INFORMAL REPORT AND INDEX OF

NAVIGATION, DEPTH, MAGNETIC AND SUBBOTTOM PROFILER DATA (ISSUED AUGUST 1981)

RAMA EXPEDITION

LEG 11

Agana, Guam (10 March 1981) to Cebu, Philippines (25 March, 1981)

R/V T. Washington

Co-Chief Scientists - L. Dorman (SIO) D. Bibee (OSU)

Resident Marine Tech - W. Keith

Post-Cruise Processing and Report Preparation by S.I.O. Geological Data Center

Data Collection Funded by CNR Grant Number CNR-0440 Data Processing Funded by SIA and CNR

NOTE

This is an index of underway geophysical data edited and processed shortly after the completion of the cruise leg and is intended primarily for informal use within the institution. This document is not to be reproduced or distributed outside Scripps without prior approval of the chief scientist or the Geological Data Center, Scripps Institution of Oceanography, La Jolla, California 92093.

INFORMAL REPORT AND INDEX OF NAVIGATION, DEPTH, MAGNETIC AND SUBBOTTOM PROFILER DATA

Contents:

Track Charts - annotated with dates (day/month) and hour ticks.

The scale is .3 in/degree longitude.

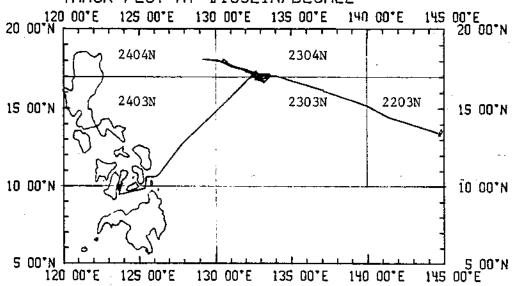
Profiles - depth and magnetic anomaly vs. distance. Dates
(day/month) and positions of major course changes
(greater than 30 degrees) are annotated. Sections
of track having subbottom profiler (airgun) records
have a solid black line along the bottom of the

profile.

For information on the availability and reproduction costs of data in the following forms, contact S. M. Smith, Curator, Geological Data Center, Scripps Institution of Oceanography, La Jolla, California 92093. Phone (714) 452-2752.

- 1. Navigation listing of times and positions of course and speed changes, fixes and drift velocity.
- 2. Depth compilation plots in fathoms (assumed sound velocity of 800 fm/sec) or meters (assumed sound velocity of 1500m/sec) at approximately 1 mile spacing, plotted at 4in/degree with standard U. S. Navy Oceanographic Office BC series boundaries (see index chart).
- 3. Plots of magnetic anomaly profiles along track map scale = 1.2inch/degree, anomaly scale between 15N and 15 S latitude = 500 gamma/inch, anomaly scale north of 15N and south of 15S = 1000 gamma/inch, from values retrieved at approximately 1 mile spacing and regional field removed using the 1975 IGRF.
- 4. Card decks of navigation, depth and magnetics (for specific formats, contact S. M. Smith, Geological Data Center).
- 5. S.I.O. Sample Index list of beginning and end times and positions of all underway records as well as all other samples (geology, biology, physical oceanography, etc.) collected on the cruise leg.
- 6. Microfilm or Xerox copies of:
 - a. Echosounder records 12 and 3.5 kHz frequency
 - b. Subbottom profiler records (airgun)
 - c. Magnetometer records
 - d. Underway data log

RAMA11UT TRACK PLOT AT 1632IN/DEGREE



RAMA EXPEDITION LEG 11

Co-Chief Scientists: L. Dorman (SIO)

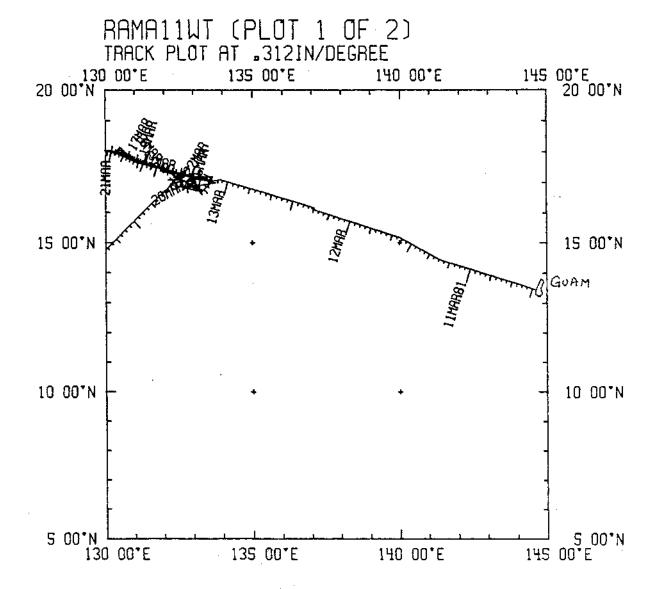
D. Bibee (OSU)

