104936

R/V BELLOWS

B-95-01 BLWS 95004

Geophysics Log

2 May - 8 May, 1995

7530002866952

7530 - 00 - 286 - 6952
FEDERAL SUPPLY SERVICE
50% RECYCLED PAPER

2 May, 1995 0800 Local - Leave USF

JD 122 16:40Z 3.5 & Sidescan in water - starting at WP 32 ⇒ WP31 for first test line to tune gear.

183737 change course moving onto line 1 : start of NON TEST
191327 change of file line 1 file 2

1932 Boat wake Port Side

193840 E.O. File 2
~~194120~~ → Trouble with file on drive
194120 switch to YL 16.dat → seems to be working fine

Note: on Test line - (WP 32→31) 1m was added to the depth on the fathometer display to account for theducer being down ~1m - Nav computer is receiving depth without the 1m addition. (ie. 4m depth on fathometer = 3m on nav computer).

2057 EOL #1 - followed the 12 ft contour
all sed samples on line 1 = fine sand - low backscatter only offshore
2100 SOL #2 WP 1-2

2209 Snagged Crab buoy on 3.5 ~ Slow to remove

2214 Stop Again to remove buoy
~~2214 EOL 2~~
2232 Side scan stopped pinging/recording
- EOL #2 ~~SOL #3~~

"J" DRIVE ACTING UP AGAIN - WATCHING

2234 — SOL 3s SOF Y:L3F3.DAT

2240 — OFFTRACK TO AVOID REEF

2257 — ~~[illegible]~~ Adjust fish - attach Safty LINE

2310 - Sed sample #7 taken

2312 - 3.5 KhZ off line to change paper

2320 S Roll 2 3.5 khz

2328 sed sample #8 taken

2338 TURN to avoid trap

2342 ~ Artificial Reef ?

2350 sed sample #9 taken

0010 EOL 3 SOL 4

2057 PAPER DRIVE ON 3.5 IS ERRATIC ... TRYING DIFFERENT WAYS TO FIX. MAY HAVE TO DO MAJOR SURGERY

0106 Drop ~~[illegible]~~ 3.5 ~ small adj.

0142 EOL #4 SOL #5

0146.4 3.5 off LINE

0150 3.5 on Line

0212 3.5 off LINE

0218 3.5 on Line

0233 - ~~0238~~ 0239 stop for crab pot

3 May, 1995 JD 123

0319-0324 stop for crab pots

0329 - EOL 5 SOL 6
- switch data tapes on side scan
- 3.5 off line for paper fixing

0331 - 3.5 back on line & recording

0357 - change 3.5 to 1/4 sec firing rate from 1/8

040653 - veering off track DOFF = 31.1
040851 - back on track
045105 - slowed boat to pass traps - pulled up SSS & approaching turn onto Line 7
045348 - changing DISKS (Navigation): also turning,
045609 - Getting back onto line 7
050800 - CHANGE PAPER ON SIDE SCAN PRINTER - TURN PRINTER OFF
050910 - TURN PRINTER BACK ON WITH NEW ROLL OF PAPER
053397 - off track line 7 DOFF = 122.3
053447 - ~~track line~~ ship mark jumped D = -22.5
0616 - Grab sample #17 - shell hash
062718 - START of track line 8

0653 - High & low backscatter patches coincide with where the seafloor is hammocky: Troughs are high backscatter & highs are low backscatter (I think), but subbottom reflections under whole area so troughs not carbonate antirap - Samples suggest high backscatter is shell hash.
070045 - Sample #18 associated w/ INTERMEDIATE backscatter.
0702 - STOP - CRAB POD STUCK ON SIDE MOUNT
0706 - START MOVING AGAIN.

0712 - Caught crab trap on sidescan.
0755 EOL 8
0757 SOL 9
0854 lower fish ~ 3m to get it below thermocline
0924 RUN INTO CRAB POD - STOP BOAT TO REMOVE IT
0927 START BOAT AGAIN.

