Station 001 was a bucket sample

downcast winch-broke

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	FD	001	002

Auxiliary Sensors ✓ **CDOM** (WET-Star) ✓ **DO** (SBE43) ✓ **Altimeter** (Benthos) ____ **Other**

	Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
START	08	03	0014	28 42.1	88 20.2	1485
MAX	08	03	0039	28 41.9	88 20.1	1482
END						

Start Nav: [X] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	Nutrients
1						
2						
3						
4						
5						
6						
7						
8						
9						
10						
11						
12						

Station Comments:

64 m - Go-FLO down cast

winch died on down cast

NO T-C duct

water sample upcast

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	TD	002	002

Auxiliary Sensors ✓ CDOM (WET-Star) ✓ DO (SBE43) ✓ Altimeter (Benthos) ✓ Other

	Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
START	08	03	0109	2641.7	8820.1	1490
~~MAX~~						
END						

Start Nav: [X] **End Nav:** [X]

Bottle #	Depth Closed		Salt Case/#	DO #	VOA ~~Chloro #~~	Nutrients
1	849				x2	
2 750	751			x		
* 3 750	751	bad - no samples				
4 650	652				x2	
5 550	550				x2	
6 450	450				x2	
* 7 350	350	bad		no samples		
* 8 350	350	bad				
9 250	250				x2	
* 10 150	150	bad -		no samples		
11 64	64			x		
12 64	64				x 2	

Station Comments:

- continuation of first cast: this is upcast only

* = fired, but didn't shut

No T-Cduct

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	TD	003	003

Auxiliary Sensors	CDOM (WET-Star)	DO (SBE43)	Altimeter (Benthos)	Other
	✓	✓	✓	

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	03	0347	2843.4	8819.4	1463
	MAX						1510 1500
	END	08	03	0606	2843.6	8819.3	1471

Start Nav: [X] End Nav: [ ] VOA/THC ~~THC~~

Bottle #	Depth Closed		Salt Case/#	DO #	~~Chloro #~~	~~Nutrients~~
1	1402			2x	2x	
2	1297				2x	
3	1203				2x	
4	1121				2x	
5	1088				2x	
6	1062				2x	
7	799			X	2x	
8	600				2x	
9	399	jammed		— NO	samples	
10	199				2x	
11	99			X	2x	
12	53				2x	

Station Comments:

55 m. GO-FLO - did not close or trip
by CTD

Winch overheated at 949 M (before 0415)

No T-C duct

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	TD	004	004

Auxiliary Sensors ✓ CDOM (WET-Star) ✓ DO (SBE43) ✓ Altimeter (Benthos) ____ Other

CTD	Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
START	08	04	0103	2841.8	8813.5	1798
MAX	08	04	0202	2841.8	8813.5	1798
END						

Start Nav: [X] **End Nav:** [ ]

Bottle #	Depth Closed		~~Salt Case/#~~	~~DO #~~	~~Chloro #~~ VOA/THC	~~Nutrients~~
1 1700	1676				x2	
* 2 1500	1501	not closed -		no samples		
* 3 1300	1300	Not closed -		No samples		
4 1200	1200				x2	
5 1100	1100			DO 5	x2	
* 6 900	900	not closed -		no samples		
7 700	700				x2	
8 500	500			x2 DO 8		
9 500	500				x2	
10 300	301				x2	
11 100	100			DO 11	x2	
* 12 surf.	2	not closed		no samples		

Station Comments:

0125: winch stop for cool down @ 904m
0136: resume descent
0144: winch stop for cool down @ 1273m
0152: resume descent
0231 – start of up cast

7.9nm from well-head

No T-C out

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	EAB	005	005

Auxiliary Sensors ✓ CDOM (WET-Star) ✓ DO (SBE43) ✓ Altimeter (Benthos) _____ Other

	Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
START	08	04	0517	2843.2	8817.1	1495
MAX	08	04	0526	2843.2	8817.1	1495
END	08	04	0533	2843.2	8817.2	1496

Start Nav: [ ] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	Nutrients
1						
2						
3						
4						
5						
6						
7						
8						
9						
10						
11						
12						

Station Comments:

0523, 238m winch stopped, start 0524
0526, 312m winch stopped, start 0529 coming back up NO SAMPLES
0531, 284m winch stopped

winch leaking hydrolic fluid, cast terminated

CTD on deck 0620

NO T-C duct

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	TD	006	006

Auxiliary Sensors	CDOM (WET-Star	DO (SBE43)	Altimeter (Benthos)	Other
	✓	✓	✓	____