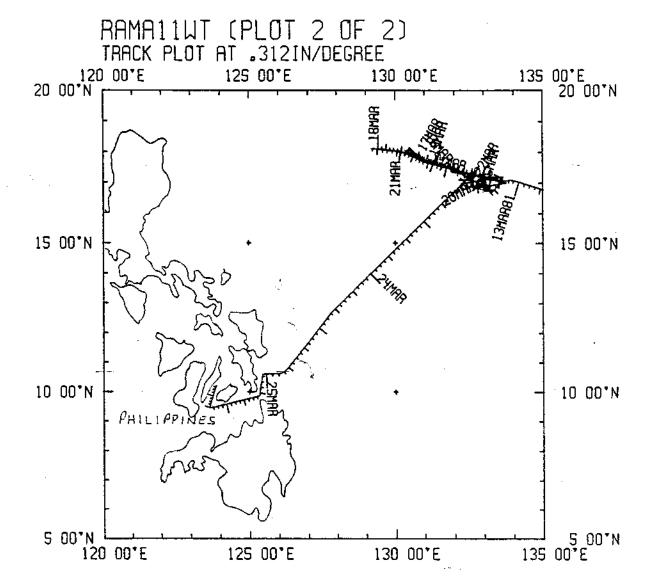
Ports: Agana, Guam - Cebu, Philippines

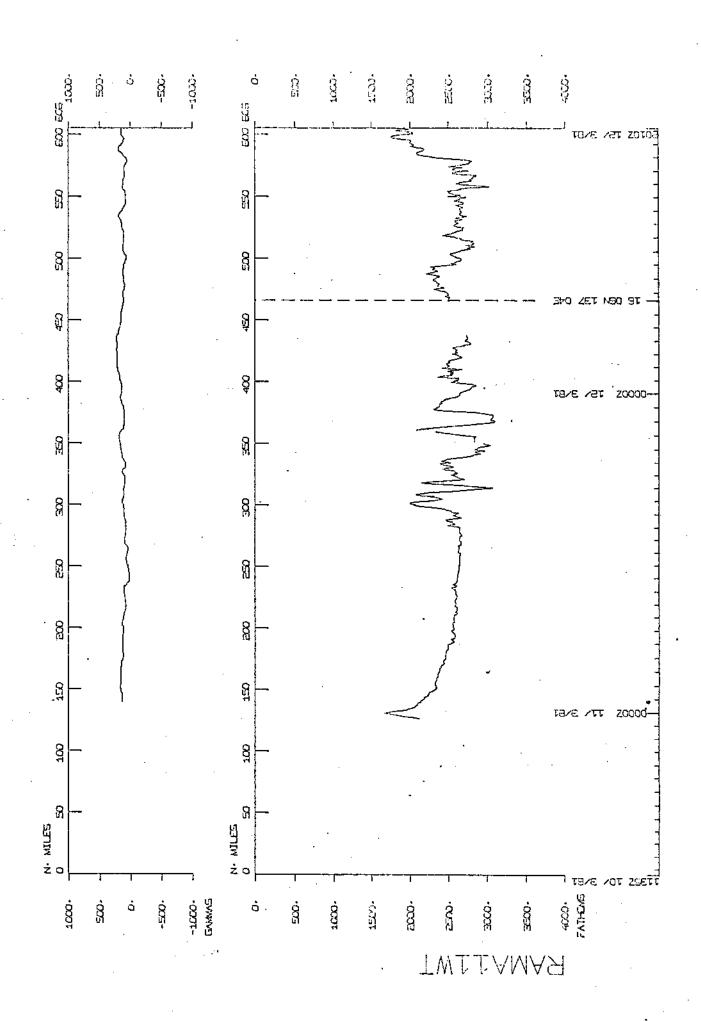
Dates: 10 - 25 March, 1981 Ship: R/V Thomas Washington

