LINE 36A — LABEL 36A

OBSERVER'S LOG SHOT POINT	NAVIGATION SHOT POINT	OBSERVER'S LOG SHOT POINT	NAVIGATION SHOT POINT	OBSERVER'S LOG SHOT POINT	NAVIGATION SHOT POINT
4872	101				
↓	↓				
6270	1499				

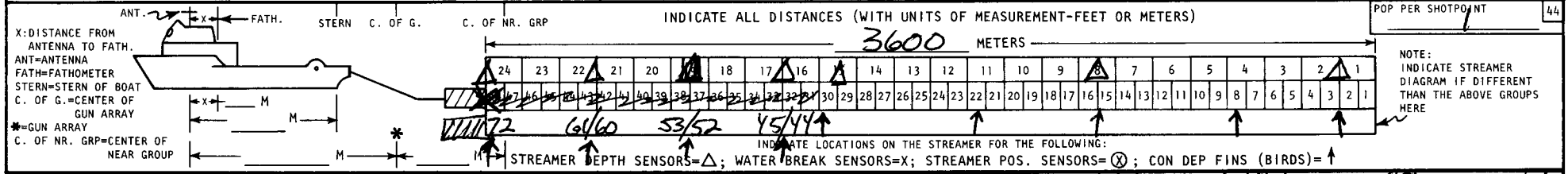
MARINE SEISMIC OBSERVER'S LOG

PAGE 1 OF 3 PAGES

CLIENT: USGS	1	PROSPECT: AOCS	2	AREA: EAST COAST US	3	LINE NO.: 36A	4
VESSEL: M/V CARINO	5	PARTY NO: 2912	6	INST. ENG.	7	DATE MO JUNE DAY 20 YR 72	8

CAMERA DISPLAY: ☑1 SYSTEM ☐2 SYSTEMS ☐NEAR AND FARS ☐ODD AND EVEN	9	TYPE: ☐DFS III ☑DFS IV OTHER	10	☑9 TRACK ☐21 TRACK	11	FORMAT SEG B "PE"	12	☑GAPPED ☐UNGAPPED			
NO. BYTES IN HEADER: 132	13	NO. BYTES IN RECORD ID: 2	14	NO. OF BYTES IN SCAN: 134	15	TIMING TRACE CHANNEL: HDX 4	16	RECORD NUMBERS: ☑DEC. ☐OCT.	17	PACKING DENSITY: (LO) ☐356 ☐800 (HI) ☐712 ☑1600	18
SAMPLE RATE: ☐1 ☐2 ☑4 ☐8 OTHER	19	RECORD LENGTH: 12 SEC.	20	DELAY START RECORD MODULE: (T_o)= 0 SEC	21	GAIN CONSTANT: 30 dB	22				

MAIN STREAMER RECORDING: NUMBER OF TRACES 48; TRACE NUMBERS 1-48; CHANNEL NOS. (ON MAG TAPE) 1-48	23	WATER BREAK RECORDING: LOCATION SS/FF; CHANNEL (ON TAPE) AUX1; TRACE (ON DISPLAY)	24	MINI STREAMER RECORDING: NUMBER OF TRACES; TRACE NUMBERS N/A; CHANNEL NOS. (ON MAG TAPE)	25	DIRECTION: 70°	26				
GROUP INTERVAL 50/100 M STREAMER LENGTH 3600 M; DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: M	27	CABLE NOISE: MAIN μBARS MINI μBARS	28	GROUP INTERVAL M STREAMER LENGTH M; DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: M	29						
COVERAGE: FOLD	30	SHOTPOINT INTERVAL: M	31	SHOTPOINT INCREMENT: +1	32	GUN DEPTH: 21 FT	33	WATER VELOCITY: CMS M/SEC	34		
FILTERS MAIN STREAMER: LOW 8/18 HIGH 62	35	FILTERS MINI STREAMER: LOW HIGH	36	RECORD GAIN MODE: ☐INIT ☐MAN ☐OPER ☑FFP	37	REPRODUCE MODE: ☐FLOAT ☐DEFLOAT ☑AGC	38	AIRGUN ARRAY: 2000 IN³	39	AIRGUN PRESSURE: 2000 PSI	40
SYSTEM DELAYS: AIRGUN DELAY 51 MS. FILTER DELAY MS. DISPLAY DELAY 51 MS.	41	POLARITY: PRESSURE INCREASE ON PHONE: ☑NEGATIVE ☐POSITIVE } NUMBERS ON TAPE; ☑DOWNBREAK ☐UPBREAK } ON DISPLAY						ALIASING FILTER 62	42		43



POP PER SHOTPOINT 1 (44)

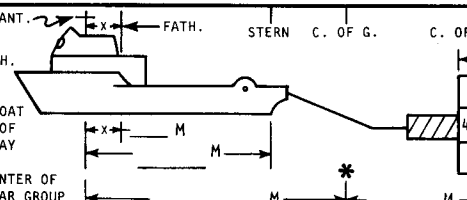
NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

	SHOTPOINT (43)	RPT	REC # OR DUMMY (-1) (44)	REEL NUMBER (45)	XPORT	W. DEPTH (M) (46)	OFFSET (M) (47)	STREAMER DEPTH 6 (48)	5	4	3	2	1	MINI STR (49)	MINI-STR OFFSET(M) (50)	POP SP (51)	TIME LOCAL/GMT (52)	F/S 4872 L/S 6900 F/R 9688 L/R 3960 (53) AZ 78 LINE 36A (58) LINE (59)	
1	4872		968	75549	A	37		34	30	31	35	33	33				2054		BEGIN 36A DOGLEG, FSP 4872
2	4873		001																SEQUENCE COUNTER ADV.
3	4948		-1																PARITY
4	4981		109	75549	B	485	389	33	29	30	35	32	35				2126		TB 182° HEADING 74°
5	5013		-1																HIGH PARITY
6	5016		-1																HIGH PARITY
7	5090		218	75549	A	74		32	25	29	35	32	34				2158		TB 185° HEADING 74°
8	5095		-1																HIGH PARITY
9	5199		327	75549	B	45		31	35	30	36	37	36				2231		TAPE CHG, FSP 5199, FRN 327
10	5199		-1																PARITY
11	5308		436	75549	A	45	328	35	35	30	35	35	35				2301		TB 183° HEADING 68°
12	5312		-1																PARITY
13	5319																		MISSED REC NO - DFS MLFN
14	5320																		DFS MLFN
15	5321																		MISSED REC NO - DFS MLFN
16	5328		447	75400	B												2305		TP CHG, DUE TO DFS MLFN
17	5427		-1																PARITY

TI-23287A

MARINE SEISMIC OBSERVER'S LOG

CLIENT: U.S.G.S. [1]	PROSPECT: AOCS [2]	AREA: EAST COAST [3]	LINE NO.: 36A [4]				
VESSEL: CARINO [5]	PARTY NO: 2912 [6]	INST. ENG. [7]	DATE: MO JUNE DAY 20 YR 78 [8]				
CAMERA DISPLAY: [9] ☒ 1 SYSTEM ☐ 2 SYSTEMS ☐ NEAR AND FARS ☐ ODD AND EVEN	TYPE: [10] ☐ DFS III ☒ DFS IV OTHER	☒ 9 TRACK ☐ 21 TRACK [11]	FORMAT: [12] SEG B "PE" ☒ GAPPED ☐ UNGAPPED				
NO. BYTES IN HEADER: 132 [13]	NO. BYTES IN RECORD ID: 2 [14]	NO. OF BYTES IN SCAN: 134 [15]	TIMING TRACE CHANNEL: AUX 4 [16]	RECORD NUMBERS: [17] ☒ DEC. ☐ OCT.	PACKING DENSITY: [18] (LO) ☐ 356 ☐ 800 (HI) ☐ 712 ☒ 1600		
SAMPLE RATE: [19] ☐ 1 ☐ 2 ☐ 4 ☐ 8 OTHER	RECORD LENGTH: 12 SEC. [20]	DELAY START RECORD MODULE: (T_o)= SEC [21]	GAIN CONSTANT: 30 dB [22]				
MAIN STREAMER RECORDING: [23] NUMBER OF TRACES / TRACE NUMBERS / CHANNEL NOS. (ON MAG TAPE)	WATER BREAK RECORDING: [24] 1 2 3 4 5 6 LOCATION / CHANNEL (ON TAPE) / TRACE (ON DISPLAY)	MINI STREAMER RECORDING: [25] NUMBER OF TRACES / TRACE NUMBERS / CHANNEL NOS. (ON MAG TAPE)	DIRECTION: [26] N W E S				
GROUP INTERVAL 50/100 M STREAMER LENGTH 3600 M [27] DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: M	CABLE NOISE: [28] MAIN μBARS MINI μBARS	GROUP INTERVAL M STREAMER LENGTH M [29] DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: M					
COVERAGE: 36 FOLD [30]	SHOTPOINT INTERVAL: 50 M [31]	SHOTPOINT INCREMENT: +1 [32]	GUN DEPTH: 21 ft [33]	WATER VELOCITY: M/SEC [34]			
FILTERS MAIN STREAMER: [35] LOW 8/18 HIGH 62	FILTERS MINI STREAMER: [36] LOW HIGH	RECORD GAIN MODE: [37] ☐ INIT ☐ MAN ☐ OPER ☒ IFP	REPRODUCE MODE: [38] ☐ FLOAT ☐ DEFLOAT ☒ AGC	AIRGUN ARRAY: 2K IN^3 [39]	AIRGUN PRESSURE: 2K PSI [40]		
SYSTEM DELAYS: [41] AIRGUN DELAY 5 MS. FILTER DELAY MS. DISPLAY DELAY 51 MS.	POLARITY: PRESSURE INCREASE ON PHONE: ☒ NEGATIVE ☐ POSITIVE — NUMBERS ON TAPE; ☒ DOWNBREAK ☐ UPBREAK — ON DISPLAY	ALIASING FILTER: [42] 62 [43]					



X: DISTANCE FROM ANTENNA TO FATH.
ANT=ANTENNA
FATH=FATHOMETER
STERN=STERN OF BOAT
C. OF G.=CENTER OF GUN ARRAY
*=GUN ARRAY
C. OF NR. GRP=CENTER OF NEAR GROUP

INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

3600 METERS

POP PER SHOTPOINT 1 [44]

24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1
48	47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT [43]	RPT	REC # OR DUMMY (-1) [44]	REEL NUMBER [45]	XPORT	W. DEPTH (M) [46]	OFFSET (M) [47]	STREAMER DEPTH [48] 6	5	4	3	2	1	MINI STR [49]	MINI-STR OFFSET(M) [50]	POPSP [51]	TIME ~~LOCAL~~ GMT [52]	FS 54330 [53] LS	FR 555 [55] LR	AZ [57] IN X [58] N [59] LINE 36A [60]
1	54301		555	7540021	A	44.5	3.24	33	34	30	35	36	35				23:35			TB 178° HEADING 72° [61]
2	54381																			MISSED REC - DFS MALFN
3	54391		563	7540031	B	46.8		34	29	30	35	36	35				23:37			TRCHG DUE TO DFS MALFN
4	54471		-1																	PARITY
5	54811		-1																	PARITY
6	55221							32	34	30	35	35	34				0400			MIDNIGHT GMT TRANSIT
7	55471		671	7540041	A	43	33.6	32	34	30	35	35	34				0006			TB 180° HEADING 68
8	~~56681~~		~~791~~	~~7540061~~	~~B~~	~~43~~	~~33.7~~	~~34~~	~~33~~	~~30~~	~~34~~	~~36~~	~~34~~				~~0038~~			
9	55559		682	7540051	B															
10	56681		791	7540061	A	43	33.7	34	33	30	34	36	34				0038			TB 174 HEADING 73
11	56851																			MISSED REC - DFS MALFN
12	56861																			MISSED REC - DFS MALFN
13	56871		-1																	BAD RECORD
14	56881		809	7540071	B	43.8	32.6	33	30	30	34	36	33				0043			TRCHG DUE TO DFS MALFN
15	56991		-1																	HIGH PARITY
16	57001		-1																	HIGH PARITY
17	57831		-1																	HIGH PARITY

