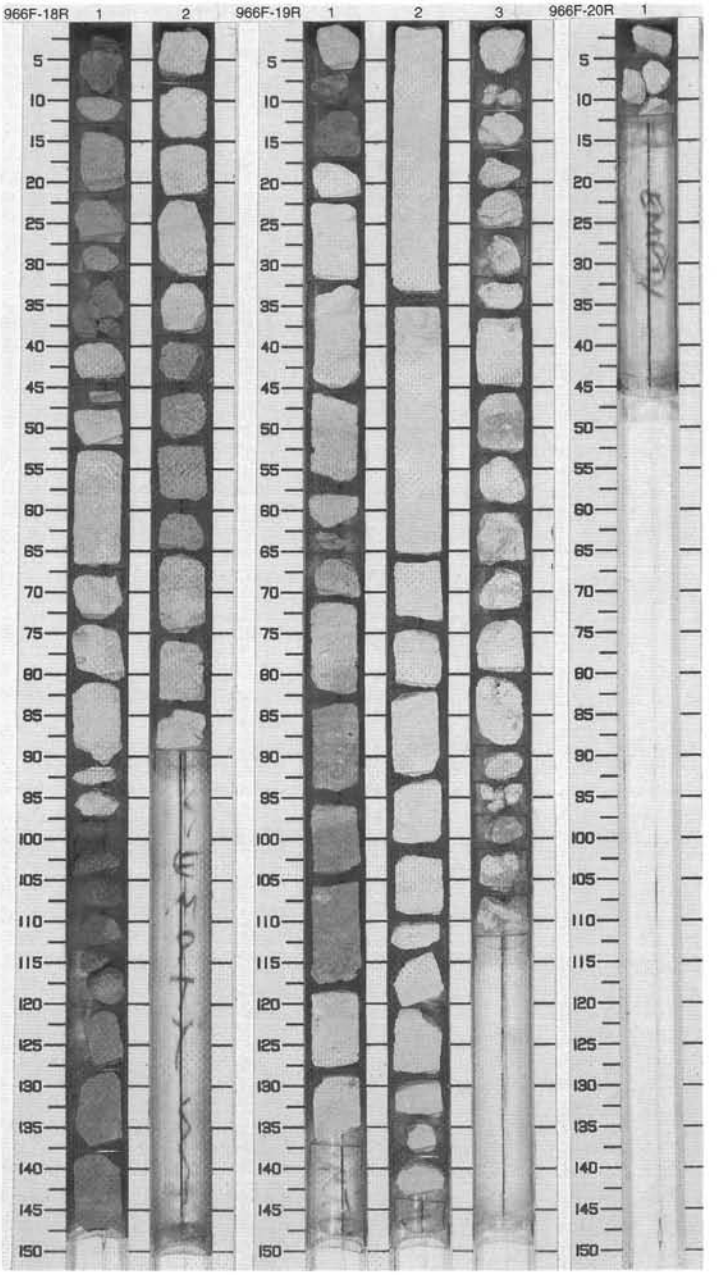
Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–2		1, 2	Miocene				10YR 6/1	MOLLUSC DOMINATED MUDSTONE Major Lithology: The rock in this core is a MOLLUSK-DOMINATED MUDSTONE in which pelecypod valves are distributed in a brownish (10YR 6/1) micrite matrix. Some moldic porosity is developed after the shell clasts. General Description: Core recovery 20%.

SITE 966 HOLE F CORE 19R CORED 231.0 - 240.6 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–3		1, 2, 3	Miocene	R, R, R		T	10YR 6/1	ALGAL-DOMINATED MUDSTONE and BRYOZOAN BIOSPARITE Major Lithologies: The rock in this core is ALGAL-DOMINATED MUDSTONE and BRYOZOAN BIOSPARITE in which oncolites up to 5 cm are distributed in a brown (10YR 6/1) micrite matrix. Intercalated with this material are thin beds of bioclastic grainstone. General Description: Core recovery 36%.

SITE 966 HOLE F CORE 20R CORED 240.6 - 250.3 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
								BIOSPARITE Major Lithology: The rock in this core is BIOMICRITE with mollusk and algae as the dominant components cemented by calcite spar. Small green fragments (<1 mm) of material are incorporated in the rock, which is fractured and veined with secondary calcite. General Description: Core recovery 1%.