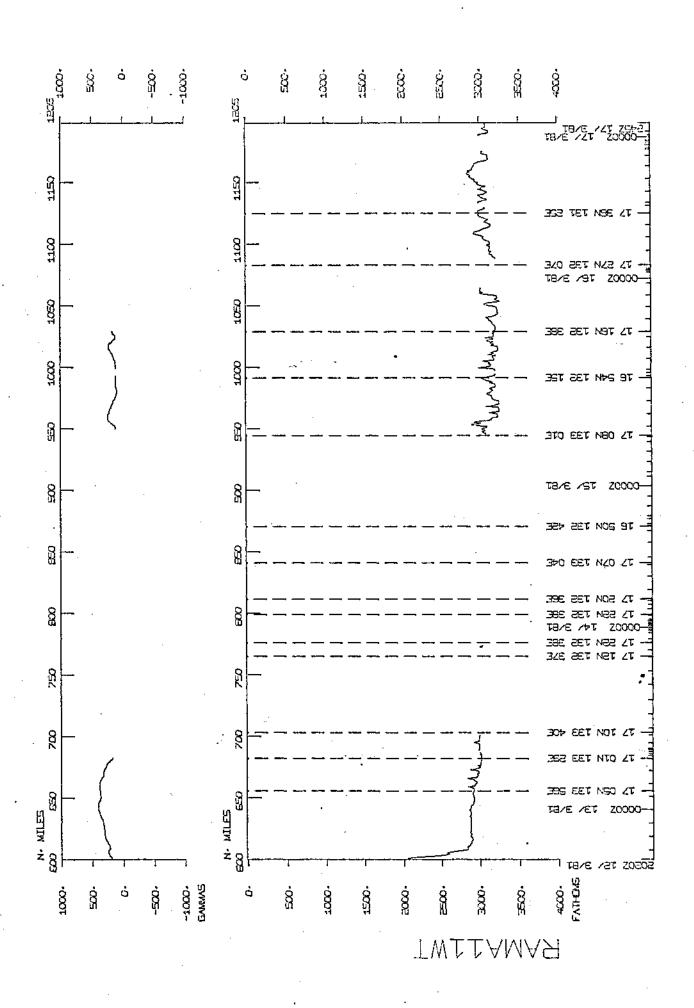
TOTAL MILEAGE OF UNDERWAY DATA COLLECTED

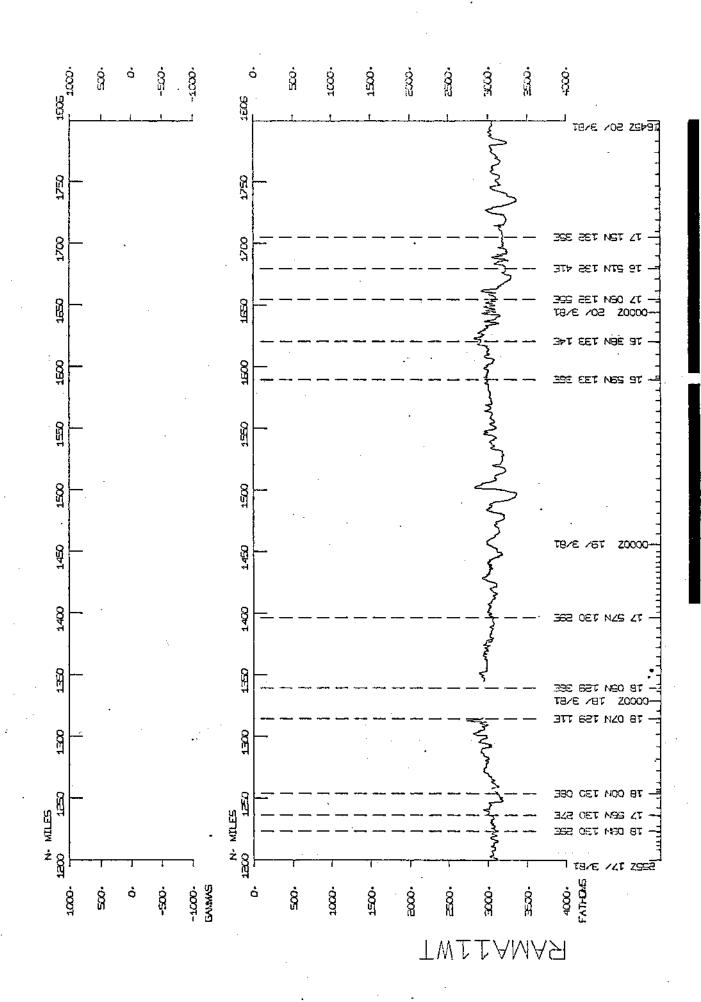
- 1) Cruise 3043 miles
- 2) Bathymetry 1808 miles3) Magnetics 1000 miles
- 4) Seismic Reflection 405 miles
- 5) Gravity 2895 miles