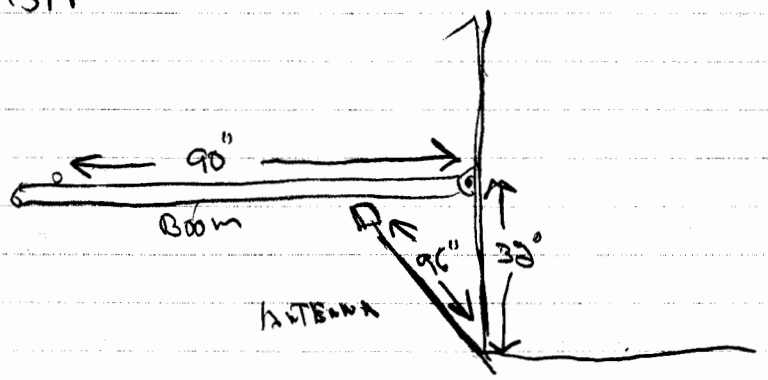
3 May, 1995 JD 123

093435 changing onto Line 10

1103 EOL 10 SOL 11

1209 LOWER FISH

OFFSETS



ANTENNA TO WATERLINE = 222"

1236 EOL 11 SOL 12

1409 RAISING FISH

1413 EOL 12 SOL 13

1444 Side Scan caught crab pot
1446 underway
1500-1501 side scan caught crab pot

1551 EOL 13 SOL 14
123:173002 EOF for Navigation Disk
123:173026 SOF for Navigation Disk
123:173128 Turning onto Line 15
123:173148 Start of Line 15

QMIPS says date is 2 May, 95 when it is 3 May, but ~~spa~~ Data files on DEC station seem to have the correct Julian day - confused.

123 173949 Noise on SSS display: checking....
123 174055 Noise on SSS gone

MAY 3, 1995 JD 123

123 191800 SOL 16 (turning)
191928 coming onto track
Some boulders at N end of line 16

2020 End Roll #2 on 3.5

2023 Start Roll #3 on 3.5 & H2

2055 EOL 16

2056 Change Nav disc - lost nav to disc from ~1700-1730Z

2058 SOL 17

2109 Lower fish ~2m to get to ½ way down.

2229 Sean jammed Side scan
Switched files

2248 EOL 17 SOL 18

2306 START NAV DISK 6
CONTINUED WITH NAVDISC 4 & 5

MAY 4, 1995 JD 124

0241 EOL 19 SOL 20

124: [redacted]

0414 23 Released crabpot from SSS

0420 ~60 ft wire out on sidescan

0432 EOL 20

0434 SOL 21

050448 Blue box above SSS box was beeping & not reading depth

050643 Restarted button & fiddled w/front wire: it corrected itself

124:051429 STARTED TO CREATE SSS MOSAIC ON PAPER
124:062718 Turning onto line 22 → pulled fish up
124:062904 Getting onto track line

0817 EOL 22 SOL 23 - WP 43-44 for line 23

0842 - Haul fish (sidescan) in because looks like it is hung up, but is OK.

0911 fish in to remove crab pot

0917 stop to get pot off 3.5

124:093920 Changing SSS paper to Roll # 4
124:093943 Paper on SSS changed : back to printing.
124:10:00 55 Trailing crab pot off of seismic. stopped seismic to remove : pulled up SSS to prevent [illegible] bottom.
124:10:02:59 Up to speed
124 10:03:15 Restarted Seismic
10:14 SOL 23
10:16 SOL 24
12:12 SOL 24 / SOL 25
1402 EOL 25
1404 SOL 26
1411 Stopped for crab pot

1610 Change Now disc - End disc 6 - Start 7

1748 EOL 27

1750 SOL 28
184024 Just released trap off of SSS line
185007 Caught something ON SSS line

1853 Pulled sidescan to clean line off
1942 turning
194305 Switch file : coming onto LINE 29

1944 SOL 29

4 May, 1995 JD 124

2127 EOF L29F4 + Begin L29F5 QMIPS lost time from nav.

2131 EOL 29

2135 SOL 30

2148 Break line 30 + go back to beginning QMIPS flaking out so rebooting - Time was not updating + going backwards.

SYSTEM AND 2 PROBLEMS:

1: "ENTER" KEY ON KEYBOARD IS N.G. IT STICKS. O.K.