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	05	0035	2849.1	8818.0	1287
	MAX	08	05	0163	2849.1	8817.9	1288
	END	08	08	0204	2849.1	8817.9	1287

Start Nav: [X] End Nav: [X]

Bottle #	Depth Closed		Salt Case/#	DO #	~~Chloro #~~ VOA/THC	Nutrients
1 1000	1010			X		
2 1000	1010				X2	
* 3 800	801	jammed -		No sample		
4 800	801				X2	
5 600	601			X	X2	
* 6 600	601	jammed		No sample		
7 400	400			X		
8 400	400				X2	
* 9 200	201	jammed		No sample		
10 200	201				X2	
11 31	31			X		
12 31	31				X2	

Station Comments:

drop messenger @ 33.4m to trip GO-FLO

USED FORWARD WINCH

No T-C duct

Call Kenny @ 1000

Page____ of_____

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	TH	007	007

Auxiliary Sensors	CDOM (WET-Star)	DO (SBE43)	Altimeter (Benthos)	Other
	✓	✓	✓	

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m) (Echo Bottom)
	START	08	05	0401			1249
	MAX	08	05	0430	2851.0	8815.9	1250
	END	08	05	0500	2851.0	8815.9	461

forget

Start Nav: [ ] End Nav: [ ] NO .NAV files

Bottle #	Depth Closed		Salt Case/#	DO #	VOA Chloro #	Nutrients
1 1000	1003	jammed - no sample				
2 1000	1003	jammed - No sample				
3 800	801			X		
4 800	801				X2	
5 600	601			X		
6 600	601				X2	
7 400						
8 400						
9 200						
10 200						
11 28						
12 28						

Station Comments:

Go-flo @ 31 m [pressure sensor @ 31m = Go-flo @ 27 m]
RS232 com timed out, 0500, CTD held at 461 m
possible termination issues, CTD brought to surface
- bad fuse

USED FORWARD WINCH

No T-C duct

T-C Duct Added before Cast

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	TD	008	008

Auxiliary Sensors	CDOM (WET-Star	DO (SBE43)	Altimeter (Benthos)	Other
	✓	✓	✓	

EK60-18kz

	Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
START	08	05	2356	2850.9	8814.4	1242
~~MAX~~						
END						

Start Nav: [X] End Nav: [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	Nutrients
1						
2						
3						
4						
5						
6						
7						
8						
9						
10						
11						
12						

Station Comments:

Go-Flo @ 31m, Lost signal

NO NISKINS FIRED = NO .BL, .ROS, or BTL files

FORWARD WINCH

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	TD	009	009

Auxiliary Sensors ✓ CDOM (WET-Star) ✓ DO (SBE43) ✓ Altimeter (Benthos) ____ Other

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)	
	START	08	06	2353	2843.4	8819.4	~~1510~~	1460
	MAX	08	07	0022	2843.4	8819.4	~~1507~~	1460
	END	08	07	0123	2843.4	8819.4		

Start Nav: [✓] **End Nav:** [ ]

60m

Bottle #	Depth Closed		Salt Case/#	DO #	~~Chloro #~~ VOA/THC	Nutrients
1 1460	1460	hit		bottom!		
2	1460				x2	
3	1136			x		
4	1135				x2	
5 900	900			x		
6 900	900				x2	
7 500	500			x		
8 500	500				x2	
9 200	200			x		
10 200	200				x2	
11 29	29			x		
12 29	29				x2	

Station Comments: This cast using Aft winch, repaired earlier today
Go-Flo @ 31m
Hit bottom - EK-60 set wrong, CDOM Mismatch on up cast - other sensors OK, - ~~CDOM matched @~~

2.448 nm from Wellhead

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	TD	010	010

Auxiliary Sensors ✓ CDOM (WET-Star) ✓ DO (SBE43) ✓ Altimeter (Benthos) ____ Other

	Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
START	08	07	0314	2842.5	8820.2	1472
MAX	08	07	0346	2842.5	8820.2	1475
END	08	07	0452	2842.6	8820.2	1474

Start Nav: [ ] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	~~Chloro #~~ VOA/THC	Nutrients
1 1390	1398				x2	
2 1300	1300			x2		
3 1200	1200				x2	
4 1150	1150				x2	
5 1150	1150			x		
6 1100	1100				x2	
7 1000	1000				x2	
8 800	800				x2	
9 600	600				x2	
10 400	400				x2	
11 200	200			x		
12 25	28				x2	

Station Comments: stop at 400m on down for sound velocity check
GO-FLO @ 30m (CTD depth)
Oxygen dip @ 1150m

2.4 nm from Wellhead.