TI-23287A

MARINE SEISMIC OBSERVER'S LOG

PAGE 3 OF 3 PAGES

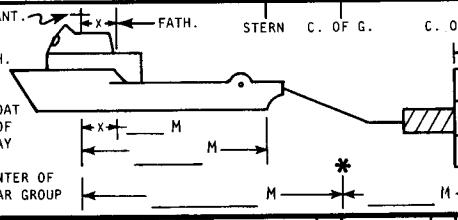
CLIENT: U.S.G.S.	PROSPECT: AOCS	AREA: EAST COAST U.S.	LINE NO.: 36A				
VESSEL: CARINO	PARTY NO: 2912	INST. ENG.	DATE: MO JUNE DAY 21 YR 78				

CAMERA DISPLAY: [X] SYSTEM [ ] 2 SYSTEMS [ ] NEAR AND FARS [ ] ODD AND EVEN
TYPE: [ ] DFS III [X] DFS IV OTHER ____ [X] 9 TRACK [ ] 21 TRACK
FORMAT: SEG B PE [X] GAPPED [ ] UNGAPPED

NO. BYTES IN HEADER: 132	NO. BYTES IN RECORD ID: 2	NO. OF BYTES IN SCAN: 134	TIMING TRACE CHANNEL: AUX 4	RECORD NUMBERS: [X] DEC. [ ] OCT.	PACKING DENSITY: (LO) [ ] 356 [ ] 800 (HI) [ ] 712 [X] 1600		
SAMPLE RATE: [ ] 1 [ ] 2 [X] 4 [ ] 8 OTHER ____	RECORD LENGTH: 12 SEC.	DELAY START RECORD MODULE: (T_o) = ____ SEC	GAIN CONSTANT: 30 dB				

MAIN STREAMER RECORDING:	WATER BREAK RECORDING:	MINI STREAMER RECORDING:	DIRECTION:
NUMBER OF TRACES: 48	LOCATION: 1 2 3 4 5 6	NUMBER OF TRACES: N/A	N / W E / S
TRACE NUMBERS: 1-48	CHANNEL (ON TAPE):	TRACE NUMBERS:	
CHANNEL NOS. (ON MAG TAPE): 1-48	TRACE (ON DISPLAY):	CHANNEL NOS. (ON MAG TAPE):	
GROUP INTERVAL 50/100 M STREAMER LENGTH 3600 M	CABLE NOISE: MAIN ____ μBARS | MINI ____ μBARS	GROUP INTERVAL ____ M STREAMER LENGTH ____ M	
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M		DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M	

COVERAGE: 36 FOLD	SHOTPOINT INTERVAL: 50 M	SHOTPOINT INCREMENT: +1	GUN DEPTH: 21 ft M	WATER VELOCITY: ____ M/SEC			
FILTERS MAIN STREAMER: LOW 8/18 HIGH 62	FILTERS MINI STREAMER: LOW ____ HIGH ____	RECORD GAIN MODE: [ ] INIT [ ] MAN [ ] OPER [X] FP	REPRODUCE MODE: [ ] FLOAT [ ] DEFLOAT	AIRGUN ARRAY: 2K IN³ [X] AGC	AIRGUN PRESSURE: 2K PSI		
SYSTEM DELAYS: AIRGUN DELAY 51 MS. FILTER DELAY ____ MS. DISPLAY DELAY ____ MS.	POLARITY: PRESSURE INCREASE ON PHONE: [X] NEGATIVE [ ] POSITIVE } NUMBERS ON TAPE	[X] DOWNBREAK [ ] UPBREAK } ON DISPLAY	ALIASING FILTER 62				



X: DISTANCE FROM ANTENNA TO FATH.
ANT=ANTENNA
FATH=FATHOMETER
STERN=STERN OF BOAT
C. OF G.=CENTER OF GUN ARRAY
*=GUN ARRAY
C. OF NR. GRP=CENTER OF NEAR GROUP

INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

3600 METERS

24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1
48	47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

POP PER SHOTPOINT: 1

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT	RPT	REC # OR DUMMY (-1)	REEL NUMBER	XPORT	W. DEPTH (M)	OFFSET (M)	STREAMER DEPTH 6	5	4	3	2	1	MINI STR	MINI-STR OFFSET(M)	POP SP	TIME LOCAL/GMT	FS 5795 LS 6270 FR 9116 LR 3990 AZ LINE 36A	
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60	61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80
1	5795		9116	7540 08	A	45	338	35	29	29	35	35	22				0111		TB 181° HEADING 68°
2	5879		90																COUNTER RADANCE
3	5904		26	7540 09	B	46.5	340	32	34	30	34	36	30				0141		TB 178° HEADING 69
4	5905		-1																HIGH PARITY
5	5906		-1																HIGH PARITY
6	5953		-1																PARITY
7	6012		134	7540 10	A	46.5	340	34	35	31	34	34	30				0210		TAPE CHG RSC 6012 FRN 134
8	6121		243	7540 11	B	46	340	35	31	30	33	33	30				0241		TB 181° HEADING 65°
9	6130																		MISSED RECORD
10	6131		252	7540 12	A												0243		TPCHG DUE TO DFS MALFN
11	6240		361	7540 13	B	48.5	342	37	31	30	34	32	29				0314		TB 182 HEADING 62°
12	6247		-1																PARITY
13	6254																		MISSED REC - DFS MALFN
14	6255		375	7540 14	A												0319		TPCHG DUE TO DFS MALFN
15	6270		399	7540 14	A	48	331	36	32	30	34	32	27				0323		CMS CRATERED - CIRCLE
16			391														0324		NOISE STRIP
17																			

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LINE 3CAA - LABEL 3CAA

OBSERVER'S LOG SHOT POINT	NAVIGATION SHOT POINT	OBSERVER'S LOG SHOT POINT	NAVIGATION SHOT POINT	OBSERVER'S LOG SHOT POINT	NAVIGATION SHOT POINT
NO NAVIGATION CHANGES					

MARINE SEISMIC OBSERVER'S LOG

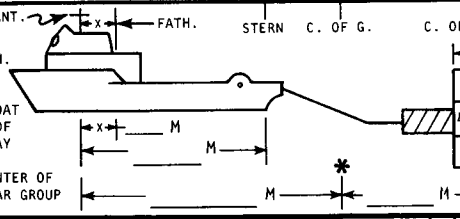
PAGE 1 OF 13 PAGES

1 CLIENT: USGS	2 PROSPECT: AOCS	3 AREA: EAST COAST	4 LINE NO.: 136 A				
5 VESSEL: CARINO	6 PARTY NO: 2912	7 INST. ENG. OLOW	8 DATE: MO 06 DAY 21 YR 78				
9 CAMERA DISPLAY: ☐1 SYSTEM ☐2 SYSTEMS ☐NEAR AND FARS ☐ODD AND EVEN	10 TYPE: ☐DFS III ☐DFS IV OTHER ☑9 TRACK ☐21 TRACK	11 FORMAT: SEG B "PE"	12 ☑GAPPED ☐UNGAPPED				
13 NO. BYTES IN HEADER: 64	14 NO. BYTES IN RECORD ID: 2	15 NO. OF BYTES IN SCAN: 164	16 TIMING TRACE CHANNEL: 8	17 RECORD NUMBERS: ☑DEC. ☐OCT.	18 PACKING DENSITY: (LO) ☐356 ☐800 (HI) ☐712 ☑1600		
19 SAMPLE RATE: ☐1 ☐2 ☑4 ☐8 OTHER	20 RECORD LENGTH: 12 SEC.	21 DELAY START RECORD MODULE: (T_o)= 0 SEC	22 GAIN CONSTANT: 30 dB				

23 MAIN STREAMER RECORDING: NUMBER OF TRACES 48; TRACE NUMBERS 1-48; CHANNEL NOS. (ON MAG TAPE) 1-48 + AUX	WATER BREAK RECORDING: LOCATION STR 48; CHANNEL (ON TAPE); TRACE (ON DISPLAY)	24 MINI STREAMER RECORDING: NUMBER OF TRACES; TRACE NUMBERS; CHANNEL NOS. (ON MAG TAPE)	25 DIRECTION: 70°
GROUP INTERVAL 100 ± 50 M STREAMER LENGTH 3600 M 27	CABLE NOISE: MAIN 1 μBARS MINI μBARS 28	GROUP INTERVAL M STREAMER LENGTH M 29	
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: M		DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: M	

30 COVERAGE: 36 FOLD	31 SHOTPOINT INTERVAL: 50 M	SHOTPOINT INCREMENT: INCREASING 32	GUN DEPTH: 21 FT. 33	WATER VELOCITY: 1519 M/SEC 34			
35 FILTERS MAIN STREAMER: LOW 8/18 HIGH 62	36 FILTERS MINI STREAMER: LOW HIGH	RECORD GAIN MODE: ☐INIT ☐MAN ☐OPER ☑IFP 37	REPRODUCE MODE: ☐FLOAT ☐DEFLOAT ☑AGC 38	AIRGUN ARRAY: 2K IN^3 39	AIRGUN PRESSURE: 2K PSI 40		
SYSTEM DELAYS: AIRGUN DELAY 51 MS. FILTER DELAY MS. DISPLAY DELAY MS.	41 POLARITY: PRESSURE INCREASE ON PHONE: ☑NEGATIVE ☐POSITIVE (NUMBERS ON TAPE) ☑DOWNBREAK ☐UPBREAK (ON DISPLAY)	42 ALIASING FILTER 62	43				

ANT.=ANTENNA; FATH.=FATHOMETER; STERN=STERN OF BOAT; C. OF G.=CENTER OF GUN ARRAY; ✱=GUN ARRAY; C. OF NR. GRP=CENTER OF NEAR GROUP



X: DISTANCE FROM ANTENNA TO FATH.

INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

3600 METERS

24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1
48	47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

POP PER SHOTPOINT 1 44

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING: STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	43 SHOTPOINT	RPT	44 REC # OR DUMMY (-1)	45 REEL NUMBER	XPORT	46 W. DEPTH (M)	47 OFFSET (M)	48 STREAMER DEPTH						49 MINI STR	50 MINI-STR OFFSET(M)	POP SP	51 TIME ~~LOCAL~~ GMT 52	53 F S 0000 / A Z	54 L S / I N X 58	55 F R 001 / L I N E 136 A 59	56 L R 60	61
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60				61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80
1	00.00	A	00	75 [illegible]	B												0550					COMPUTER ERROR 1ST S.P. = 0000
2	0001	A	002			45	339	32	30	30	32	30	30									SHIPS HD. 63, TAIL BUOY 181
3	0006		007					30	25	30	32	32	27									COMPLETE OVERLAP
4	0109		110	75 4016	A																	TAPE CH. FSP 109 - FRN 110
5	0115		116			46	339	30	26	30	32	30	27				0621					S 56° TB 100°
6	0125		126	75 [illegible]	A																	6000 REC
7	0126		127	75 4016	A																	SHORT REC, LAST REC # SP, LAST TRC
8	0127		128	75 4017	B																	TAPE CH FSP 0127 FRN 128
9	0167		168	75 4017	B																	SHORT REC, LAST REC SP, LAST TRC
10	0168		169	75 4018	A																	TAPE CH. 0168 FRN 169
11	0252		253			47	339	30	30	30	32	30	28				0700					S H 73° TB 177°
12	0278		279	75 4019	B																	TAPE CH. 0278 FRN 279
13	0286		287	75 4019	B																	SHORT REC, LAST REC, SP, TAPE CH.
14	0287		-1																			MISSED
15	288		-1																			MISSED
16	289		288	75 4020	A																	TAPE CH. SP 289 FRN 288
17	296		295	75 4020	A			30	31	30	31	30	29									SHORT REC, LAST REC # SP, TAPE CH
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60				61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80

TI-23287A

MARINE SEISMIC OBSERVER'S LOG

PAGE 2 OF 15 PAGES

CLIENT: USGS [1]	PROSPECT: AOCS [2]	AREA: EAST COAST [3]	LINE NO.: 136 A [4]				
VESSEL: CARIÑO [5]	PARTY NO: 2912 [6]	INST. ENG. CLOW [7]	DATE: MO 6 DAY 21 YR 70 [8]				

CAMERA DISPLAY: ☐1 SYSTEM ☐2 SYSTEMS ☐NEAR AND FARS ☐ODD AND EVEN [9]

TYPE: ☐DFS III ☐DFS IV OTHER ____ [10]

☐9 TRACK ☐21 TRACK [11]

FORMAT: ☐GAPPED ☐UNGAPPED SEG ____ [12]

NO. BYTES IN HEADER: [13]

NO. BYTES IN RECORD ID: [14]

NO. OF BYTES IN SCAN: [15]

TIMING TRACE CHANNEL: [16]

RECORD NUMBERS: ☐DEC. ☐OCT. [17]

PACKING DENSITY: (LO) ☐356 ☐800 (HI) ☐712 ☐1600 [18]

SAMPLE RATE: ☐1 ☐2 ☐4 ☐8 OTHER ____ [19]

RECORD LENGTH: ____ SEC. [20]

DELAY START RECORD MODULE: (T_o) = ____ SEC [21]

GAIN CONSTANT: [22]

MAIN STREAMER RECORDING: [23]
NUMBER OF TRACES ____
TRACE NUMBERS ____
CHANNEL NOS. (ON MAG TAPE) ____

WATER BREAK RECORDING: [24]
LOCATION 1 2 3 4 5 6
CHANNEL (ON TAPE)
TRACE (ON DISPLAY)

MINI STREAMER RECORDING: [25]
NUMBER OF TRACES ____
TRACE NUMBERS ____
CHANNEL NOS. (ON MAG TAPE) ____

DIRECTION: [26] N W E S

GROUP INTERVAL ____ M STREAMER LENGTH ____ M [27]
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M

CABLE NOISE: [28]
MAIN ____ μBARS | MINI ____ μBARS

GROUP INTERVAL ____ M STREAMER LENGTH ____ M [29]
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M

COVERAGE: ____ FOLD [30]

SHOTPOINT INTERVAL: ____ M [31]

SHOTPOINT INCREMENT: [32]

GUN DEPTH: ____ M [33]

WATER VELOCITY: ____ M/SEC [34]

FILTERS MAIN STREAMER: LOW ____ HIGH ____ [35]

FILTERS MINI STREAMER: LOW ____ HIGH ____ [36]

RECORD GAIN MODE: ☐INIT ☐MAN ☐OPER ☐IFP [37]

REPRODUCE MODE: ☐FLOAT ☐DEFLOAT ☐AGC [38]

AIRGUN ARRAY: ____ IN^3 [39]

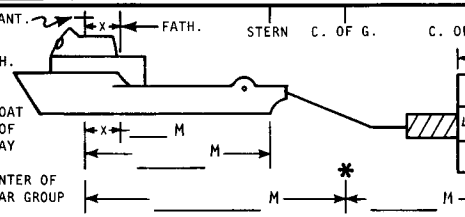
AIRGUN PRESSURE: ____ PSI [40]

SYSTEM DELAYS: AIRGUN DELAY ____ MS. FILTER DELAY ____ MS. DISPLAY DELAY ____ MS. [41]

POLARITY: PRESSURE INCREASE ON PHONE: ☐NEGATIVE ☐POSITIVE } NUMBERS ON TAPE ☐DOWNBREAK ☐UPBREAK } ON DISPLAY [42]

ALIASING FILTER [43]

POP PER SHOTPOINT [44]



INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

METERS

24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1
48	47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT [43]	RPT	REC # OR DUMMY (-1) [44]	REEL NUMBER [45]	XPORT	W. DEPTH (M) [46]	OFFSET (M) [47]	STREAMER DEPTH [48]						MINI STR [49]	MINI-STR OFFSET(M) [50]	POP SP [51]	TIME [52] LOCAL/GMT	F I S / A Z [53]	L S / I N X [54]	F I R / N [55]	L I R / I N E [56]	
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60				61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80
1	297		296	754021	B																	TAPE CH, FSP 297, FRN 296
2	330		-1																			A/F 337
3	406		405	754022	A	351		32	30	30	31	30	30									TAPE CH, FSP 406, FRN 405
4	500		499					30	26	28	33	32	28				0813					
5	516		515	754023	B																	TAPE CH FSP 515, FRN 515
6	551		-1 550																			A/F
7	552		-1 551																			A/F
8	625		624	754024	A																	Tape ch, FSP 625, FRN 624
9	634		-1																			No RECORD, JUST MARK
10	635		633																			good record
11	650		648														0856					Head 81° trailBuoy 176°
12	660		658					25	15	25	33	30	25									
13	683		-1 681																			A/F
14	735		733	754025	B																	Tape CH FSP 735 FRN 733
15	760		758			51	3393	30	30	31	33	27					0930					SH 70° TB 180°
16	844		842																			good record
17	845		-1																			No Record
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60				61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80

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MARINE SEISMIC OBSERVER'S LOG

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CLIENT: USAS	PROSPECT: AOCS	AREA: EAST COAST	LINE NO.: 136A	
VESSEL: CARINO	PARTY NO: 2912	INST. ENG.: CLOW	DATE: MO 6 DAY 21 YR 71	

CAMERA DISPLAY: ☐1 SYSTEM ☐2 SYSTEMS ☐NEAR AND FARS ☐ODD AND EVEN

TYPE: ☐DFS III ☐DFS IV OTHER ☐9 TRACK ☐21 TRACK

FORMAT: SEG ☐GAPPED ☐UNGAPPED

NO. BYTES IN HEADER:

NO. BYTES IN RECORD ID:

NO. OF BYTES IN SCAN:

TIMING TRACE CHANNEL:

RECORD NUMBERS: ☐DEC. ☐OCT.

PACKING DENSITY: (LO) ☐356 ☐800 (HI) ☐712 ☐1600

SAMPLE RATE: ☐1 ☐2 ☐4 ☐8 OTHER

RECORD LENGTH: SEC.

DELAY START RECORD MODULE: (T_o)= SEC

GAIN CONSTANT:

MAIN STREAMER RECORDING:
NUMBER OF TRACES
TRACE NUMBERS
CHANNEL NOS. (ON MAG TAPE)

WATER BREAK RECORDING: 1 2 3 4 5 6
LOCATION
CHANNEL (ON TAPE)
TRACE (ON DISPLAY)

MINI STREAMER RECORDING:
NUMBER OF TRACES
TRACE NUMBERS
CHANNEL NOS. (ON MAG TAPE)

DIRECTION: N W E S

GROUP INTERVAL M STREAMER LENGTH M
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: M

CABLE NOISE: MAIN μBARS | MINI μBARS

GROUP INTERVAL M STREAMER LENGTH M
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: M

COVERAGE: FOLD

SHOTPOINT INTERVAL: M

SHOTPOINT INCREMENT:

GUN DEPTH: M

WATER VELOCITY: M/SEC

FILTERS MAIN STREAMER: LOW HIGH

FILTERS MINI STREAMER: LOW HIGH

RECORD GAIN MODE: ☐INIT ☐MAN ☐OPER ☐IFP

REPRODUCE MODE: ☐FLOAT ☐DEFLOAT ☐AGC

AIRGUN ARRAY: IN^3

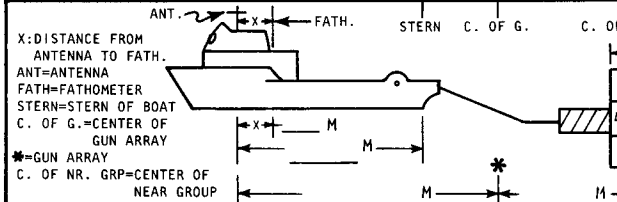
AIRGUN PRESSURE: PSI

SYSTEM DELAYS: AIRGUN DELAY MS. FILTER DELAY MS. DISPLAY DELAY MS.

POLARITY: PRESSURE INCREASE ON PHONE: ☐NEGATIVE ☐POSITIVE } NUMBERS ON TAPE ☐DOWNBREAK ☐UPBREAK } ON DISPLAY

ALIASING FILTER

POP PER SHOTPOINT



X:DISTANCE FROM ANTENNA TO FATH.
ANT=ANTENNA
FATH=FATHOMETER
STERN=STERN OF BOAT
C. OF G.=CENTER OF GUN ARRAY
✱=GUN ARRAY
C. OF NR. GRP=CENTER OF NEAR GROUP

INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

METERS

24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1
48	47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT [43]	RPT	REC # OR DUMMY (-1) [44]	REEL NUMBER [45]	XPORT	W. DEPTH (M) [46]	OFFSET (M) [47]	STREAMER DEPTH [48]						MINI STR [49]	MINI-STR OFFSET(M) [50]	POP SPR [51]	TIME [52] ~~LOCAL~~ GMT	F S [53] A Z [57]	L S [54] I N X [58]	F R [55] N [59]	L R [56] L I N E [60]	
1	8416		8413	754026A																		Tape ch FSP 8416 FRN 8413
2	8461		-1																			Data lockup: Noise
3	8462		8558	754027B																		Tape ch FSP 8462 FRN 8558
4	8891		(-1) 8895																			Dowsky
5	9722		9624	754028A																		Tape ch. FSP 9722 FRN 9624
6	9624		9714			63		32	30	30	31	29	30				1034					SH 71° TB 182°
7	10004		001																			counter advance
8	10055		(-1) 58																			Dowsky
9	10811		0778	754029B				32	30	30	35	31	30				1105					Tape ch FSP 10811 FRN 778
10	11149		1146														1123					Begin Dog Leg 2 HR 136 "B"
11	11190		187	754030A																		Tape ch. FSP 11190 FRN 187
12	11193		190			58	346	35	32	30	32	30	30				1135					SH 69° TB 161°
13	11196		(-1) 193																			Parity
14	11197		(-1) 194																			Parity
15	11192		289					34	31	30	33	30	30				1204					SH 69° TB 180°
16	13000		2977	754031B																		Tape ch FSP 13000 FRN 2977
17	14091		4016	754032A		58	346	31	30	30	35	30	30				1237					Tape ch FSP 14091 FRN 4016