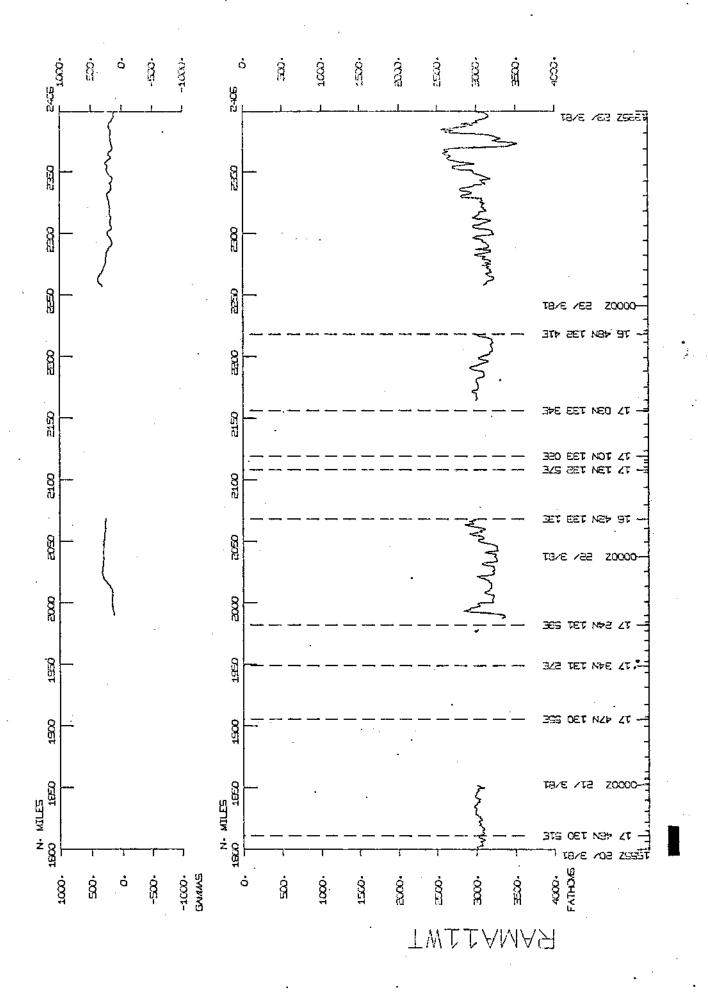


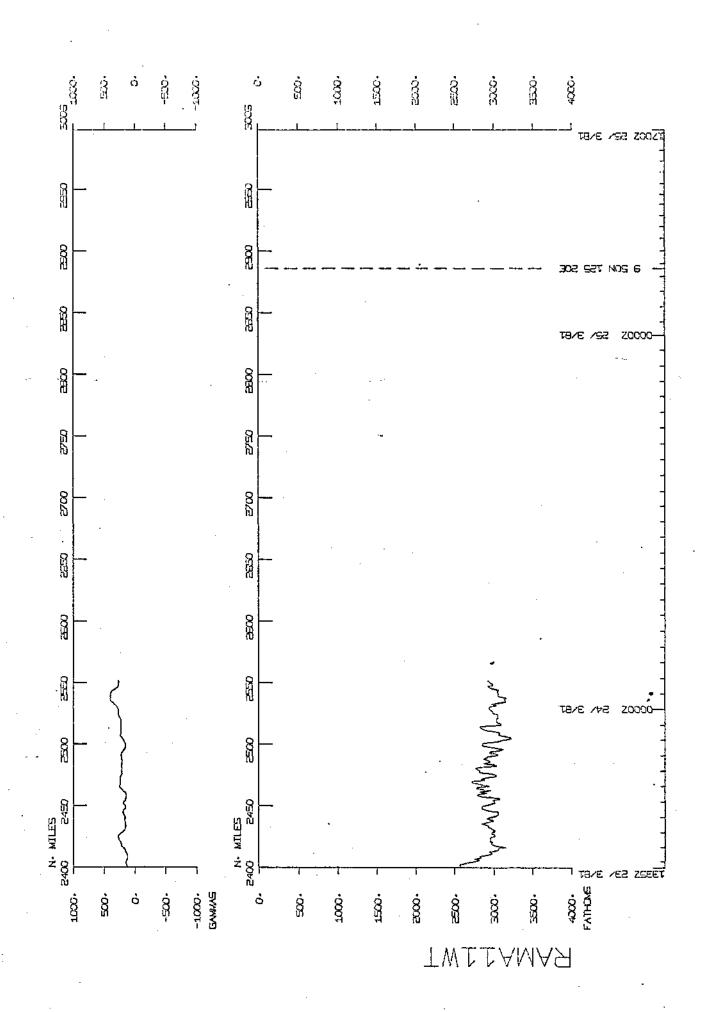


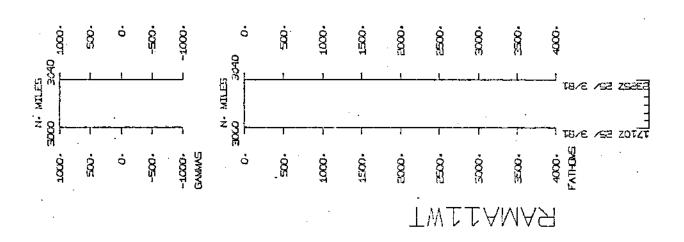












S.I.O. Sample Index (Issued August 1981)