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	EAB	011	011

Auxiliary Sensors ___x___ **CDOM** (WET-Star) ___x___ **DO** (SBE43) ___x___ **Altimeter** (Benthos) _____ **Other**

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	07	0602	2842.3	8823.7	1590
	MAX	08	07	0638	2842.3	8823.7	1569
	END	08	07	0742	2842.4	8823.6	1571

Start Nav: [ ] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	~~Chloro~~ VOA/THC #	Nutrients
1	1424			X		
1300 2	1299				X2	
1200 3	1200				X2	
1150 4	1148				X2	
1150 5	1148			X2		
1100 6	1100				X2	
1000 7	1001				X2	
800 8	800			X		
600 9	600				X2	
400 10	400				X2	
200 11	200				X2	
12	30				X2	

Station Comments:

2% Go-Flo @ 33 CTD depth

archiving started @ 33m Go flo stop

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	EA BROUGHTON	012	012

Auxiliary Sensors ✓ **CDOM** (WET-Star) ✓ **DO** (SBE43) ✓ **Altimeter** (Benthos) ____ **Other**

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	07	1234	2846.3	8820.5	1470
	MAX	08	07	1303	2846.2	8820.4	1474
	END	08	07	1347	2846.0	8820.3	1481

Start Nav: [ ] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	Nutrients
1						
2						
3						
4						
5						
6						
7						
8						
9						
10						
11						
12						

Station Comments:

NO BOTTLES

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	Betsy/H-D	013	013

Auxiliary Sensors	✓ CDOM (WET-Star	✓ DO (SBE43)	✓ Altimeter (Benthos)	____ Other

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	07	1534	2846.8	8822.2	1385
	MAX	08	07	1602	2846.8	8822.3	1384
	END	08	07				1383

Start Nav: [ ] End Nav: [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	Nutrients
1						
2						
3						
4						
5						
6						
7						
8						
9						
10						
11						
12						

Station Comments:

NO BOTTLES

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	FD	14	014

Auxiliary Sensors ✓ CDOM (WET-Star) ✓ DO (SBE43) ✓ Altimeter (Benthos) ____ Other

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	07	1719	2845.9	8823.9	1140B
	MAX	08	07	1749	2845.8	8823.8	1411
	END						

Start Nav: [X] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	Nutrients
Btm 1	1354					
2 1200	1199					
3 1000	997					
4 900	900					
5 800	801					
6 600	600					
7 500	499					
8 400	400					
9 200	200					
10 100	101					
11 30	28					
near sfc 12 10	3.5					

Station Comments:
Go-FLO closed @ 30m (CTD sensor depth).

2.13nm from wellhead

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	TD	015	015

Auxiliary Sensors	CDOM (WET-Star)	DO (SBE43)	Altimeter (Benthos)	Other
	X	X	X	

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
[redacted]	START	08	07	2106	2844.2	8824.7	1518
	MAX	08	07	2139	2844.1	8824.8	1520
	END	08	07	2245	2844.1	8824.9	

Start Nav: [X] End Nav: [X]

Bottle #	Depth Closed		Salt Case/#	DO #	~~Chloro #~~ JOA/THC	Nutrients
1450 1	1468				X2	
1230 2	1240				X2	
1220 3 Ox Dup	1199			X	X2	
1200 4 ~~1140~~	1186				X2	
5 900	899				X2	
6 700	701				X2	
7 500	500				X2	
8 300	300					
9 180	179				X2	
10 100	100			X		
11 29	29				X2	
~~SF~~ 12 27	3			X2		

Station Comments:

Go-Flo @ 31m

boat transfer interrupted DO samples

2.4 nm. from wellhead

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	HD	016	016

Auxiliary Sensors	CDOM (WET-Star	DO (SBE43)	Altimeter (Benthos)	Other
	✓	✓	✓	

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	07	2341	2842.2	8823.7	1592
	MAX	08	08	0016	2842.2	8823.7	
	END	08	08	0124	2842.2	8823.7	1593