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LINE 36B - LABEL 36B

OBSERVER'S LOG	NAVIGATION	OBSERVER'S LOG	NAVIGATION	OBSERVER'S LOG	NAVIGATION
SHOT POINT	SHOT POINT	SHOT POINT	SHOT POINT	SHOT POINT	SHOT POINT

NO NAVIGATION CHANGES

MARINE SEISMIC OBSERVER'S LOG

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CLIENT: USGS [1]	PROSPECT: AOCS [2]	AREA: EAST COAST [3]	LINE NO.: 136B [4]				
VESSEL: CARIBE [5]	PARTY NO: 2912 [6]	INST. ENG. C20W [7]	DATE: MO ____ DAY ____ YR ____ [8]				

CAMERA DISPLAY: [9] ☐1 SYSTEM ☐2 SYSTEMS ☐NEAR AND FARS ☐ODD AND EVEN

TYPE: [10] ☐DFS III ☐DFS IV OTHER ____

[11] ☐9 TRACK ☐21 TRACK

FORMAT: [12] ☐GAPPED ☐UNGAPPED SEG ____

NO. BYTES IN HEADER: [13]

NO. BYTES IN RECORD ID: [14]

NO. OF BYTES IN SCAN: [15]

TIMING TRACE CHANNEL: [16]

RECORD NUMBERS: [17] ☐DEC. ☐OCT.

PACKING DENSITY: [18] (LO) ☐356 ☐800 (HI) ☐712 ☐1600

SAMPLE RATE: [19] ☐1 ☐2 ☐4 ☐8 OTHER ____

RECORD LENGTH: [20] ____ SEC.

DELAY START RECORD MODULE: [21] (T_o) = ____ SEC

GAIN CONSTANT: [22]

MAIN STREAMER RECORDING: [23]
NUMBER OF TRACES ____
TRACE NUMBERS ____
CHANNEL NOS. (ON MAG TAPE) ____
GROUP INTERVAL ____ M STREAMER LENGTH ____ M
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M

WATER BREAK RECORDING: [24]
LOCATION 1 2 3 4 5 6
CHANNEL (ON TAPE)
TRACE (ON DISPLAY)

MINI STREAMER RECORDING: [25]
NUMBER OF TRACES ____
TRACE NUMBERS ____
CHANNEL NOS. (ON MAG TAPE) ____
GROUP INTERVAL ____ M STREAMER LENGTH ____ M
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M [29]

DIRECTION: [26] N W E S

CABLE NOISE: [27] MAIN ____ μBARS [28] MINI ____ μBARS

COVERAGE: [30] ____ FOLD

SHOTPOINT INTERVAL: [31] ____ M

SHOTPOINT INCREMENT: [32]

GUN DEPTH: [33] ____ M

WATER VELOCITY: [34] ____ M/SEC

FILTERS MAIN STREAMER: [35] LOW ____ HIGH ____

FILTERS MINI STREAMER: [36] LOW ____ HIGH ____

RECORD GAIN MODE: [37] ☐INIT ☐MAN ☐OPER ☐IFP

REPRODUCE MODE: [38] ☐FLOAT ☐DEFLOAT ☐AGC

AIRGUN ARRAY: [39] ____ IN^3

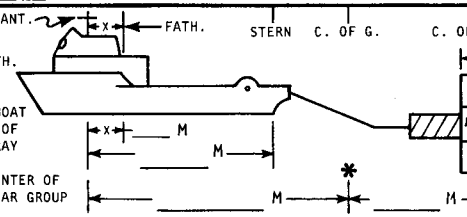
AIRGUN PRESSURE: [40] ____ PSI

SYSTEM DELAYS: [41] AIRGUN DELAY ____ MS. FILTER DELAY ____ MS. DISPLAY DELAY ____ MS.

POLARITY: PRESSURE INCREASE ON PHONE: ☐NEGATIVE ☐POSITIVE } NUMBERS ON TAPE ☐DOWNBREAK ☐UPBREAK } ON DISPLAY [42]

ALIASING FILTER [43]

POP PER SHOTPOINT [44]



X: DISTANCE FROM ANTENNA TO FATH.
ANT=ANTENNA
FATH=FATHOMETER
STERN=STERN OF BOAT
C. OF G.=CENTER OF GUN ARRAY
✱=GUN ARRAY
C. OF NR. GRP=CENTER OF NEAR GROUP

INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

METERS

24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1
48	47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT [43]	RPT	REC # OR DUMMY (-1) [44]	REEL NUMBER [45]	XPORT	W. DEPTH (M) [46]	OFFSET (M) [47]	STREAMER DEPTH [48]						MINI STR [49]	MINI-STR OFFSET(M) [50]	POPSP [51]	TIME [52] GMT	F I S [53] A I Z	L S [54] I N X	F I R [55] N	L I R [56] L I N E	
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60				61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80
1	1427		424														1241					SHIPS HDG 70 TAIL BUOY 178
2	1517		514	7SH033B																		TAPE CH FSP 1517 FRN 514
3	1523		520			59	348	30	28	30	32	32	30				1353					SH 73° TB 179
4	1601		605																			PARITY
5	1617		614			60	348	3H	30	30	32	3H	28				133H					SH 70° TB 180
6	1626		623	75403HA																		tape ch FSP 1626 FRN 623
7	1694		-1																			DFS start upon
8	1695		691																			good agreement
9	1696		692																			good agreement
10	1736		732	7S403SB		62	349	31	30	30	31	31	26				1406					TAPE CH FSP 1736 FRN 692
11	1750		746																			SHIPS HDG 69 TAIL BUOY 179
12	1760		756																			SYNC ERROR
13	1846		842	7SH036A																		TAPE CH FSP 1846 FRN 842
14	1854		849			63	350	2S	32	30	32	32	39				1447					SH 69° TB 180
15	1955		957																			~~TAPE FSP~~ good ~~FRN~~ Rec
16	1956		-1																			NR
17	1957		-1																			NR
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60				61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80

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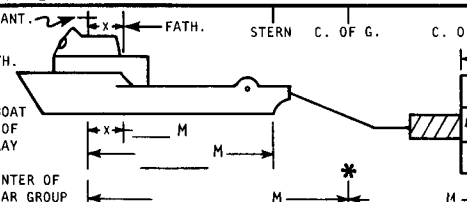
MARINE SEISMIC OBSERVER'S LOG

PAGE 5 OF 13 PAGES

CLIENT: USGS [1]	PROSPECT: AOCS [2]	AREA: EAST COAST [3]	LINE NO.: 136B [4]				
VESSEL: M/V CARANO [5]	PARTY NO: 2912 [6]	INST. ENG. [7]	DATE: MO JUNE DAY 21 YR 78 [8]				
CAMERA DISPLAY: ☐1 SYSTEM ☐2 SYSTEMS ☐NEAR AND FARS ☐ODD AND EVEN [9]	TYPE: ☐DFS III ☐DFS IV OTHER [10]	☐9 TRACK ☐21 TRACK [11]	FORMAT: ☐GAPPED ☐UNGAPPED SEG [12]				
NO. BYTES IN HEADER: [13]	NO. BYTES IN RECORD ID: [14]	NO. OF BYTES IN SCAN: [15]	TIMING TRACE CHANNEL: [16]	RECORD NUMBERS: ☐DEC. ☐OCT. [17]	PACKING DENSITY: (LO) ☐356 ☐800 (HI) ☐712 ☐1600 [18]		
SAMPLE RATE: ☐1 ☐2 ☐4 ☐8 OTHER [19]	RECORD LENGTH: SEC. [20]	DELAY START RECORD MODULE: (T_o)= SEC [21]	GAIN CONSTANT: [22]				
MAIN STREAMER RECORDING: [23] NUMBER OF TRACES / TRACE NUMBERS / CHANNEL NOS. (ON MAG TAPE)	WATER BREAK RECORDING: [24] 1 2 3 4 5 6 — LOCATION / CHANNEL (ON TAPE) / TRACE (ON DISPLAY)	MINI STREAMER RECORDING: [25] NUMBER OF TRACES / TRACE NUMBERS / CHANNEL NOS. (ON MAG TAPE)	DIRECTION: [26] N W E S				
GROUP INTERVAL ___ M STREAMER LENGTH ___ M [27] DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ___ M	CABLE NOISE: [28] MAIN ___ μBARS MINI ___ μBARS	GROUP INTERVAL ___ M STREAMER LENGTH ___ M [29] DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ___ M					
COVERAGE: ___ FOLD [30]	SHOTPOINT INTERVAL: ___ M [31]	SHOTPOINT INCREMENT: [32]	GUN DEPTH: ___ M [33]	WATER VELOCITY: ___ M/SEC [34]			
FILTERS MAIN STREAMER: LOW ___ HIGH ___ [35]	FILTERS MINI STREAMER: LOW ___ HIGH ___ [36]	RECORD GAIN MODE: [37] ☐INIT ☐MAN ☐OPER ☐IFP	REPRODUCE MODE: [38] ☐FLOAT ☐DEFLOAT ☐AGC	AIRGUN ARRAY: ___ IN^3 [39]	AIRGUN PRESSURE: ___ PSI [40]		
SYSTEM DELAYS: AIRGUN DELAY ___ MS. FILTER DELAY ___ MS. DISPLAY DELAY ___ MS. [41]	POLARITY: PRESSURE INCREASE ON PHONE: ☐NEGATIVE ☐POSITIVE (NUMBERS ON TAPE) ☐DOWNBREAK ☐UPBREAK (ON DISPLAY)	ALIASING FILTER [42]	[43]				



INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

METERS

24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1
48	47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

POP PER SHOTPOINT [44]

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT [43]	RPT	REC # OR DUMMY (-1) [44]	REEL NUMBER [45]	XPORT	W. DEPTH (M) [46]	OFFSET (M) [47]	STREAMER DEPTH [48]						MINI STR [49]	MINI-STR OFFSET(M) [50]	POP SP [51]	TIME [52] LOCAL/GMT	F S [53] A Z [57]	L S [54] I N X [58]	F R [55] N [59]	L R [56] L I N E [60]	
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60				61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80
1	1958		-1																			NO RECORD
2	1959		952	7540378																		TAPE CH FSP 1959 FRN 952
3	2007		001																			COUNTER ADVANCE
4	2068		062	7540388	A																	TAPE CH FSP 2068 FRN 062
5	2079		-1																			NO RECORD BIP# 2079
6	2080		73	7540378	B																	TAPE CH FSP 2080 FRN 073
7	2083		76	~~7540400~~	~~A~~																	GOOD RECORD
8	2084		-1																			NO RECORD
9	2085		78	7540400	A																	TAPE CH FSP 2085 FRN 078
10	2194		187	7540411	B	67	327	34	30	29	34	29	30				1613					TB 178 HEADING 70°
11	2208		T																			PARITY
12	2303		296	7540412	A	69	353	30	25	30	34	32	30				1644					TB 180° HEADING 71°
13	2412		405	7540413	B	75	359	30	27	29	35	34	30				1714					TB 177 HEADING 72°
14	2419																					MISSED REC'T AFS, M4FN
15	2420																					MISSED REC'T AFS, M4FN
16	2421		412	7540444	A	74											1717					TPC HG DUE TO AFS, M4FN
17	2530		521	7540456	B	74	358	30	24	30	33	32	30				1748					TB 177 HEADING 74
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60				61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80

