BENTHONIC FORAMS. in ENVIRONMENTAL GROUPS

LAGOONAL (Ammobaculites – Reophax) · INNER AND MID SHELF (Ammosphaeroidina – Elphidium) · UPPER SLOPE (Karreriella – Globobulimina)

SIDEWALL CORE Depth in metres	Ammobaculites spp.	Haplophragmoides spp.	Bathysiphon spp.	Reophax spp.	Ammosphaeroidina sp.	Cibicides breviralis	Cibicides perforatus	Cassidulina subglobosa	Lenticulina spp.	Cibicides lobatulus	Heterolepa victoriensis	Astrononion spp.	Quinqueloculina ornithopetra	Anomalinoides procolligera	Gaudryina & Pseudoclav.	"Robulus" mamiligera	Karreria maoria	Notorotalia miocenica	Carpentaria & Rupertia	Cibicides spp. (shelf forms)	Euvigerina maynii	Textularia carinata	Eponides repandus	Anomalinoides macroglabra	Karreria cygnorum	Bolivina spp. (smooth)	Elphidium
230.0								x	x						x			x		D					x		x
241.4								x	x						x			x		D						x	
253.8								x	x						x					D							
264.4					x				x	x					x					D		x			x	x	x
275.6									x											D						x	x
287.0								x							x			x		D					x	x	
298.4					x				x	x					x			x		D							
308.2					x					x					°		°			D			°		°	x	
321.2										x				x	°					D	°			x	x	x	
332.6					x			x	x	x				x	°				x	D	°	°		x	x		
344.0																				R				°			
353.7									R											R̲				°	°		
366.0																			R	R̲							
378.5									x											R̲			°				
390.0																	x			R̲		°	°				
405.6								x	R											R̲							
412.0									R										R̲	R̲							
420.0																				R̲							
435.2																			R̲	R							
446.6									R	R							R		R̲	R							
458.0									R	R									R	R̲							
469.0									R	R̲				R			R̲			R							
476.0																				R							
481.6								x	R											R̲							
493.0									R											R̲							
503.4																				R̲							
514.0								x	R											R̲							
524.0								x	R			R								R̲							
538.0																	R			R̲							
551.7								x	R											R̲							
581.0								x	R	R		R						R	R̲	R̲							
584.9									R	R					R	R	R	R	R̲	R̲							
590.0								°	R	R				°		R	R										
597.0								°	R	R				°		R											
601.0	°	R									R																
612.0					°	R	R				R				°												
618.0		R					R		R							R	R										
623.0					R						R	R			R												
627.0*						R	R	°	R	R	R			°		R											
627.0*							x	°	°	x	°	°	°	°	°												
632.0		x					x			x	x	°	°														
640.0							D	°	°																		
646.0	°	x	x	°	x	x	x	°	°																		
651.0		°	°			x	°	°																			
658.0																											
659.0																											
672.0																											
675.0		x																									
678.0		x																									
680.0	?	?																									
683.0																											
685.0																											
688.0																											
690.0																											
693.0																											
698.0																											

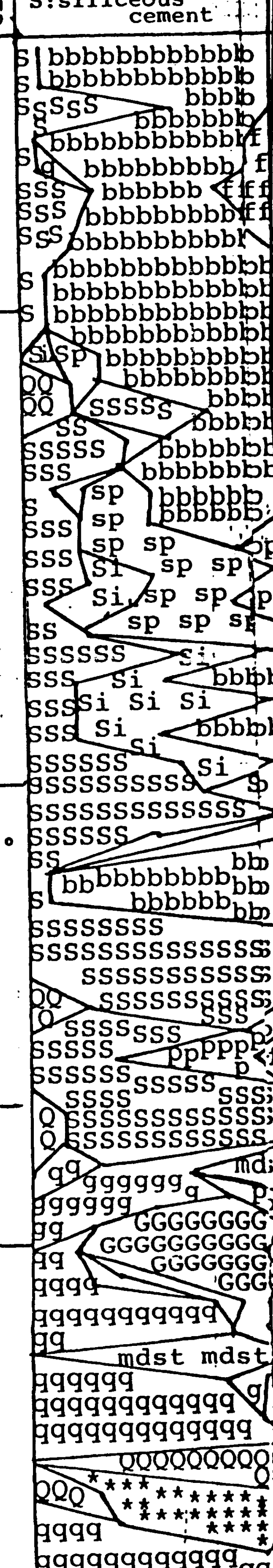
UPPER SLOPE

SIDEWALL CORE Depth in metres	Karreriella bradyi	Pyrgo spp.	Sigmoidopsis sp.	Cibicides subhaidingeri	Melonis barleeanum	Stilostomella spp.	Bolivina anastomosa Gp.	Rectobolivina maoriella	Siphouvigerina proboscidae	Ammodiscus sp.	Cibicides karreriformis	Martinottiella sp.	Globobulimina ovoidea
524.0				x									
538.0			°	x									
551.7				x								x	°
581.0		x	°	x									
584.9			°				x				°		
590.0			°								°		
597.0		°								°			
601.0	°	°			°	x	x	°	°				
618.0					°								
623.0	°	°	°	°	°	x							