Start Nav: [✓] End Nav: [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	~~Chloro~~ VOC THC #	GC ~~Nutrients~~
1 ✓	1539				x2	X 2
2 1300	1299				x2	
3 1180	1168				x2	
4 1150	1144			Oxygen X Dip	x2	X 2
5 1130	1124				x2	
6 900	899				x2	X 2
7 700	699			Dup X2	x2	
8 500	500				x2	
180 9	170				x2	X 2
150 10	146				x2	X 2
30 11	28				x2	
12	4			oxygen X dip	x2	X 2

Station Comments:

Go-Flo tripped @ 30.5

2.54 nm from wellhead

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	TD	017	017

Auxiliary Sensors ✓ **CDOM** (WET-Star) ✓ **DO** (SBE43) ✓ **Altimeter** (Benthos) ____ **Other**

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	08	0211	2841.8	8821.4	1628
	MAX	08	08	0243	2841.8	8821.4	1628
	END	08	08	0352	2841.8	8821.4	1628

Start Nav: [✓] **End Nav:** [✓]

Bottle #	Depth Closed		Salt Case/#	DO #	~~Chloro #~~ VOA/THC	~~Nutrients~~ GC
1 1560	1568			x 2	x 2	
2 1410	1384				x 2	
3 1200	1202				x 2	x 2
4 1000	1174			Oxygen Dup	x 2	x 2
5 800	1168				x 2	x 2
6 900	899				x 2	
7 600	599				x 2	
8 250	255				x 2	x 2
9 180	167				x 2	x 2
10 100	57				x 2	x 2
11 30	29			x	x 2	
12 sfc					x 2	

1620

1560

Station Comments:

GO-FLO @ 30 m (CTD depth)

2.6 nm from Well head

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	EAB	018	018

Auxiliary Sensors ___x___ **CDOM** (WET-Star) ___x___ **DO** (SBE43) ___x___ **Altimeter** (Benthos) _____ **Other**

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	08	0442	2844.2	8815.9	1373
	MAX	08	08	0526	2844.2	8815.9	1372
	END	08	08	06	2844.3	8815.9	1369

Start Nav: [ ] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	VOA ~~Chloro #~~	GC ~~Nutrients~~
1270 1	1274				x2	x2
1100 2	1100				x2	
1000 3	1000				x2	
800 4	798				x2	
600 5	599				x2	
500 6	500				x2	x2
400 7	400				x2	x2
300 8	309				x2	x2
200 9	200				x2	x2
100 10	100				x2	
50 11	49				x2	
sfc 12	3				x2	x2

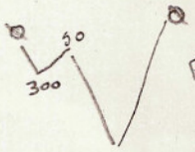
Station Comments:

Go flo @ 52 CTD Depth

didn't mark Nav start

No O_2 dip

cast



Forgot to trip Go-flo

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	EAB	019	019

Auxiliary Sensors X **CDOM** (WET-Star) X **DO** (SBE43) X **Altimeter** (Benthos) ____ **Other**

	Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
START	08	08	0721	2840.4	8817.7	1513
MAX	08	08	0751	2840.5	8817.6	1516
END	08	08	08			

Start Nav: [ ] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	Nutrients
1415 1	1421 3					
1200 2	1198 2					
1000 3	1000 4					
800 4						
600 5						
400 6						
300 7						
200 8						
150 9						
100 10						
33 11						
12						

NO SAMPLES TAKEN

NO O_2 spike

Station Comments:

GO - Ho @ 35m CTD depth

CTD data looks fine

0755 one line of bad data - says it is "short"

bottle one - GUI fire doesn't increment, fired with green button on box, + GUI increments same bottle #2

bottle #3 GUI doesn't increment w/ mouse or button - NO MORE BOTTLES fired

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	EAB/TD	20	20

Auxiliary Sensors ✓ **CDOM** (WET-Star) ✓ **DO** (SBE43) ✓ **Altimeter** (Benthos) ____ **Other**

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	08	1607	2846.7	8821.9	1418
	MAX	08	08	1637	2846.5	8821.8	1442
	END	08	08				

Start Nav: [ ] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	GC Nutrients
1	1343					X
2 1200	1202			✓		
3 1100	1098					X
4 1000	995					
✓ 5 900	899					
✓ 6 700	699			✓		X
? 7 500	~~502~~	didn't fire!				
8 400	~~403~~					
9 300						
10 200						
11 33						Go-Flo X
12 sfc						

Station Comments:

Go flo fired @ 35 CTD depth

NO Tape

Changed Carousel Cable.