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MARINE SEISMIC OBSERVER'S LOG

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CLIENT: USGS [1]	PROSPECT: AOCS [2]	AREA: EAST COAST [3]	LINE NO.: 136B [4]				
VESSEL: M/V CARINO [5]	PARTY NO: 2912 [6]	INST. ENG. [7]	DATE: MO JUNE DAY 21 YR 78 [8]				

CAMERA DISPLAY: [9] ☑ 1 SYSTEM ☐ 2 SYSTEMS ☐ NEAR AND FARS ☐ ODD AND EVEN

TYPE: [10] ☐ DFS III ☑ DFS IV OTHER ____

☑ 9 TRACK ☐ 21 TRACK [11]

FORMAT: [12] SEG B "PE" ☒ GAPPED ☐ UNGAPPED

NO. BYTES IN HEADER: [13]	NO. BYTES IN RECORD ID: [14]	NO. OF BYTES IN SCAN: [15]	TIMING TRACE CHANNEL: [16]	RECORD NUMBERS: [17]	PACKING DENSITY: [18]
132	2	134		☑ DEC. ☐ OCT.	(LO) ☐ 356 ☐ 800 (HI) ☐ 712 ☒ 1600

SAMPLE RATE: [19]	RECORD LENGTH: [20]	DELAY START RECORD MODULE: [21]	GAIN CONSTANT: [22]
☐ 1 ☐ 2 ☒ 4 ☐ 8 OTHER ____	12 SEC.	(T_o) = 0 SEC	30

MAIN STREAMER RECORDING: [23]	WATER BREAK RECORDING: [24]	MINI STREAMER RECORDING: [25]	DIRECTION: [26]
NUMBER OF TRACES 48	LOCATION 1 2 3 4 5 6	NUMBER OF TRACES	N / W E / S — 070°
TRACE NUMBERS 1-48	CHANNEL (ON TAPE)	TRACE NUMBERS	
CHANNEL NOS. (ON MAG TAPE) 1-48	TRACE (ON DISPLAY)	CHANNEL NOS. (ON MAG TAPE)	

GROUP INTERVAL 50¢100 M STREAMER LENGTH 3600 M [27]	CABLE NOISE: [28]	GROUP INTERVAL ____ M STREAMER LENGTH ____ M [29]
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M	MAIN ____ μBARS MINI ____ μBARS	DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M

COVERAGE: [30]	SHOTPOINT INTERVAL: [31]	SHOTPOINT INCREMENT: [32]	GUN DEPTH: [33]	WATER VELOCITY: [34]
36 FOLD	50 M	+1	6 M	M/SEC

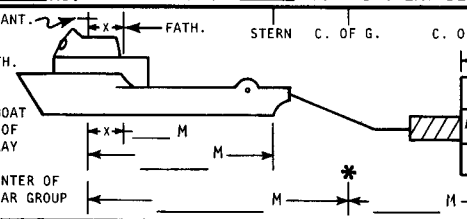
FILTERS MAIN STREAMER: [35]	FILTERS MINI STREAMER: [36]	RECORD GAIN MODE: [37]	REPRODUCE MODE: [38]	AIRGUN ARRAY: [39]	AIRGUN PRESSURE: [40]
LOW 8/18 HIGH 62	LOW ____ HIGH ____	☐ INIT ☐ MAN ☐ OPER ☑ IFP	☐ FLOAT ☐ DEFLOAT ☒ AGC	____ IN^3	____ PSI

SYSTEM DELAYS: [41] AIRGUN DELAY ____ MS. FILTER DELAY ____ MS. DISPLAY DELAY ____ MS.

POLARITY: PRESSURE INCREASE ON PHONE: ☑ NEGATIVE ☐ POSITIVE } NUMBERS ON TAPE ☑ DOWNBREAK ☐ UPBREAK } ON DISPLAY

ALIASING FILTER: [42] 62 [43]

POP PER SHOTPOINT [44] 1



X: DISTANCE FROM ANTENNA TO FATH.
ANT=ANTENNA
FATH=FATHOMETER
STERN=STERN OF BOAT
C. OF G.=CENTER OF GUN ARRAY
✱=GUN ARRAY
C. OF NR. GRP=CENTER OF NEAR GROUP

INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

3600 METERS

24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1
48	47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT [43]	RPT	REC # OR DUMMY (-1) [44]	REEL NUMBER [45]	XPORT	W. DEPTH (M) [46]	OFFSET (M) [47]	STREAMER DEPTH [48] 6	5	4	3	2	1	MINI STR [49]	MINI-STR OFFSET(M) [50]	POPSP [51]	TIME [52] ~~LOCAL~~/GMT	FS [53] AZ	LS [54] IN X	FR [55] N	LR [56] LINE 136B	
1	2623		-1																			HIGH PARITY
2	2639		639	7540546	A	70	356	31	30	29	34	33	29				1820					TB 178° HEADING 70°
3	2748		739	7540547	B	65	357	30	27	30	32	33	30				1853					TB 180 HEADING 70°
4	2763		-1														1857					PARITY
5	2766		-1														1859					PARITY
6	2775		-1														1902					PARITY
7	2845		-1					32	29	28	32	32	28				1923					PARITY
8	2857		848	7540548	A	62	3183	32	32	30	33	32	29				1926					TB 181° SB 068°
9	2870		859	7540449	B												1929					TB 181° SB 061°
10	2933		-1																			PARITY
11	2963		-1																			PARITY AND AUTOFIRE
12	2964		-1																			AF
13	2965		-1																			AF
14	2971		-1				~~325~~															PARITY
15	2978		967	7540950	A	61.6	~~64.6~~	33	32	30	34	29	26				2001					TB 185° HEADING 66°
16	3011		001																			COUNTER ADVANCE
17	3987		77	7540951	B	60	349	35	30	29	33	33	26				2032					TB 182 HEADING 66°

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MARINE SEISMIC OBSERVER'S LOG

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CLIENT: U.S.G.S. [1]	PROSPECT: AOCS [2]	AREA: EAST COAST [3]	LINE NO.: 136B [4]	
VESSEL: CARINO [5]	PARTY NO: 2912 [6]	INST. ENG. [7]	DATE: MO JUNE DAY 21 YR 78 [8]	

CAMERA DISPLAY: [9] ☐ 1 SYSTEM ☐ 2 SYSTEMS ☐ NEAR AND FARS ☐ ODD AND EVEN

TYPE: [10] ☐ DFS III ☐ DFS IV OTHER _____ ☐ 9 TRACK ☐ 21 TRACK

FORMAT: [11] [12] SEG _____ ☐ GAPPED ☐ UNGAPPED

NO. BYTES IN HEADER: [13] NO. BYTES IN RECORD ID: [14] NO. OF BYTES IN SCAN: [15] TIMING TRACE CHANNEL: [16] RECORD NUMBERS: [17] ☐ DEC. ☐ OCT. PACKING DENSITY: [18] (LO) ☐ 356 ☐ 800 (HI) ☐ 712 ☐ 1600

SAMPLE RATE: [19] ☐ 1 ☐ 2 ☐ 4 ☐ 8 OTHER _____ RECORD LENGTH: [20] _____ SEC. DELAY START RECORD MODULE: [21] (T_o) = _____ SEC GAIN CONSTANT: [22]

MAIN STREAMER RECORDING: [23]
NUMBER OF TRACES _____
TRACE NUMBERS _____
CHANNEL NOS. (ON MAG TAPE) _____
GROUP INTERVAL _____ M STREAMER LENGTH _____ M [27]
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: _____ M

WATER BREAK RECORDING: [24] 1 2 3 4 5 6
LOCATION
CHANNEL (ON TAPE)
TRACE (ON DISPLAY)

CABLE NOISE: [28] MAIN _____ μBARS | MINI _____ μBARS

MINI STREAMER RECORDING: [25]
NUMBER OF TRACES _____
TRACE NUMBERS _____
CHANNEL NOS. (ON MAG TAPE) _____
GROUP INTERVAL _____ M STREAMER LENGTH _____ M [29]
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: _____ M

DIRECTION: [26] N W E S

COVERAGE: [30] _____ FOLD SHOTPOINT INTERVAL: [31] _____ M SHOTPOINT INCREMENT: [32] GUN DEPTH: [33] _____ M WATER VELOCITY: [34] _____ M/SEC

FILTERS MAIN STREAMER: [35] LOW _____ HIGH _____ FILTERS MINI STREAMER: [36] LOW _____ HIGH _____

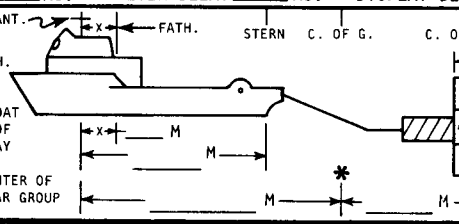
RECORD GAIN MODE: [37] ☐ INIT ☐ MAN ☐ OPER ☐ IFP REPRODUCE MODE: [38] ☐ FLOAT ☐ DEFLOAT ☐ AGC AIRGUN ARRAY: [39] _____ IN^3 AIRGUN PRESSURE: [40] _____ PSI

SYSTEM DELAYS: [41] AIRGUN DELAY ____ MS. FILTER DELAY ____ MS. DISPLAY DELAY ____ MS.