RESIDUE LITHOLOGY

MAJOR COMPONENTS

b:bryozoa debris
f:foraminifera
sp:sponge spicules
q: f. ang. qtz.
Q:f-c ang.subrd qtz.
S:calc.siltstone
g:glauc. clay
G:glauc and/or goethite pellets
p:pyrite
*:cryst.siderite or dolomite.
m:mudstone with very little residue.
S:siliceous cement

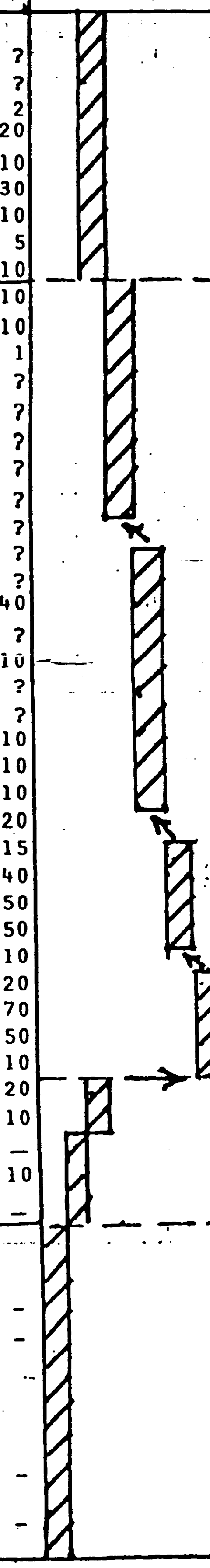


MINOR COMPONENTS

SIDEWALL CORE Depth in metres	rock frags.	pyrite aggs.	glauc pellets	limonite	mica	pyrite-biogenic	fish teeth & bone frags.	bryozoa	oogenia (seaweed)	echinoid spines & plates	turritellid gast.	sponge spicules	ostracodes	pelecypod frags.	foram count	plank foram %
										C						
230.0										C		A			500	?
241.4			r							C		A			?	?
253.8			r							C		A			1500	2
264.4										C		A			1500	20
275.6			C							C		A	r	C	3000	10
287.0			C									A			2000	30
298.4		C										A			1000	10
308.2										C		A	r	r	500	5
321.2			C												500	10
332.6			C									A			100	10
344.0										C					250	10
353.7			C							C					300	1
366.0			C							C					100	?
378.5										C					100	?
390.0										C					100	?
405.6															100	?
412.0										C			r	C	50	?
420.0							A								100	?
435.2							A								?	?
446.6															?	?
458.0										r					500	40
469.0							?								?	?
476.0		C				C						A			1000	10
481.6		C		C			A								?	?
493.0		C					A								?	?
503.4		C		C			A			C					300	10
514.0		C		C			A			C					300	10
524.0		C		C			C			r		C			300	10
538.0							C			C					1000	20
551.7										C		A			200	15
581.0										C					250	40
584.9		C						A		C					1000	50
590.0		r						A		C					50	50
597.0				C				A		C		C			200	10
601.0	C	r						A	A	C			r		2000	20
612.0										r		C			250	70
618.0										C					1000	50
623.0			r							r	r				200	10
627.0*		r		C		r		r	C						100	20
627.0*							C		C						100	10
632.0		r						r							100	—
640.0		C				C									200	10
646.0							A								50	—
651.0																
658.0				C												
659.0				C	r											
672.0															10	–
675.0	C					C									50	–
678.0																
680.0			C	C	r											
683.0	C	r		C	r											
685.0			r													
688.0	r														?	–
690.0																
693.0	r	r													?	–
698.0																

PALEO-ENVIRONMENT

DELTAIC-ESTUARINE
ESTUARINE ENTRANCE >10m
INNER SHELF 10-40m
CANYON HEAD ~ 40m
MID SHELF CANYON 40-200m
SHELF EDGE CANYON ~ 200m
UPPER SLOPE FAN ~ 200-300m



MAJOR E-LOG CHARACTER CHANGES

627
638.5
657 to 662

PLANKTONIC FORAMINIFERAL ASSEMBLAGE / AGE

ZONE	Depth at Base	AGE
A		PLIOCENE
A-4	275.6	PLIOCENE
B-1	298.4	LATE MIOCENE
B-2	308.2	LATE MIOCENE
C	332.6	MID MIOCENE
?	353.7	MID MIOCENE
D-1		MID MIOCENE
?		MID MIOCENE
E/D		MID MIOCENE
?	458.0	? — ? — ?
F	514.0	EARLY MIOCENE
G	538.0	EARLY MIOCENE
H-1	623.0	EARLY MIOCENE
H-2	627.0	late Oligocene
J-1	632.0	early Oligocene
?K?	640.0	LATE EOCENE
K	646.0	LATE EOCENE
?K?	651.0	? — ? — ?
?		? ?

KEY:
° <20 specimens
x >20 specimens
D Dominant >60% of assemblage
R recycled Eo/Oligocene specimens
R̲ reworked specimen dominant
m mixture of recycled & fresh specimens

r = rare
A = abundant - 1%-5% total grains
C = common <20 grains

DEPT. NAT. RES & ENV
PE900815

TABLE 2: SIGNIFICANT BENTHONIC FORAMINIFERAL DISTRIBUTION, RESIDUE LITHOLOGY & PALEOENVIRONMENTAL ASSESSMENT - BALEEN # 1.