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	TD	021	021

Auxiliary Sensors: ✓ CDOM (WET-Star) ✓ DO (SBE43) ✓ Altimeter (Benthos) ____ Other

	Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
START	08	08	1837	2845.5	8819.8	1477
MAX	08	08	1905	2845.4	8819.7	1465
END	08	08	2011	2844.9	8819.2	1517

Start Nav: [ ] End Nav: [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	GC Nutrients
1420 1	1400 on					
1300 2	1297					X
1200 3	1197					
1100 4	1098					X
1000 5	1001					
800 6	801					
600 7	599					
400 8	400					X
9	149					
100 10	89					X
30 11	27					
5 12	3.5					X

Station Comments: Go-Flo @ 30m

Still having error msgs-

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	TD	022	022

Auxiliary Sensors	CDOM (WET-Star)	DO (SBE43)	Altimeter (Benthos)	Other
	✓	✓	✓	

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	08	2121	2842.1	8821.5	1622
	MAX	08	08	2152	2841.9	8821.6	1626
	END	08	08	2254	2841.8	8821.6	

Start Nav: [✓] End Nav: [✓]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	GC ~~Nutrients~~
1560 1	-1566					X
1400 2	1399					X
1200 3	1165					X
1100 4	1100					X
1000 5	1001	No fire				
800 6	800 fired 5	next to fire = 7		?		
600 7						
400 8						
200 9				FIRED		
50 10				@		
30 11				5fc.		
5&e 12						

Station Comments:

Changed scale factor on Altimeter 1 ⇒ 15.

2.5 nm from wellhead

SWITCHED TO FORWARD WINCH

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	HD	023	023

Auxiliary Sensors ✓ **CDOM** (WET-Star) ✓ **DO** (SBE43) ✓ **Altimeter** (Benthos) ____ **Other**

	Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
START	08	08	2339	2842.2	8823.6	1594
MAX						
END	08	09	01	2842.3	8823.8	1591

Start Nav: [ ] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	Nutrients
1	1003					X
900 2	900					
800 3	800					
70 4	685					
6 5	600					X
5 6	498					
4 7	400					
3 8	300					
2 9	200					X
1 10	98					
30 11	29					
5 12	3					X

Station Comments:

Go. Flo @ 30m

Still getting error messages

2.5 nm from wellhead

Changed [911 - Sea Cable] Cable, soaked latch assbly.
SWITCHED TO AFT WINCH

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	JD	024	24

Auxiliary Sensors: ✓ CDOM (WET-Star) ✓ DO (SBE43) ✓ Altimeter (Benthos) ____ Other

	Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
START	08	09	0225	2844.7	8827.9	1445
MAX	08	09	0254	2844.9	8827.9	1440
END						

Start Nav: [X] End Nav: [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	Nutrients
1380 1	1387					
2 1200	1167					
3 1000	999					
4 900	897					
5 700	699					
6 5	499					
7 4	399	* before 399m				
8 300	tried 4					
9 200						
10 100						
11 30						
12 38	3.5					

Fired in at test cast.

Station Comments:
Go-Flo @ 32
still getting error messages
*Beeping/Light on/lots of errors -

5 nm from wellhead

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	EAB	25	25

Auxiliary Sensors ___x___ **CDOM** (WET-Star) ___x___ **DO** (SBE43) ___✓___ **Altimeter** (Benthos) _____ **Other**

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	09	0505	2840.6	8826.3	1363
	MAX	08	09	0533	2840.6	8826.3	1363
	END	08	09	0638	2840.7	8826.2	1365

Start Nav: [ ] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	~~Chloro~~ VOA/TTC #	~~Nutrients~~
1260 1	1263				x2	x
1200 2	1195				x2	
1150 3	1160				x2	x
1100 4	1100				x2	
900 5	900				x2	
700 6	700				x2	
500 7	497				x2	
300 8	300				x2	x
200 9	200				x2	x
100 10	100				x2	x
34 11	34				x2	
sfc 12	3				x2	x

Optics

Station Comments: ~~Spread out bottles - try to throughout water column.~~

Go-flo @ 36 CTD depth

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare		26	26

Auxiliary Sensors ___x___ **CDOM** (WET-Star) ___x___ **DO** (SBE43) ___x___ **Altimeter** (Benthos) _____ **Other**

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	09	0748	2839.0	8822.3	1669
	MAX	08	09	0820	2839.0	8822.0	1679
	END	08	09	0934	2839.3	8820.6	1727