2. MODGRAPH TIME NOT SYNCED WITH SAT TIME. OK.

5 MAY, 1995

0029 EOL 30

0031 SOL 31

0322 changing paper on 3.5 ending roll 3 starting roll 4

041546 Pulling on SSS cable ~~possible crab pot~~ oops No pot .... just turning

0417 SOL 33

0602 EOL 33

0605 Noise on sidescan just at turn at N End

0606 SOL 34

0758 EOL 34

0800 SOL 35

0943 EOL 35

5 May, 1995 JD 125

0945 SOL 36

1017 START WAV DISC 8

1147 EOL 36 SOL 37

1336 EOL 37 SOL 38

1500 " TDV Rdd #6 ON

1725 EOL 39

1728 SOL 40

1920 EOL 40 - SOL 41 - transit inshore to fill in gap near Big Sarasota Pass -

1940 36 Pulling fish up ... as we approach shore line to do line 42

1945 EOL 41 - SOL 42 - run around front of Big Sarasota Pass

2023 SOL 43 - filling in nearshore gap

203308 ~~SOL~~ Turning onto line 44 (close to shore)

203609 SOL 44

2044 EOL 44 - SOL 45

2135 EOL 45 - SOL 46 - back offshore running NW - SE lines

2214 Experiment with 3.5 KHz SYS

221510 Got a pot

2216 pot on fish

0140 changing nav disk, start disk 9

0144-0146 Kit bottom somehow ... stopping slipped

Quips lost sync - [illegible]

0212 putting in nav disk 10, refer to 0140

6 May, 1995 JD 126

0223 - caught pot on fish

0833 - PROBLEM WITH NAV DISK 9. FILLED ON
BOF AGAIN ... DISK 10 SEEMS OK BUT
SHOULD BE WATCHED. ALSO WAITE
~~[illegible]~~ "NOISE" LINES APPEARING
ON SS. OK NOW BUT COULD
BE A PROBLEM LATER

0319 start sidescan tape #9

0507 EOL 49
060120 Grab pot on sub bottom
060629 Released & back underway - caught on bathyping

0705 EOL 50

0706 SOL 51

0746 Sediment sample from bedform field was a very fine sand - sample #107

0803 Start Nav Disc 11 - paper jammed + locked up nav system - lost ~3 min

0850 EOL 51

1044 EOL 52 SOL 53
1234 start side scan tape #10
1324-1328 stoped for pot on 3.5
1332 changing 3.5 paper starting roll 5
1411 L54 F4 might be a problem with file

1441 EOL 54 SOL 55

1624 EOL 55

1626 SOL 56

csin

6 May, 1995 JD 126

1817 EOL 56

1819 SOL 57 running SE

1836 10kt breeze from NW (11 to shore) ~1 ft chop
doesn't look like it shows up on sidescan, but there are
bedforms (?) with crests running N/S to NE/SW (may be seasufo

2000 EOL 57

2003 SOL 58 - headed NW

2024 Sample 120 taken in bedform (?) field
medium sand w some sand dollars - lots of seagrass on the
sampler.
start QMIPS tape #11 line 59

2214 EOL 58 SOL 59

7 MAY, 1995

0015 CRAB POT
0133 pot on fish
0207 put in new nav disk # ~~11~~ 12

0410 EOL 61

0413 SOL 62

0604 EOL 62

0608 SOL 63

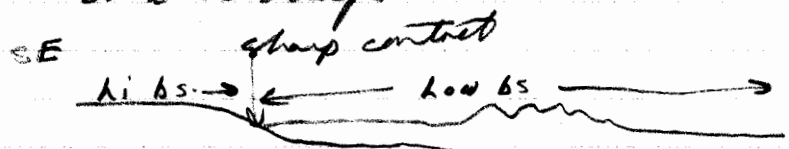
0616 - may have lost nav for a while

0742 - Sample 132 - 1st try in hi bs was a wiens +
2nd try near low bs + was med sand.

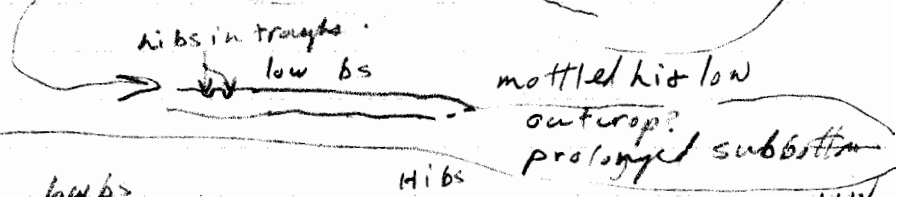
0802 - EOL 63

7 May, 1995 JD 127

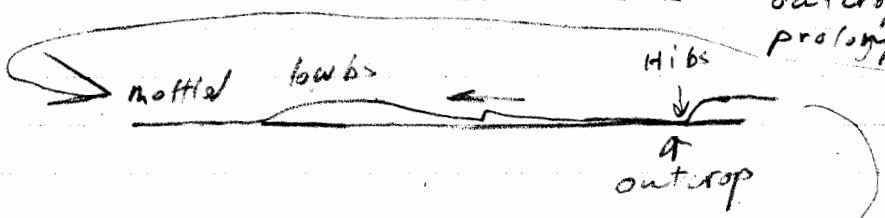
0804 SOL 64 - slight high at col 630 sof 64 that had high backscatter return while trough N of it was filled with low bs - some of it shaped into a ridge