SITE 966 HOLE F CORE 21R CORED 250.3 - 259.9 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		1						ALGAL-DOMINATED MUDSTONE and FORAMINIFER-BEARING BITUMINOUS CALCILUTITE

Major Lithologies:
The rock in this core is ALGAL-DOMINATED MUDSTONE and FORAMINIFER-BEARING BITUMINOUS CALCILUTITE with mollusk and algae as the dominant components cemented by calcite spar. The rock is fractured with secondary calcite filling some fissures.

General Description:
Core recovery 2%.

SITE 966 HOLE F CORE 22R CORED 259.9 - 269.4 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		1						BIOSPARITE

Major Lithology:
The rock in this core is BIOSPARITE with mollusk and algae as the dominant components cemented by calcite spar. There is minor fracturing in the material.

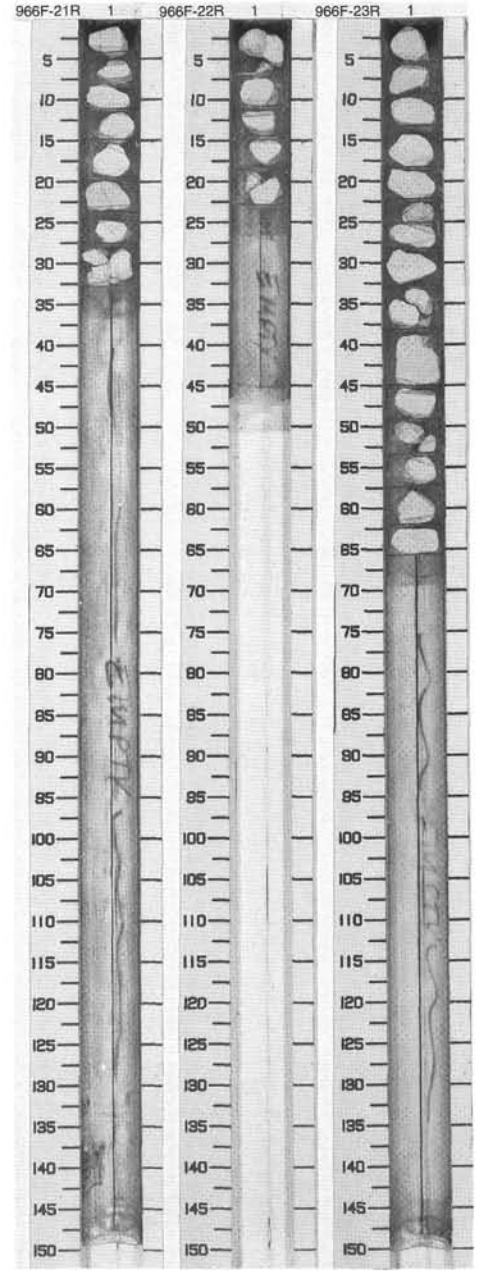
General Description:
Core recovery 1%.

SITE 966 HOLE F CORE 23R CORED 269.4 - 279.0 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
		1	Mio.	R		T T	N8	BIOMICRITE/BIOSPARITE

Major Lithologies:
The rock in this core is very light gray (N8) BIOSPARITE/BIOMICRITE with bryozoans as the dominant components cemented by sparry and/or micritic calcite.

General Description:
Core recovery 6%.



SITE 966 HOLE F CORE 24R CORED 279.0 - 288.6 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1								BIOSPARITE

Major Lithology:
The rock in this core is BIOSPARITE with mollusk and algae as the dominant components cemented by calcite spar. There is minor fracturing in the material.

General Description:
Core recovery 1%

SITE 966 HOLE F CORE 25R CORED 288.6 - 298.3 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1								BIOSPARITE

Major Lithology:
The rock in this core is BIOSPARITE with mollusk and algae as the dominant components cemented by calcite spar. There is minor fracturing in the material.