RAMA EXPEDITION

Leg ll

Agana, Guam (10 March, 1981) to Cebu, Philippines (25 March, 1981)

R/V Thomas Washington

Co-Chief Scientists - L. Dorman (SIO) D. Bibee (OSU)

Post-Cruise Processing and Report Preparation by S.I.O. Geological Data Center

Index Encoding Funded by NSF Grant Number OCE80-22996 Index Processing and Report Preparation funded in part by SIA

The Sample Index is a first level interdisciplinary listing of time, position, sample identification and disposition of all samples, records and measurements collected on this cruise leg. The index data are encoded at sea by the resident technician and processed on shore by the S.I.O. Geological Data Center shortly after the completion of the cruise leg.

Positions are interpolated on the basis of sample time by comparison to a single, edited navigation file. Samples beginning at one time and position and ending at another are entered on two consecutive cards. Disposition and sample type are represented by three and four character codes to permit future computer searches on these parameters. (Listings defining these codes are available from the Geological Data Center.)

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(RAMALIWT) ***
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	60E	120E	180	120W	60W	0 W
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905	00000000000000	000000000000		000000000000000000	000000000000	
	**********	*********	********	++	******	******
	60E	1206	180	120W	60W	OW
		1044	001 A	CAMA CHAM		

10MAR81 - AGANA, GUAM

TO

25MAR81 - CEBU, PHILIPPINE IS.

CHIEF SCIENTISTS - DORMAN, L.M. GRO BIBEE, L.D. OSU

SHIP \pm R/V THOMAS WASHINGTON (SIO)

PRODUCED BY GEOLOGICAL DATA CENTER.SCRIPPS INSTITUTION OF OCEANOGRAPHY, LA JOLLA, CALIFORNIA 92093

NUMBER OF SAMPLES OF CLASS 'TYPE' GOING TO DESTINATION 'DISP'

DISP					Ţ	YPE				Ŧ	OTAL
		DP	G۷	L8	MG	PE	88	SP	SR		
GDC	I	3		1	1	1		3		1	9
GRD	1					4				I	4
IGPP	Į					1				1	1
LMD	1		2				8			1	10
MTG	1					3				I	3
OSU	ī					5	41		1	I	47
SC G	I							1		I.	1
TOTAL	I	3	2	1	1	14	49	4	1	ī	75

SAMPLE 'TYPE' CODES USED ABOVE

DP = DEPTH

GV = GRAVITY

LB = LOG BOOKS

MG = MAGNETICS (TOWED VEHICLE, SURFACE, TOTAL FIELD)
PE = PERSONNEL IN SCIENTIFIC PARTY

SB = SEISMIC BUDY SP = SEISMIC REFLECTION PROFILE AIRGUN

SR = SEISMIC RUN

SAMPLE 'DISP' CODES USED ABOVE

GOC = GEOLUGICAL DATA CENTER -- S. SMITH (EXT. 2752)

GRD = GEOLUGICAL RESEARCH DIVISION (EXT. 3360)
LMD = LERDY M. DORMAN (EXT. 2406)

MTG = MARINE TECHNOLOGY GROUP (EXT 4194)

OSU = OREGON STATE UNIVERSITY

SCG = SHIPBOARD COMPUTER GROUP (EXT. 4195)