Start Nav: [ ] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	~~Chloro #~~ JOA/THC	GC ~~Nutrients~~
1570 1	1587				2x	X
1300 2	1300				2x	
1100 3	1100				2x	X
900 4	850				2x	
700 5	700				2x	X
500 6	501				2x	
400 7	400				2x	
300 8	302				2x	X
200 9	201				2x	
100 10	101				2x	X
33 11	33				2x	
sfc 12	2				2x	X

Station Comments:

Go flo @ 35 CTD depth

No O^2 spike

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	EAB	027	027

Auxiliary Sensors X **CDOM** (WET-Star) X **DO** (SBE43) X **Altimeter** (Benthos) ____ **Other**

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	09	1041	2840.2	8817.6	1519
	MAX	08	09	1112	2840.2	8817.5	1526
	END	08	09	1219	2840.3	8817.7	1515

Start Nav: [ ] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	GC Nutrients
1425 1	1435					
1250 2	1250					
1200 3	1201					X
1150 4	1150					X
1000 5	1000					
800 6	800					
600 7	595					X
400 8	403					X
200 9	199					
100 10	97					X
33 11	34					X
sfc 12	3					

very small O_2 spike

Station Comments:

Go-Flo @ 35 CTD depth

didn't hit nav file @ start

3 28a, 28b, 28c

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	EAB	028/29	028

Auxiliary Sensors	CDOM (WET-Star)	DO (SBE43)	Altimeter (Benthos)	Other
	x	x	x	30

	Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
START	09	08	1348	2844.2	8816.1	1379
MAX	09	08	1420	2843.9	8815.8	1407
END	09	08	1520	2843.8	8815.8	1424

Start Nav: [ ] End Nav: [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	Nutrients
1	1304					
1200 2	1199					
1000 3	1002					
800 4	802					
600 5	600					
500 6	502					
400 7	390					
300 8	294					
200 9	200					
35 10	35					
11	3					
~~12~~						

cast 029

cast 030 O2 spike NO ?

Station Comments:

Go flo @ 37 CTD depth

@ 697 downcast, 1408 GMT, started cast #29 after numerous carosel error msg
sea H_2O depth

@ 393 up start cast #30 @ 1500

028 ⇒ 028a, downcast data to about 673 dbar
029 ⇒ 028b, 704 down to bottom, up to 397 dbar
030 ⇒ 028c upcast only 392 dbar to sfc.

Newest Version of Seasave7.20g

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	FD	029	029

Auxiliary Sensors	✓ CDOM (WET-Star)	✓ DO (SBE43)	✓ Altimeter (Benthos)	____ Other

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	09	2259	2841.8	8813.5	1794
	MAX	08	09	2337	2841.8	8813.5	1791
	END	08	09	0051	2841.8	8813.5	1788

Start Nav: [✓] End Nav: [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	GC Nutrients
1	1738					X
2 1600	1628					X
3 1500	1517					X
4 1400	1406					X
5 1100	1098					X
6 900	899					X
7 700	699					X
8 500	499					X
9 300	299					X
10 100	180					X
11 30	29					X
12 sfc	4					X

Station Comments:
Go-Flo shut @ 31m.

Errors Messages start around 500 dbar

7.9 nm from wellhead – right on top of outfall pipe

Cruise ID	Chief Sci.	CTD Operator	CTd Cast #	Sta ID #
HB 10-06	Jon Hare	FD	030	030

Auxiliary Sensors ✓ **CDOM** (WET-Star) ✓ **DO** (SBE43) ✓ **Altimeter** (Benthos) ____ **Other**

		Month	Day	Time (GMT)	Latitude	Longitude	Depth (m)
	START	08	10	0145	2841.8	8813.5	1791
	MAX						
	END	08	10	0315	2841.8	8813.5	1792

Start Nav: [✓] **End Nav:** [ ]

Bottle #	Depth Closed		Salt Case/#	DO #	Chloro #	Nutrients
1	1735					
2 1600	1604					
3 1500	1499					
4 1400	1400					
5 1200	1201					
6 1000	993					
7 800	799					
8 500	501					
9 300	✓ 302	No FIRE HIT ARM				
10 100	✓ 225					
11 30	30					
12 5	30					

OK

1st file for depth

Station Comments: NAV2 = first modem error message.

Go-FLO @ 31 m.

Bottle 9 = 304 dbar
10 = 226 dbar