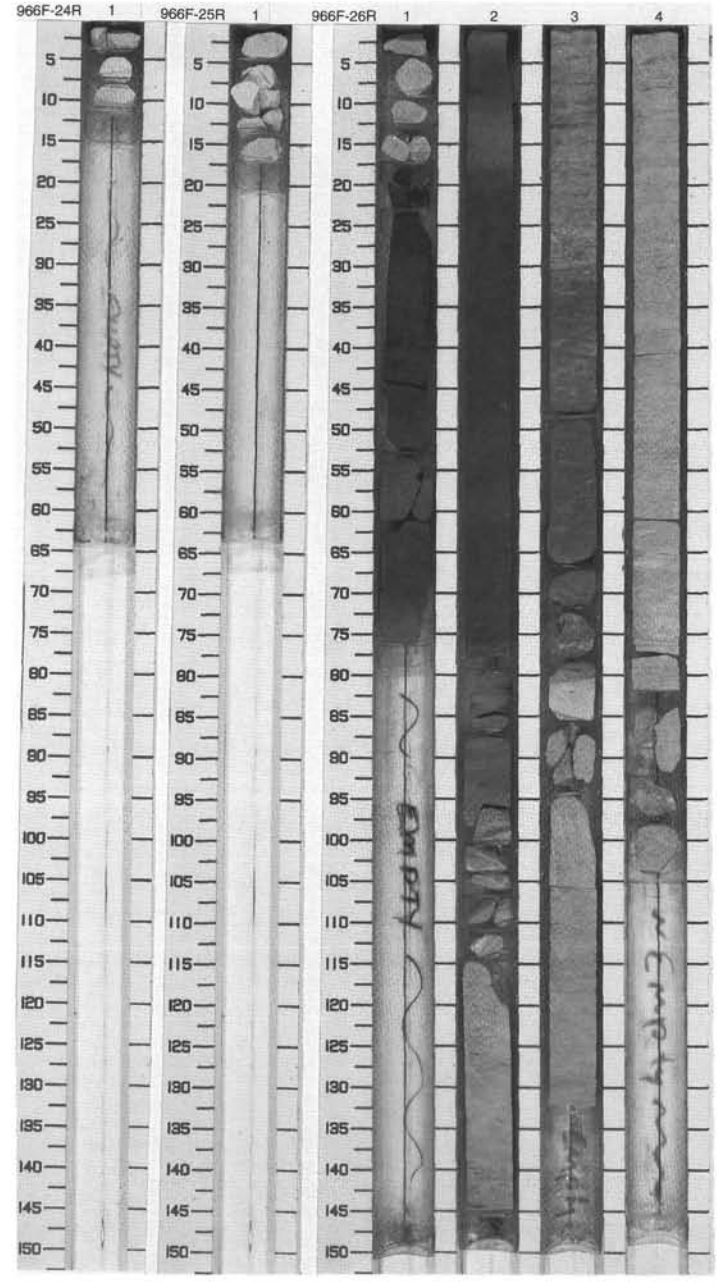
General Description:
Core recovery 2%.

SITE 966 HOLE F CORE 26R CORED 298.3 - 307.9 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1		1	Eocene	R			N8	BIOSPARITE and BITUMINOUS CALCAREOUS MUDSTONE
2		2					5Y 4/1	
3		3						
4		4						