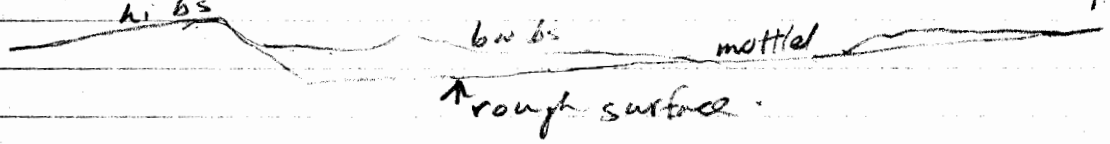


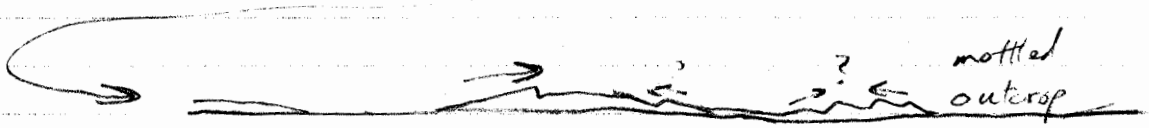
0822



0831







ridges on 3.5 & sidescan - ~1m high - low bs with high bs troughs - crests ~NE-SW - 15 bedforms.

0944 - change paper on sidescan TDU

0949 EOL 64

10:54 pot on 3.5 qmips locked up

11:14 qmips system reset disk drive A failed

start qmips tape # 13

11:25 SOF2L65+2.dat

7 May, 1995 JD127

n29 – STOPPED TO REMOVE POT FROM SIDEMOUNT, DECIDED TO REPLACE FRAYED LINE. DURING REPAIR, QMIPS LOCKED UP ON A ~~FI~~ FILE CHANGE FROM Y:L65F1.DAT TO Y:L65F2.DAT. REBOOTED SYSTEM WHICH REGISTERED A "DRIVE A FAILURE" DURING STARTUP. DID NOT INITIALIZE "OTHER" DRIVE ON PROMT. QMIPS TAPE #13 STARTS WITH FILE Z:L65.DAT WHICH IS A TEST FILE. DATA AND LINE 65 RESTART BEGINS WITH FILE Z:L65F2.DAT

12:20 stop at end of line 65 for adjustments RERIGGED SIDEMOUNT

12:30 start line 66

1419 SOL 67

~~1537 JD 120~~

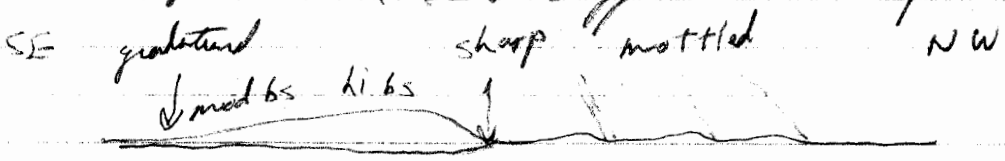
1540 START NAV DISK 13

1620 EOL 67

1622 SOL 68

1634 Transition from low backscatter with sand waves to moderate backscatter → dark backstatter with sharp contact with low bs at 1636 – Low bs is in a trough with discontinuous hi bs.

16 Does sharp N contact of hi bs high + gradational southern side suggest N transport?



Took sediment sample from HI BS area + was med – coarse sand with a lot of shells – whole shells