POLARITY: PRESSURE INCREASE ON PHONE: ☐ NEGATIVE ☐ POSITIVE } NUMBERS ON TAPE ☐ DOWNBREAK ☐ UPBREAK } ON DISPLAY [42]

ALIASING FILTER [43] _____

POP PER SHOTPOINT [44] _____



X: DISTANCE FROM ANTENNA TO FATH.
ANT=ANTENNA
FATH=FATHOMETER
STERN=STERN OF BOAT
C. OF G.=CENTER OF GUN ARRAY
*=GUN ARRAY
C. OF NR. GRP=CENTER OF NEAR GROUP

INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

METERS

24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1
48	47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT [43]	RPT	REC # OR DUMMY (-1) [44]	REEL NUMBER [45]	XPORT	W. DEPTH (M) [46]	OFFSET (M) [47]	STREAMER DEPTH [48] 6	5	4	3	2	1	MINI STR [49]	MINI-STR OFFSET(M) [50]	POP SP [51]	TIME ~~LOCAL~~ GMT [52]	F S [53]	L S [54]	F R [55]	L R [56]	A Z [57]	I N X [58]	N [59]	L I N E - [60]	
1	30941																								MISSED REC - DFS MLFN [61]
2	30955		84	754052	A	60											20346								TAPE CHG DUE TO DFS MLFN
3	32051		193	754053	B	61	349	33	29	29	32	30	25				21107								TB 183 HEADING 59
4	33133		301	754054	A	61	348	32	29	29	32	32	25				21338								TB 179 HEADING 59.7
5	33381		369														21517								BEGIN DOGLEG 136C
6	34122		410	754055	B	62		30	26	29	31	30	27												
7				754056	A																				
8	34490																								MISSED REC
9	34492																								MISSED REC
10	35410			~~754057~~				34	30	29	32	30	27				22442								~~FB~~ NO DATA
11	35411																								MISSED REC
12	35412																								MISSED REC
13	35433		527	754057	A	60	348	34	30	29	32	30	27				22443								TB 181° HEADING 58°
14	36523			~~754058~~	B	60		32	30	28	31	31	26				23112								~~FB~~ ~~HEADING~~ MISED
15	36544																2								MISSED REC DFS MLFN
16	36559																								MISSED REC DFS MLFN
17	36556		638	754058	A	60	348	32	30	28	31	31	26				23114								TB 180 HEADING 59

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MARINE SEISMIC OBSERVER'S LOG

CLIENT: U.S.G.S.	PROSPECT: AOCS	AREA: EAST COAST	LINE NO.: 136B				
VESSEL: CARINO	PARTY NO: 2912	INST. ENG.	DATE: MO JUNE DAY 21 YR 78				

CAMERA DISPLAY: ☒ 1 SYSTEM ☐ 2 SYSTEMS ☐ NEAR AND FARS ☐ ODD AND EVEN

TYPE: ☐ DFS III ☐ DFS IV OTHER ____ ☐ 9 TRACK ☐ 21 TRACK

FORMAT: SEG ____ ☐ GAPPED ☐ UNGAPPED

NO. BYTES IN HEADER: | NO. BYTES IN RECORD ID: | NO. OF BYTES IN SCAN: | TIMING TRACE CHANNEL: | RECORD NUMBERS: ☐ DEC. ☐ OCT. | PACKING DENSITY: (LO) ☐ 356 ☐ 800 (HI) ☐ 712 ☐ 1600

SAMPLE RATE: ☐ 1 ☐ 2 ☐ 4 ☐ 8 OTHER ____ | RECORD LENGTH: ____ SEC. | DELAY START RECORD MODULE: (T_o) = ____ SEC | GAIN CONSTANT:

MAIN STREAMER RECORDING: NUMBER OF TRACES ____ TRACE NUMBERS ____ CHANNEL NOS. (ON MAG TAPE) ____

WATER BREAK RECORDING: LOCATION 1 2 3 4 5 6 CHANNEL (ON TAPE) TRACE (ON DISPLAY)

MINI STREAMER RECORDING: NUMBER OF TRACES ____ TRACE NUMBERS ____ CHANNEL NOS. (ON MAG TAPE) ____

DIRECTION: N W E S

GROUP INTERVAL ____ M STREAMER LENGTH ____ M | DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M

CABLE NOISE: MAIN ____ μBARS | MINI ____ μBARS

GROUP INTERVAL ____ M STREAMER LENGTH ____ M | DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M

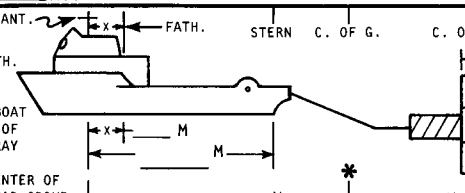
COVERAGE: ____ FOLD | SHOTPOINT INTERVAL: ____ M | SHOTPOINT INCREMENT: | GUN DEPTH: ____ M | WATER VELOCITY: ____ M/SEC

FILTERS MAIN STREAMER: LOW ____ HIGH ____ | FILTERS MINI STREAMER: LOW ____ HIGH ____

RECORD GAIN MODE: ☐ INIT ☐ MAN ☐ OPER ☐ IFP | REPRODUCE MODE: ☐ FLOAT ☐ DEFLOAT ☐ AGC | AIRGUN ARRAY: ____ IN^3 | AIRGUN PRESSURE: ____ PSI

SYSTEM DELAYS: AIRGUN DELAY ____ MS. FILTER DELAY ____ MS. DISPLAY DELAY ____ MS. | POLARITY: PRESSURE INCREASE ON PHONE: ☐ NEGATIVE ☐ POSITIVE (NUMBERS ON TAPE) ☐ DOWNBREAK ☐ UPBREAK (ON DISPLAY) | ALIASING FILTER

POP PER SHOTPOINT



INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

METERS

24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1
48	47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT	RPT	REC # OR DUMMY (-1)	REEL NUMBER	XPORT	W. DEPTH (M)	OFFSET (M)	STREAMER DEPTH	MINI STR	MINI-STR OFFSET(M)	POP SP	TIME LOCAL/ GMT	FS AZ	LS IN	FR N	LR LINE	
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29 30 31 32 33 34 35 36 37 38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60				61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80
1	3665																MISSED REC DFS M&FN
2	3766					60		30 25 28 32 30 28				2343					MISSED REC
3	3767		247	7540598		60	3146	30 25 28 32 30 28				2344					TB 180 HEADING 83°
4	3773		-1														HIGH PARITY
5	3778																MISSED REC - DFS M&FN
6	3779		758	7540604	A												TRGHG DUE TO DFS M&FN
7	3794		-1														HIGH PARITY
8	3803																MISSED REC
9	3824		802									2400					MIDNIGHT SHOTPOINT
10	3849		-1														PARITY
11	3889			~~7540618~~	B			34 30 30 33 30 26				0916					~~EG~~ MISSED REC - D.M.
12	3890																MISSED REC - DFS
13	3891																MISSED REC - DFS
14	3892		868	7540611	A	60	3371	34 30 30 33 30 26				0918					TB 181° HEADING 80°
15	3944																MISSED REC
16	3970																MISSED REC - SMS 100m
17	3999		-1														HIGH PARITY
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29 30 31 32 33 34 35 36 37 38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60				61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80

MARINE SEISMIC OBSERVER'S LOG

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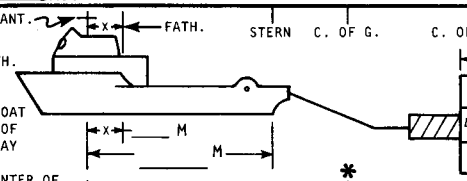
CLIENT: USGS [1]	PROSPECT: AOCS [2]	AREA: EAST COAST [3]	LINE NO.: 136 B [4]				
VESSEL: CARINO [5]	PARTY NO: 2912 [6]	INST. ENG. [7]	DATE: MO JUNE DAY 22 YR 78 [8]				
CAMERA DISPLAY: ☐1 SYSTEM ☐2 SYSTEMS ☐NEAR AND FARS ☐ODD AND EVEN [9]	TYPE: ☐DFS III ☐DFS IV OTHER [10]	☐9 TRACK ☐21 TRACK [11]	FORMAT: ☐GAPPED ☐UNGAPPED SEG [12]				
NO. BYTES IN HEADER: [13]	NO. BYTES IN RECORD ID: [14]	NO. OF BYTES IN SCAN: [15]	TIMING TRACE CHANNEL: [16]	RECORD NUMBERS: ☐DEC. ☐OCT. [17]	PACKING DENSITY: (LO) ☐356 ☐800 (HI) ☐712 ☐1600 [18]		
SAMPLE RATE: ☐1 ☐2 ☐4 ☐8 OTHER [19]	RECORD LENGTH: SEC. [20]	DELAY START RECORD MODULE: (T_o)= SEC [21]	GAIN CONSTANT: [22]				
MAIN STREAMER RECORDING: NUMBER OF TRACES / TRACE NUMBERS / CHANNEL NOS. (ON MAG TAPE) [23]	WATER BREAK RECORDING: LOCATION / CHANNEL (ON TAPE) / TRACE (ON DISPLAY) [24]	MINI STREAMER RECORDING: NUMBER OF TRACES / TRACE NUMBERS / CHANNEL NOS. (ON MAG TAPE) [25]	DIRECTION: N W E S [26]				
GROUP INTERVAL M STREAMER LENGTH M [27] DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: M	CABLE NOISE: MAIN μBARS MINI μBARS [28]	GROUP INTERVAL M STREAMER LENGTH M [29] DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: M					
COVERAGE: FOLD [30]	SHOTPOINT INTERVAL: M [31]	SHOTPOINT INCREMENT: [32]	GUN DEPTH: M [33]	WATER VELOCITY: M/SEC [34]			
FILTERS MAIN STREAMER: LOW HIGH [35]	FILTERS MINI STREAMER: LOW HIGH [36]	RECORD GAIN MODE: ☐INIT ☐MAN ☐OPER ☐IFP [37]	REPRODUCE MODE: ☐FLOAT ☐DEFLOAT ☐AGC [38]	AIRGUN ARRAY: IN^3 [39]	AIRGUN PRESSURE: PSI [40]		
SYSTEM DELAYS: AIRGUN DELAY MS. FILTER DELAY MS. DISPLAY DELAY MS. [41]	POLARITY: PRESSURE INCREASE ON PHONE: ☐NEGATIVE ☐POSITIVE NUMBERS ON TAPE ☐DOWNBREAK ☐UPBREAK ON DISPLAY [42]	ALIASING FILTER [43]					



X:DISTANCE FROM ANTENNA TO FATH.
ANT=ANTENNA
FATH=FATHOMETER
STERN=STERN OF BOAT
C. OF G.=CENTER OF GUN ARRAY
*=GUN ARRAY
C. OF NR. GRP=CENTER OF NEAR GROUP

INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

METERS

24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1
48	47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

POP PER SHOTPOINT [44]

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT [43]	RPT	REC # OR DUMMY (-1) [44]	REEL NUMBER [45]	XPORT	W. DEPTH (M) [46]	OFFSET (M) [47]	STREAMER DEPTH [48] 6 5 4 3 2 1	MINI STR [49]	MINI-STR OFFSET(M) [50]	POP SP [51]	TIME LOCAL/GMT [52]	F S [53] L S [54] F R [55] L R [56] / A Z [57] L I N X [58] N [59] L I N E [60]	[61]
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29 30 31 32 33 34 35 36 37 38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60	61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80
1	4003											0047		MISSED REC - DFS MLFN
2	4004													" " " "
3	4005													" " " "
4	4006		978	754062A		62	349	30 25 28 33 23 026				0048		TB 182 HEADING 60
5	4028		091											COUNTER ADVANCE
6	4071													MISSED REC
7	4072													MISSED REC
8	4116					60		38 30 29 33 32 28				0120		MISSED REC - DFS MLFN
9	4117													MISSED REC DFS MLFN
10	4118		88	754063A		60	346	38 30 29 33 32 28				0121		TB 181 HEADING 80
11	4227							37 32 30 34 33 26				0153		MISSED REC - DFS MLFN
12	4228													
13	4229													
14	4230													MISSED REC - DFS MLFN
15	4231		197	754064A		56	342	37 32 30 34 33 26				0155		TB 181° HEADING 76°
16	4340											0226		~~MISSED REC~~ BAD REC
17	4341													MISSED REC DFS MLFN
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29 30 31 32 33 34 35 36 37 38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60	61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80

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MARINE SEISMIC OBSERVER'S LOG

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CLIENT: U.S.G.S. [1]	PROSPECT: AOCS [2]	AREA: EAST COAST U.S. [3]	LINE NO.: 136B [4]	
VESSEL: CARINO [5]	PARTY NO: 2912 [6]	INST. ENG. [7]	DATE: MO JUNE DAY 22 YR 78 [8]	

CAMERA DISPLAY: [9] ☐1 SYSTEM ☐2 SYSTEMS ☐NEAR AND FARS ☐ODD AND EVEN

TYPE: [10] ☐DFS III ☐DFS IV OTHER ____ ☐9 TRACK ☐21 TRACK [11]

FORMAT: [12] ☐GAPPED ☐UNGAPPED SEG ____

NO. BYTES IN HEADER: [13] NO. BYTES IN RECORD ID: [14] NO. OF BYTES IN SCAN: [15] TIMING TRACE CHANNEL: [16]

RECORD NUMBERS: [17] ☐DEC. ☐OCT.