GMT D /M /Y LOC LOC TIME DATE TIME TZ	COOE SAMPLE IDE	NT. CODE L			
*** PORTS ***	RAMA LEG II SAMPL	E INDEX		RAMA11WT	
1058 10/ 3/81 2200 25/ 3/81	LGPT B AGANA, GUA LGPT E CEBU,PHILI	M 13 PPINE IS. 10	27. N 144 37. E F 04. N 123 26. E F	RAMAllWT RAMAllWT	
PERSONNEL *** NAME *** ***	* TITLE ***	*** AFF I	LIATION ***		
1 DORMAN,L.M. 2 BIBEE,L.D.	CHIEF SCIENTIST	SCRIPPS INSTITUTION OREGON STATE UNIVE	RSITY		
3 KEITH,W.E. 4 MOORE,J.M. 5 CRAMPTON,P.J.S. 6 BERL]NER,D.L.		SCRIPPS INSTITUTION SCRIPPS INSTITUTION	IN OF OCEANOGRAPHY DN OF OCEANOGRAPHY DN OF OCEANOGRAPHY DN OF OCEANOGRAPHY	, LA JOLLA , LA JOLLA	CAL. 92093 CAL. 92093
7 BRETHERTON,G.A. 8 GOODMAN,D.	STUDENT GRAD STUDENT JR DVLMT ENGR	OREGON STATE UNIVE	RSITY		
10 NEWHOUSE, D.A.	STAFF RES ASSOC Engineer	. .	IN OF OCEANOGRAPHY		
13 VERNON, F.L. 14 WILLOUGHSY, D.F.			ON OF OCEANOGRAPHY ON OF OCEANOGRAPHY	, ––	. –

NOTES AN 'X' IN THE (B)EGIN/(E)ND COLUMN FOLLOWING THE SAMPLE CODE INDICATES NO SAMPLE OR DATA RECOVERED .

A 'C' INDICATES CONTINUATION OF DATA COLLECTION FROM BEFORE THE BEGINNING OR AFTER THE END OF THIS LEG. (MODRED BOTTOM INSTRUMENTS, FOR EXAMPLE).

THE NUMBER APPEARING IN THE COLUMNS BETWEEN THE SAMPLE IDENTIFIER AND THE DISPOSITION CODE, FOR MANY SAMPLE ENTRIES, IS THE WATER DEPTH IN CORRECTED METERS.

06AUG81 PAGE 2 GMT D /M /Y LOC LOC CODE SAMPLE IDENT. LEG-SHIP CODE LAT. LONG. TIME DATE TIME TZ SAMP DISP CRUISE **** UNDERWAY DATA CURATOR - STUART M. SMITH EXT. 2752 *** *** LOG BOOKS *** 2330 10/ 3/81 LBUW 8 UNDERWAY DATA LOG GDC 14 03.6N 142 29.9E \$ RAMA11WT 0200 24/ 3/81 LBUW & UNDERWAY DATA LOG GDC 13 42.4N 128 53.0E S RAMALIWT *** FATHOGRAMS *** 2340 10/ 3/81 DPR3 8 UGR 3.5KHZ R-01 DPR3 E UGR 3.5KHZ R-01 GDC 14 04.2N 142 28.2E S RAMA11WT GDC 16 58.9N 133 34.0E S RAMA11WT 0658 13/ 3/81 0802 13/ 3/81 0300 22/ 3/81 GDC 16 58.8N 133 35.3E \$ RAMA11WT GDC 16 42.6N 133 13.8E \$ RAMA11WT DPR3 B UGR 3.5KHZ R-02 DPR3 E UGR 3.5KHZ R-02 1607 22/ 3/81 DPR3 B UGR 3.5KHZ R-03 GDC 16 57.1N 133 35.5E S RAMALINT 0200 24/ 3/81 DPR3 E UGR 3.5KHZ R-03 GDC 13 42.4N 128 53.0E S RAMA11WT *** MAGNETOMETER *** MGRA 8 MAGNETICS R-01 GDC 14 10.7N 142 10.7E S RAMAILWT MGRA E MAGNETICS R-01 GDC 13 42.4N 128 53.0E S RAMAILWT 0120 11/ 3/81 0200 24/ 3/81 ***GRAVIMETRIC RECORDS*** CURATOR L.M. DORMAN (EXT.2406) LMD 13 27.8N 144 34.9E S RAMA11WT LMD 17 02.7N 133 33.8E S RAMA11WT 1130 10/ 3/81 GVRA B GRAVITYMETER R-01 0330 13/ 3/81 GVRA E GRAVITYMETER R-01 0338 13/ 3/81 0444 25/ 3/81 GVRA B GRAVITYMETER R-02 GVRA E GRAVITYMETER R-02 1MD 17 02.3N 133 32.7E S RAMA11WT LMD 09 50.2N 125 18.5E S RAMA11WT *** SEISMIC REFLECTION PROFILES ***