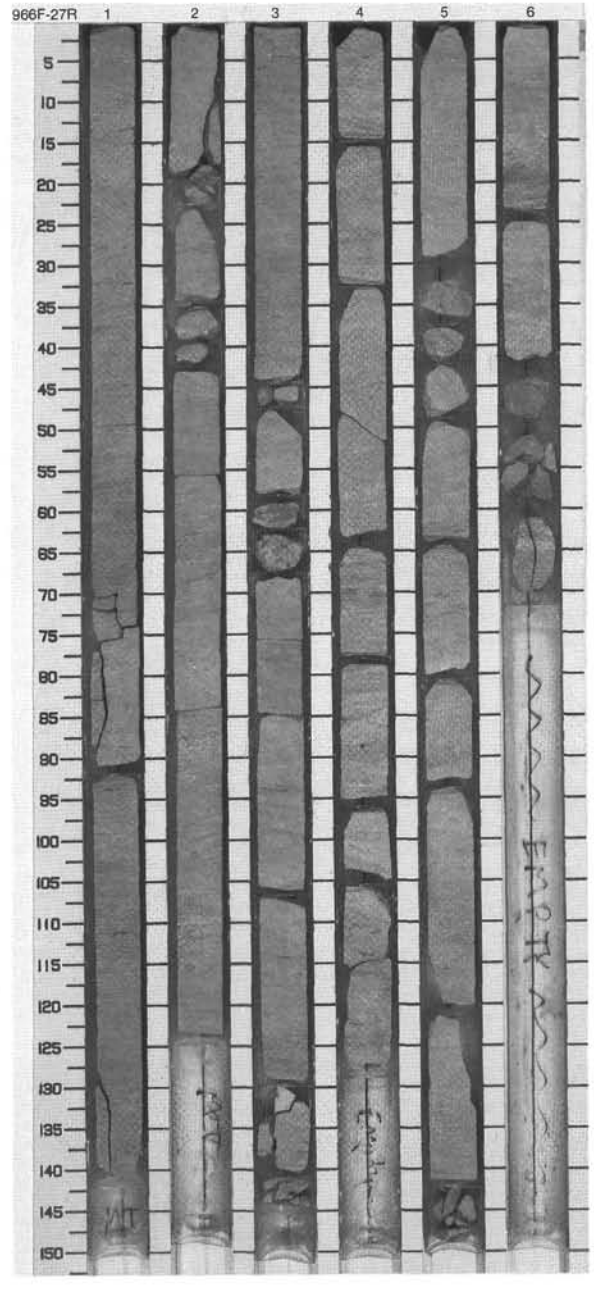
Major Lithologies:
The top 15 cm of this core consists of very light gray (N8) BIOSPARITE with a sparry calcite cement. From Section 1, 15 cm, to the bottom of the core the rock is a dark gray (5Y 4/1) finely laminated BITUMINOUS CALCAREOUS MUDSTONE, which has been intensely burrowed. The laminae are of mm size and there is a considerable proportion of silt-sized material in the rock.

General Description:
Core recovery 44%.



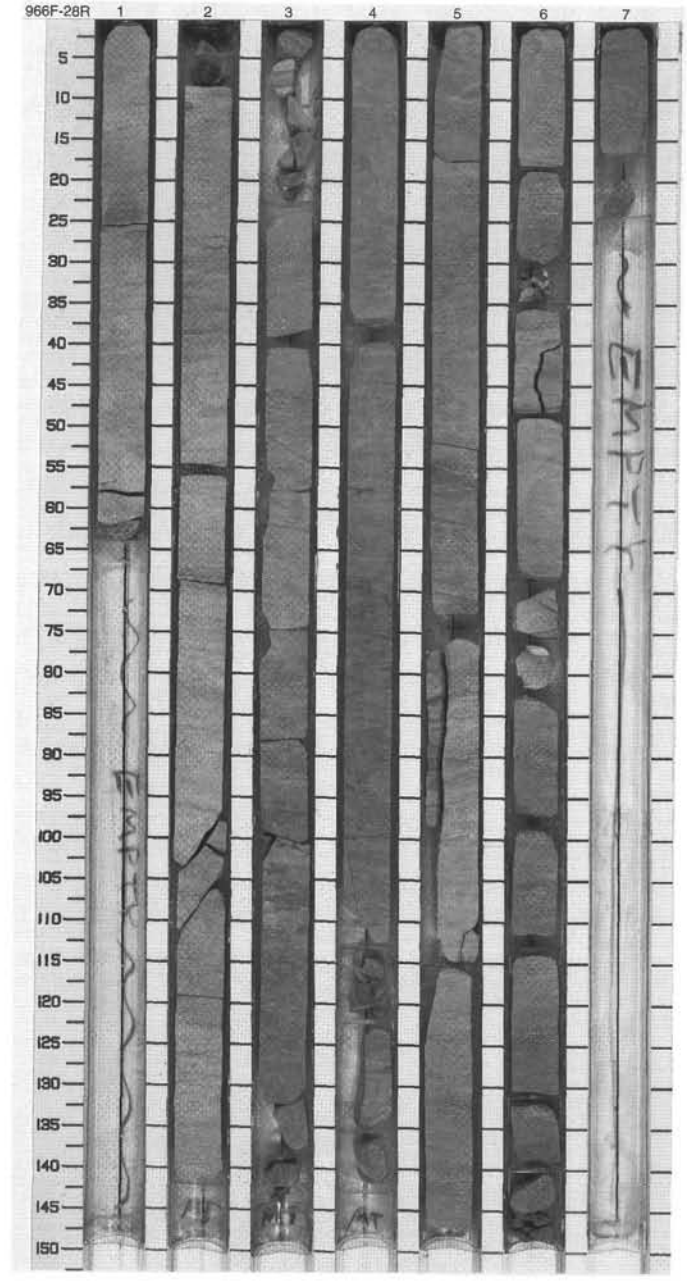
SITE 966 HOLE F CORE 27R CORED 307.9 - 317.5 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–7		1–6	Eocene			T T	N8	FORAMINIFER BIOMICRITE Major Lithology: The rock in this core is very light gray (N8) finely laminated FORAMINIFER BIOMICRITE that has been intensely bioturbated. The material is well cemented by sparry calcite. General Description: Core recovery 74%. Many of the rock fragments are fractured.