Usually transp layer in 3.5 is low backscatter, but not always

7 May, 1995 JD 127

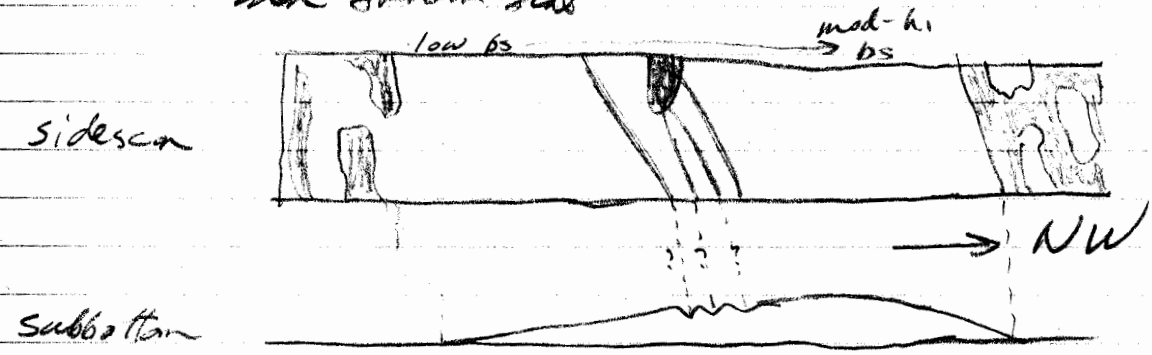
1659 - Often N side of high backscatter strips is sharper than southern edge.

1710 Took sample (#137) in high backscatter area & it had some well rounded limestone pebbles in it.

1712 New nav disc - No EOF on disc # 12
Now have started #14

1717 Coming up on bathy high & go from mottled to low backscatter & trough layer on 3.5

1719 Rugged on crest of ridge & hi bs troughs
North side of high backscatter troughs may be sharper than south side



gets higher backscatter to NW

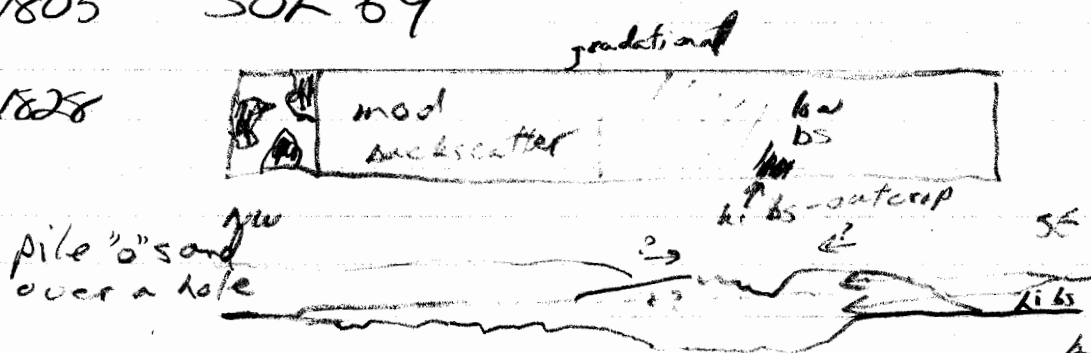
1730 Regional low that shows in bathy is high backscatter

One sample in low backscatter = fine sand (138) & another in moderate backscatter = med-coarse sand (139)

1803 EOL 68

1805 SOL 69

1828



Two units above basement: coarse sand below & fine sand on top

7 May, 95 JD 127

1904-1906 - hard bottom? "granular" on sidescan & prolonged outcrop on 3.5 & captain says that is what it is.

1922Z Bathymetric high at 27°16'N on line 69 seems to be a "bed rock" high - 3.5 shows rough surface & sidescan is mottled.

1924 Hi ks strips separated by low backscatter patches [illegible] edge on [illegible] side & more gradational edges on South side.

2005 EOL 69

2007 SOL 70

2017 Sample 140 - in acoustically transp area & mottled area in otherwise low backscatter - fine sand with shell fragments.

2149 Sample 144 was in high backscatter & had chunks of hard ground in it.

2155 EOL 70

2248 SOL 71

0026-0028 changing TDU paper start roll #10
0035-0038 changing 3.5 paper start roll #6
040748 VEEANN'S having coffee!!! Holy Cow! Stephan had his first Almond Joy

8 May, 1995 JD 128

0336 Start line 74

0437 Sample 148 - med/fine sand in a low backscatter area with some high backscatter stripes

0525 Passed over fish reef + sunken barge.

0533 EOL 74

0536 SOL 75

0714 Large bedforms with smaller ones on their backs. Asymmetrical with steep side facing N (subtle changes) + on sidescan N side of high backscatter is sharper

0731 EOL 75

0733 SOL 76

0800 - Seas picked up during evening watch so a fair amount of sea surface noise in sidescan. 15-20 kt breeze from S.

0916 - EOL 76

0919 SOL 77

10:03 Pulling up seismic & fish going to change fish or whatever the Hell we're doing

1205 New disc out - other Klein fish in for a test

1009 SOP ~~[illegible]~~ y: 677.0N

1036 Finish test - secure QUIPS + bring sidescan aboard.