SPRF B AIRGUN (5SEC) R-01 SPRF E AIRGUN (5SEC) R-01

SPRF B AIRGUN (25EC) R-01 SPRF E AIRGUN (25EC) R-01

SPRF 8 AIRGUN (2SEC) R-02 SPRF E AIRGUN (2SEC) R-02

GDC 17 57.0N 130 28.8E S RAMAIIWT GDC 17 49.8N 130 43.8E S RAMAIIWT

GDC 17 55.9N 130 32.5E \$ RAMALIWT GDC 17 30.6N 131 54.1E \$ RAMALIWT

GDC 17 19.5N 132 17.6E S RAMALINT GDC 17 49.8N 130 43.8E S RAMALINT

1143 18/ 3/81 1930 20/ 3/81

1230 18/ 3/81 0330 19/ 3/81

0608 19/ 3/81 1930 20/ 3/81

O6AUG81 PAGE 3 CODE LAT. LONG. LEG-SHIP DISP CRUISE

GMT D /M /Y LOC LOC CODE SAMPLE IDENT. TIME DATE TIME TZ SAMP

****SINGLE-CHANNEL DIGITAL SEISMIC TAPES***

1142 18/ 3/81	SPST B SINGLE CHANNEL TAPES	SCG 17 57.0N 130 28.8E S RAMAILWT
1930 207 3/81	SPST E REELS 0001-0007	SCG 17 49 8N 130 43 8F 5 8AMALINT

SEISMIC REFLECTION/REFRACTION (CONTACT GOC FOR EXPLANATION OF CODES)

0000 18/ 3/81	SRCS B SEIS.RUN RAMAII-1	OSU 18 06.4N 129 26.0E S RAMA11WT
2043 20/ 3/81	SRCS & UR/AX/SD/OB/AN/AD	OSU 17 53.9N 130 34.1E S RAMALINT

****SONOBUOY - OCEAN BOTTOM SEISMOMETER***

1058					RCVR	RAMA-11								RAMAIIWT
		3/81			RÇVR	RAMA-11								RAMALINT
1058					RCVR	RAMA-11								RAMAIIWT
2100					RCVR	RAMA-11								RAMAIIWT
1058					REVR	RAMA-11		_	-					RAMAILWT
1100 1058			\$808			RAMA-11								RAMALIWT
2000		- · · -	SB08		RCVR	RAMA-11		-						RAMA11WT
1058				-	RCVR	RAMA-11 RAMA-11								RAMAllWT RAMAllWT
1420				-	RCVR	RAMA-11								RAMAIIWI
1058				-	RCVR	RAMA-11								RAMAILWI
		3/81		_	RCVR	RAMA-11			-					RAMAIIWI
1058				_	RCVR	RAMA-11				•			-	RAMAIIWT
1015					RCVR	RAMA-11		_						RAMALINT
1058				_	REVR	RAMA-11							-	RAMA11WT
		3/81		_	RCVR	RAMA-11								RAMALINT
1,00	107	37.01	20 00	-	AC VA	KAMA-LI	FICK 13C	LMU	٠,	40 • IN	120	JO . 1E	3	PMDMTTHI
1058	107	3/81	\$808	X	NOREC	RAMA-11	0SU-01	osu	13	27.8N	144	34.9E	\$	RAMALINT
1058	107	2/07	50.00	U	NOBEC	DAUA 41	0611 12	06:1		37 011		1. 05	_	D 4 44 4 3 3 4 4 T
1050	107	3/61	2000	^	NUKEC	RAMA-11	020-13	020	13	21.8N	144	34.46	2	RAMALIWE
0907	13/	3/81	SBMB	В	DROP	RAMA-11	HYDPH	ดรบ	16	59.7N	133	35.7E	s	RAMAILWT
1000	22/	3/81	SBMB	Ę	RCVR	RAMA-11	HYDPH	OSU	17	10.5N	132	59.4E	Š	RAMALIWT
2014					DROP	RAMA-11								RAMATIWT
5000	22/	3/81	28.08	E	RCVR	RAMA-11	KAREN	LMD	16	49.5N	132	47.3E	S	RAMALIWT
0115	15 (3/81	6000		DROP		564 65	0544	• .	. 1			_	
		3/81		-	RCVR	RAMA-11								RAMALIWT RAMALIWT
0300	221	2/01	2000	~	RCYK	KAMA-11	030-05	020	10	42 . ON	133	13.05	2	KAMALIWI
0815	15/	3/81	SBOB	X.	NOREC.	RAMA-11	nsu-08	asu	17	07.6N	133	02.0F	5	RAMA11WT
										- / • • • • •			•	
1845	15/	3/81	\$8 O B	В	DROP	RAMA-11	JUAN	LMO	17	16.3N	132	38.4E	S	RAMALIWT
2300	22/	3/81	\$808	Е	RÇVR	RAMA-11	JUAN .	LMD	16	58.1N	132	38.0E	S	RAMATIWE
													_	
		3/81			DROP	RAMA-11								RAMAllWT
1935	21/	3/81	SBOB	Ε	RCVR	RAMA-11	∩\$U - 03	osu	17	24.8N	132	02.8E	S	RAMAIIWT
1040	16/	3/81	SBOB	В	DROP	RAMA-11	PHRED -	LMD	17	34.6N	.131	27.0F	5	RAMALIWT
1100					RCVR	RAMA-11							_	RAMATIWT
			3000	-		NATA-11	THINGU	EMU	. 1	-0+1N	131	U7 • 7 E	,	Weller Full