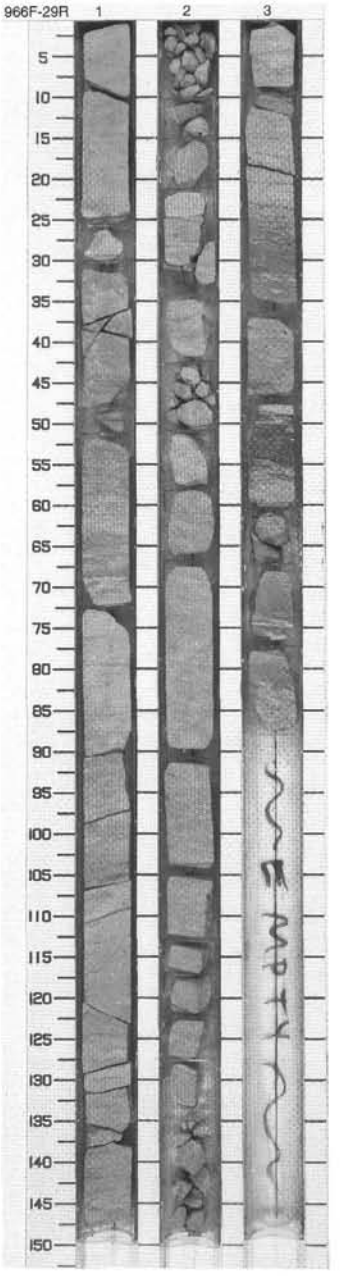
SITE 966 HOLE F CORE 28R CORED 317.5 - 327.1 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1–8		1–7	Eocene				N8	CALCILUTITE Major Lithology: The rock in this core is very light gray (N8) finely laminated CALCILUTITE that has been intensely bioturbated. The material is well cemented by sparry calcite. General Description: Core recovery 80%. Rocks are somewhat fractured.



SITE 966 HOLE F CORE 29R CORED 327.1 - 336.8 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 2 3		1 2 3	Eocene			T T	N 8	CALCILUTITE and FORAMINIFER BIOMICRITE Major Lithologies: The rock in this core is very light gray (N8) finely laminated CALCILUTITE that has been intensely bioturbated. The material is well cemented by sparry calcite. General Description: Core recovery 36%. The rock fragments in this core are fractured.



SITE 966 HOLE F CORE 30R CORED 336.8 - 346.4 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 2 3 4		1 2 3	Eocene			T	N8	CALCILUTITE and FORAMINIFER BIOMICRITE Major Lithologies: The rock in this core is very light gray (N8) finely laminated CALCILUTITE that has been intensely bioturbated. The material is well cemented by calcite. General Description: Core recovery 42%.

SITE 966 HOLE F CORE 31R CORED 346.4 - 356.0 mbsf

Meter	Graphic Lith.	Section	Age	Structure	Disturb	Sample	Color	Description
1 2 3		1 2 3	Eocene			T	N8	CALCILUTITE and FORAMINIFER BIOMICRITE Major Lithologies: The rock in this core is very light gray (N8) intensely bioturbated CALCILUTITE that is well cemented by calcite. General Description: Core recovery 35%. The material in this core is fractured.