PACKING DENSITY: [18] (LO) ☐356 ☐800 (HI) ☐712 ☐1600

SAMPLE RATE: [19] ☐1 ☐2 ☐4 ☐8 OTHER ____

RECORD LENGTH: [20] ____ SEC.

DELAY START RECORD MODULE: [21] (T_o) = ____ SEC

GAIN CONSTANT: [22]

MAIN STREAMER RECORDING: [23]
NUMBER OF TRACES ____
TRACE NUMBERS ____
CHANNEL NOS. (ON MAG TAPE) ____

WATER BREAK RECORDING: [24]
LOCATION 1 2 3 4 5 6
CHANNEL (ON TAPE) ____
TRACE (ON DISPLAY) ____

MINI STREAMER RECORDING: [25]
NUMBER OF TRACES ____
TRACE NUMBERS ____
CHANNEL NOS. (ON MAG TAPE) ____

DIRECTION: [26] N W E S

GROUP INTERVAL ____ M STREAMER LENGTH ____ M [27]
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M

CABLE NOISE: [28]
MAIN ____ μBARS | MINI ____ μBARS

GROUP INTERVAL ____ M STREAMER LENGTH ____ M [29]
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M

COVERAGE: [30] ____ FOLD

SHOTPOINT INTERVAL: [31] ____ M

SHOTPOINT INCREMENT: [32]

GUN DEPTH: [33] ____ M

WATER VELOCITY: [34] ____ M/SEC

FILTERS MAIN STREAMER: [35] LOW ____ HIGH ____

FILTERS MINI STREAMER: [36] LOW ____ HIGH ____

RECORD GAIN MODE: [37] ☐INIT ☐MAN ☐OPER ☐IFP

REPRODUCE MODE: [38] ☐FLOAT ☐DEFLOAT ☐AGC

AIRGUN ARRAY: [39] ____ IN^3

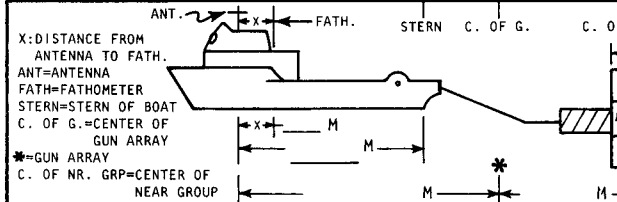
AIRGUN PRESSURE: [40] ____ PSI

SYSTEM DELAYS: [41]
AIRGUN DELAY ____ MS. FILTER DELAY ____ MS. DISPLAY DELAY ____ MS.

POLARITY: [42]
PRESSURE INCREASE ON PHONE: ☐NEGATIVE ☐POSITIVE } NUMBERS ON TAPE ☐DOWNBREAK ☐UPBREAK } ON DISPLAY

ALIASING FILTER [43] ____

POP PER SHOTPOINT [44] ____



INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

METERS

24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1
48	47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT [43]	RPT	REC # OR DUMMY (-1) [44]	REEL NUMBER [45]	XPORT	W. DEPTH (M) [46]	OFFSET (M) [47]	STREAMER DEPTH [48] 6	5	4	3	2	1	MINI STR [49]	MINI-STR OFFSET(M) [50]	POP SP [51]	TIME LOCAL/GMT [52]	F S [53] L S [54] F R [55] L R [56] AZ [57] I N X [58] N [59] L I N E [60]	
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60	61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80
1	4342																		MISSED REC - DFS MALFN [61]
2	4343		307	7540651	A	58	3234	40	30	28	31	34	28				0227		TB 179 HEADING 82
3	4369		-1														0227		AF
4	4370		-1																AF
5	4371		-1																AF
6	4374		-1																AF
7	4435		-1																PARITY
8	4452		416			56		37	33	31	30	30	25				0259		BAD RECORD
9	4453																		
10	4454		417	7540661	A	55	3442	37	33	31	30	30	25				0300		TB 178° HEADING 84°
11	4563																0329		MISSED REC
12	4564																		MISSED REC
13	4565		526	7540671	A	52	3391	40	32	31	32	33	25				0330		TB 180° HEADING 81°
14	4673		634																GOOD RECORD
15	4674		~~1625~~	~~7540681~~	~~A~~														~~TAPE~~ NO REC ORD
16	4675		-1																NO RECORD
17	4676		-1																NO RECORD
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60	61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80

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LINE 36C - LABEL 36C

OBSERVER'S LOG	NAVIGATION	OBSERVER'S LOG	NAVIGATION	OBSERVER'S LOG	NAVIGATION
SHOT POINT	SHOT POINT	SHOT POINT	SHOT POINT	SHOT POINT	SHOT POINT

NO NAVIGATION CHANGES

MARINE SEISMIC OBSERVER'S LOG

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CLIENT: USGS [1]	PROSPECT: AOCS [2]	AREA: EAST COAST [3]	LINE NO.: 136 C [4]				
VESSEL: M/V CARINO [5]	PARTY NO: 2912 [6]	INST. ENG. [7]	DATE: MO JUNE DAY 22 YR 78 [8]				

CAMERA DISPLAY: [9] ☐1 SYSTEM ☐2 SYSTEMS ☐NEAR AND FARS ☐ODD AND EVEN

TYPE: [10] ☐DFS III ☐DFS IV OTHER ____ ☐9 TRACK ☐21 TRACK [11]

FORMAT: [12] ☐GAPPED ☐UNGAPPED SEG ____

NO. BYTES IN HEADER: [13] | NO. BYTES IN RECORD ID: [14] | NO. OF BYTES IN SCAN: [15] | TIMING TRACE CHANNEL: [16] | RECORD NUMBERS: [17] ☐DEC. ☐OCT. | PACKING DENSITY: [18] (LO) ☐356 ☐800 (HI) ☐712 ☐1600

SAMPLE RATE: [19] ☐1 ☐2 ☐4 ☐8 OTHER ____ | RECORD LENGTH: [20] ____ SEC. | DELAY START RECORD MODULE: (T_o)= ____ SEC [21] | GAIN CONSTANT: [22]

MAIN STREAMER RECORDING: [23]
NUMBER OF TRACES ____
TRACE NUMBERS ____
CHANNEL NOS. (ON MAG TAPE) ____

WATER BREAK RECORDING: [24]
LOCATION 1 2 3 4 5 6
CHANNEL (ON TAPE)
TRACE (ON DISPLAY)

MINI STREAMER RECORDING: [25]
NUMBER OF TRACES ____
TRACE NUMBERS ____
CHANNEL NOS. (ON MAG TAPE) ____

DIRECTION: [26] N W E S

GROUP INTERVAL ____ M STREAMER LENGTH ____ M [27]
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M

CABLE NOISE: [28]
MAIN ____ μBARS | MINI ____ μBARS

GROUP INTERVAL ____ M STREAMER LENGTH ____ M [29]
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M

COVERAGE: [30] ____ FOLD | SHOTPOINT INTERVAL: [31] ____ M | SHOTPOINT INCREMENT: [32] | GUN DEPTH: [33] ____ M | WATER VELOCITY: [34] ____ M/SEC

FILTERS MAIN STREAMER: [35] LOW ____ HIGH ____ | FILTERS MINI STREAMER: [36] LOW ____ HIGH ____

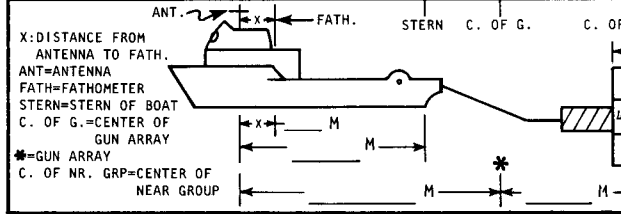
RECORD GAIN MODE: [37] ☐INIT ☐MAN ☐OPER ☐IFP | REPRODUCE MODE: [38] ☐FLOAT ☐DEFLOAT ☐AGC | AIRGUN ARRAY: [39] ____ IN^3 | AIRGUN PRESSURE: [40] ____ PSI

SYSTEM DELAYS: [41] AIRGUN DELAY ____ MS. FILTER DELAY ____ MS. DISPLAY DELAY ____ MS.

POLARITY: [42] PRESSURE INCREASE ON PHONE: ☐NEGATIVE ☐POSITIVE } NUMBERS ON TAPE ☐DOWNBREAK ☐UPBREAK } ON DISPLAY

ALIASING FILTER [43] ____

POP PER SHOTPOINT [44] ____



INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

METERS

24 23 22 21 20 19 18 17 16 15 14 13 12 11 10 9 8 7 6 5 4 3 2 1

48 47 46 45 44 43 42 41 40 39 38 37 36 35 34 33 32 31 30 29 28 27 26 25 24 23 22 21 20 19 18 17 16 15 14 13 12 11 10 9 8 7 6 5 4 3 2 1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT [43]	RPT	REC # OR DUMMY (-1) [44]	REEL NUMBER [45]	XPORT	W. DEPTH (M) [46]	OFFSET (M) [47]	STREAMER DEPTH [48]						MINI STR [49]	MINI-STR OFFSET(M) [50]	POP SP [51]	TIME LOCAL/ GMT [52]	F I S A Z [53] [57]	L S I N X [54] [58]	F I R N [55] [59]	L I R E - [56] [60]	
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60				61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80
1	4677		635	754,068	A																	TAPE RN FSP 4677 FRN 635
2	4759		707			45	324	30	30	30	35	35	25				0424					SHIPSHDTS TAIL BUOY 1.84
3	4773		0731																			HI PARITY
4	4786		744																			GOOD RECORD
5	4787		-1																			NO RECORD
6	4788		-1																			NO RECORD
7	4789		745	754,069	A																	TAPE CH FSP 4789 FRN 745
8	4897		857																			GOOD RECORD
9	4898		-1																			NO RECORD
10	4899		-1																			NO RECORD
11	4900		-1																			NO RECORD
12	4901		854	754,070	A		37	35	30	30	36	35	25				1510					TAPE CH FSP 4901 FRN 854
13	4908		861																			GOOD RECORD
14	4909		-1																			NO RECORD
15	4910		-1																			NO RECORD
16	4911		-1																			NO RECORD
17	4912		-1																			NO RECORD

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MARINE SEISMIC OBSERVER'S LOG