GMT D /M /Y LOC LOC	CODE SAMPLE ID	ENT.	CODE LAT.	UG81 PAGE Long.	4 LEG-SHIP
TIME DATE TIME TZ	SA MP		DISP		CRUISE

2301 16/ 3/81	SBOB B DROP RAM	A-11 DSU-12	OSU 17 46.2N	130 52.3E S	RAMALIWT
0935 21/ 3/81		A-11 DSU-12	OSU 17 46.7N		
1452 17/ 3/81		A-11 OSU-14	OSU 18 02.3N		
0200 21/ 3/81	MAR RVDR 3 8082	A-11 GSU-14	OSU 18 01.9N	130 11.15 3	KAMALIWI
1502 17/ 3/81	SBOB B DROP RAM	A-11 HUGO	LMD 18 02.2N	130 09.4E S	RAMA11WT
0100 21/ 3/81		A-11 HUGO	LMD 18 01.3N		
*** \$0N08UQY ***				-	
0300 18/ 3/81	SBSD SONOBUDY	RAMA11-1A	OSU 18 05.3N	129 34.2E \$	RAMALINT
0326 18/ 3/81	SBSD SONOBUDY		OSU 18 04.8N		
0342 18/ 3/81	SBSD SONOBUOY		OSU 18 04.7N		
0356 18/ 3/81	SBSD SONOBUDY		OSU 18 04.6N		
0312 19/ 3/81	SBSD SONOBIJOY	-	OSU 17 31.6N		
0426 19/ 3/81 0515 19/ 3/81	\$8\$D \$0N0BU0Y \$8\$D \$0N0BU0Y		OSU 17 25.6N OSU 17 21.6N		
0620 19/ 3/81	SBSD SONOBUOY		BSU 17 19.2N		
0736 19/ 3/81	SBSD SONOBURY		OSU 17 17.0N		
0856 19/ 3/81	SBSD SONOBUOY		OSU 17 13.6N		
0956 19/ 3/81		RAMA11-1K	DSU 17 11.2N		
1043 19/ 3/81	SBSD SONOBUOY	the state of the s	OSU 17 07.8N	132 59.3E S	RAMALINT
1136 19/ 3/81	SBSD SONOBUOY	RAMAli-1M :	OSU 17 05.7N		
1236 19/ 3/81	SBSD SONOBUOY		OSU 17 04.7N		
. 1330 19/ 3/81		RAMA11-10	DSU 17 03.8N		
1853 19/ 3/81	YOURONDS DZ82		OSU 16 53.8N		
2143 19/ 3/81 2301 19/ 3/81	\$85D SONOBURY \$BSD SONOBURY	RAMA11-1Q	OSU 16 42.4N OSU 16 50.3N		
2343 19/ 3/81		RAMALI-IR	030 16 55.2N		
0136 20/ 3/81	SBSD SONOBUOY		OSU 17 08.0N		
0236 20/ 3/81		RAMALI-1U	05U 17 00.3N		
0328 20/ 3/81	SBSD SONOBUOY	RAMA11-1V	OSU 16 54.3N	132 43.78 9	S RAMALLWT
0407 20/ 3/81		RAMA11-1W	OSU 16 53.4N		
0636 20/ 3/81		RAMA11-1X	85U 17 15.7N		
0952 20/ 3/81		RAMALI-1Y	DSU 17 23.7N		
1136 20/ 3/81		RAMAIL-IZ	DSU 17 29.6N		
1235 20/ 3/81		RAMAII-IAA	OSU 17 32.6N	_	
1535 20/ 3/81 1637 20/ 3/81		RAMA11-18B RAMA11-1CC	OSU 17 37.5N OSU 17 39.6N		
1838 20/ 3/81	= - "	RAMAII-IDD	OSU 17 47.3N		
1954 20/ 3/81		RAMALI-18E	OSU 17 50.8N		
•	•				
*** SONOBUOY DROP ***	SEISMIC REFRACTION	MONITORING			
0907 13/ 3/81	SBMB MOOR.BUDY	RAMA11-1A	OSU 16 59.7N	133 35.7E S	S RAMAILWT
					
9900	END. SAMPLE IN	DEX		RAMA	ITAL