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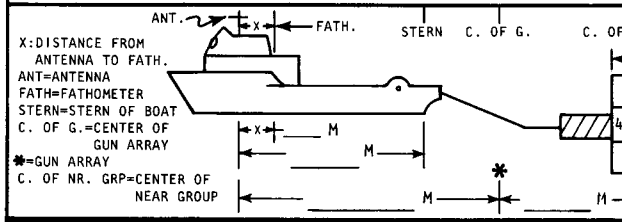
CLIENT: USGS [1]	PROSPECT: AOCS [2]	AREA: EAST COAST [3]	LINE NO.: 136C [4]				
VESSEL: MV CARINO [5]	PARTY NO: 2912 [6]	INST. ENG. [7]	DATE: MO JUNE DAY 22 YR 78 [8]				
CAMERA DISPLAY: ☐1 SYSTEM ☐2 SYSTEMS ☐NEAR AND FARS ☐ODD AND EVEN [9]	TYPE: ☐DFS III ☐DFS IV OTHER ____ [10]	☐9 TRACK ☐21 TRACK [11]	FORMAT: SEG ____ ☐GAPPED ☐UNGAPPED [12]				
NO. BYTES IN HEADER: [13]	NO. BYTES IN RECORD ID: [14]	NO. OF BYTES IN SCAN: [15]	TIMING TRACE CHANNEL: [16]	RECORD NUMBERS: ☐DEC. ☐OCT. [17]	PACKING DENSITY: (LO) ☐356 ☐800 (HI) ☐712 ☐1600 [18]		
SAMPLE RATE: ☐1 ☐2 ☐4 ☐8 OTHER ____ [19]	RECORD LENGTH: ____ SEC. [20]	DELAY START RECORD MODULE: (T_o)= ____ SEC [21]	GAIN CONSTANT: [22]				
MAIN STREAMER RECORDING: NUMBER OF TRACES ____ TRACE NUMBERS ____ CHANNEL NOS. (ON MAG TAPE) ____ [23]	WATER BREAK RECORDING: LOCATION 1 2 3 4 5 6 CHANNEL (ON TAPE) TRACE (ON DISPLAY) [24]	MINI STREAMER RECORDING: NUMBER OF TRACES ____ TRACE NUMBERS ____ CHANNEL NOS. (ON MAG TAPE) ____ [25]	DIRECTION: N W E S [26]				
GROUP INTERVAL ____ M STREAMER LENGTH ____ M DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M [27]	CABLE NOISE: MAIN ____ μBARS | MINI ____ μBARS [28]	GROUP INTERVAL ____ M STREAMER LENGTH ____ M DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: ____ M [29]					
COVERAGE: ____ FOLD [30]	SHOTPOINT INTERVAL: ____ M [31]	SHOTPOINT INCREMENT: [32]	GUN DEPTH: ____ M [33]	WATER VELOCITY: ____ M/SEC [34]			
FILTERS MAIN STREAMER: LOW ____ HIGH ____ [35]	FILTERS MINI STREAMER: LOW ____ HIGH ____ [36]	RECORD GAIN MODE: ☐INIT ☐MAN ☐OPER ☐IFP [37]	REPRODUCE MODE: ☐FLOAT ☐DEFLOAT ☐AGC [38]	AIRGUN ARRAY: ____ IN^3 [39]	AIRGUN PRESSURE: ____ PSI [40]		
SYSTEM DELAYS: AIRGUN DELAY ____ MS. FILTER DELAY ____ MS. DISPLAY DELAY ____ MS. [41]	POLARITY: PRESSURE INCREASE ON PHONE: ☐NEGATIVE ☐POSITIVE } NUMBERS ON TAPE ☐DOWNBREAK ☐UPBREAK } ON DISPLAY [42]	ALIASING FILTER [43]					



INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

METERS

24 23 22 21 20 19 18 17 16 15 14 13 12 11 10 9 8 7 6 5 4 3 2 1

48 47 46 45 44 43 42 41 40 39 38 37 36 35 34 33 32 31 30 29 28 27 26 25 24 23 22 21 20 19 18 17 16 15 14 13 12 11 10 9 8 7 6 5 4 3 2 1

POP PER SHOTPOINT [44]

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT [43]	RPT	REC # OR DUMMY (-1) [44]	REEL NUMBER [45]	XPORT	W. DEPTH (M) [46]	OFFSET (M) [47]	STREAMER DEPTH [48]	MINI STR [49]	MINI-STR OFFSET(M) [50]	POP SP [51]	TIME LOCAL/ GMT [52]	FIS [53] / AIZ [57]	LIS [54] / INX [58]	FIR [55] / N [59]	LIR [56] / LINE [60]
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29 30 31 32 33 34 35 36 37 38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60			61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80
1	4913		862	7540713	A											TAPE CH FSP 4913 FRN 862 [61]
2	4920		-1 869													HI PARITY
3	4928		-1 878													HI PARITY
4	4939		-1 909													HI PARITY
5	4697		-1 911													HI PARITY
6	4966		-1 915													HI PARITY
7	4969		-1 918													HI PARITY
8	4977		-1 924													HI PARITY
9	4978		-1 927													NO RECORD
10	4992		-1 931													HI PARITY
11	4997		-1 941													HI PARITY
12	5007		966									0540				SHIP IS HEADING TO A BUOY 187
13	5021		970													GOOD RECORD
14	5024		-1													NO RECORD
15	5023		-1													NO RECORD
16	5024		971	7540724	A											TAPE CH FSP 5024 FRN 971
17	5053		001													COUNTER MONKEY
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29 30 31 32 33 34 35 36 37 38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60			61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80

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MARINE SEISMIC OBSERVER'S LOG

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CLIENT: USGS [1]	PROSPECT: ABCS [2]	AREA: EAST COAST [3]	LINE NO.: 136 C [4]				
VESSEL: CARINO [5]	PARTY NO: 2912 [6]	INST. ENG. CLOW [7]	DATE: MO 6 DAY 22 YR 78 [8]				

CAMERA DISPLAY: [9] ☐ 1 SYSTEM ☐ 2 SYSTEMS ☐ NEAR AND FARS ☐ ODD AND EVEN

TYPE: [10] ☐ DFS III ☐ DFS IV OTHER _____

☐ 9 TRACK ☐ 21 TRACK [11]

FORMAT: [12] ☐ GAPPED ☐ UNGAPPED SEG _____

NO. BYTES IN HEADER: [13]

NO. BYTES IN RECORD ID: [14]

NO. OF BYTES IN SCAN: [15]

TIMING TRACE CHANNEL: [16]

RECORD NUMBERS: [17] ☐ DEC. ☐ OCT.

PACKING DENSITY: [18] (LO) ☐ 356 ☐ 800 (HI) ☐ 712 ☐ 1600

SAMPLE RATE: [19] ☐ 1 ☐ 2 ☐ 4 ☐ 8 OTHER _____

RECORD LENGTH: [20] _____ SEC.

DELAY START RECORD MODULE: [21] (T_o) = _____ SEC

GAIN CONSTANT: [22]

MAIN STREAMER RECORDING: [23]
NUMBER OF TRACES _____
TRACE NUMBERS _____
CHANNEL NOS. (ON MAG TAPE) _____

WATER BREAK RECORDING: [24]
LOCATION ☐ 1 ☐ 2 ☐ 3 ☐ 4 ☐ 5 ☐ 6
CHANNEL (ON TAPE) _____
TRACE (ON DISPLAY) _____

MINI STREAMER RECORDING: [25]
NUMBER OF TRACES _____
TRACE NUMBERS _____
CHANNEL NOS. (ON MAG TAPE) _____

DIRECTION: [26] N / W E / S

GROUP INTERVAL _____ M STREAMER LENGTH _____ M [27]
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: _____ M

CABLE NOISE: [28]
MAIN _____ μBARS | MINI _____ μBARS

GROUP INTERVAL _____ M STREAMER LENGTH _____ M [29]
DISTANCE FROM CENTER GUN TO CENTER NEAR GRP: _____ M

COVERAGE: [30] _____ FOLD

SHOTPOINT INTERVAL: [31] _____ M

SHOTPOINT INCREMENT: [32]

GUN DEPTH: [33] _____ M

WATER VELOCITY: [34] _____ M/SEC

FILTERS MAIN STREAMER: [35]
LOW _____ HIGH _____

FILTERS MINI STREAMER: [36]
LOW _____ HIGH _____

RECORD GAIN MODE: [37] ☐ INIT ☐ MAN ☐ OPER ☐ IFP

REPRODUCE MODE: [38] ☐ FLOAT ☐ DEFLOAT ☐ AGC

AIRGUN ARRAY: [39] _____ IN^3

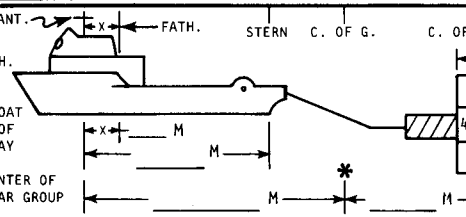
AIRGUN PRESSURE: [40] _____ PSI

SYSTEM DELAYS: [41]
AIRGUN DELAY _____ MS. FILTER DELAY _____ MS. DISPLAY DELAY _____ MS.

POLARITY: [42]
PRESSURE INCREASE ON PHONE: ☐ NEGATIVE ☐ POSITIVE } NUMBERS ON TAPE
☐ DOWNBREAK ☐ UPBREAK } ON DISPLAY

ALIASING FILTER [43] _____

POP PER SHOTPOINT [44] _____



X:DISTANCE FROM ANTENNA TO FATH.
ANT=ANTENNA
FATH=FATHOMETER
STERN=STERN OF BOAT
C. OF G.=CENTER OF GUN ARRAY
*=GUN ARRAY
C. OF NR. GRP=CENTER OF NEAR GROUP

INDICATE ALL DISTANCES (WITH UNITS OF MEASUREMENT-FEET OR METERS)

METERS

24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1
48	47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	9	8	7	6	5	4	3	2	1

NOTE: INDICATE STREAMER DIAGRAM IF DIFFERENT THAN THE ABOVE GROUPS HERE

INDICATE LOCATIONS ON THE STREAMER FOR THE FOLLOWING:
STREAMER DEPTH SENSORS=△; WATER BREAK SENSORS=X; STREAMER POS. SENSORS=Ⓧ; CON DEP FINS (BIRDS)=↑

	SHOTPOINT [43]	RPT	REC # OR DUMMY (-1) [44]	REEL NUMBER [45]	XPORT	W. DEPTH (M) [46]	OFFSET (M) [47]	STREAMER DEPTH [48]						MINI STR [49]	MINI-STR OFFSET(M) [50]	POP SP [51]	TIME [52] LOCAL/GMT	F/S AZ [53]	L/S INX [54]	F/R N [55]	L/R LINE [56]
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60			61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80
1	5061		-1																		NOT COMPLETELY RECORDED [61]
2	5062		010																		
3	5084		035			28	324	30	32	30	30	27	20				0606				SH 76° TB 177°
4	5092		(2) 041																		PARITY
5	5132		080																		GOOD RECORD
6	5133		-1																		NO RECORD
7	5134		-1																		NO RECORD
8	5135		081	7549073A				30	30	31	30	32	29								TAPE CH. FSP5135 FRN081
9	5174		(1) 120																		HI PARITY
10	5175		121			28	324	27	29	30	30	28	20				0637				END OF LINE
11																					
12																					
13																					
14																					
15																					
16																					
17																					
	1 2 3 4 5	6	7 8 9 10 11	12 13 14 15 16 17	18	19 20 21 22 23	24 25 26 27	28 29	30 31	32 33	34 35	36 37	38 39	40 41	42 43 44 45	46	47 48 49 50	51 52 53 54 55 56 57 58 59 60			61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80

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