19991004I1-AXBT

E.4 Boundary-Layer Scientist

The on-board boundary-layer scientist (BLS) is responsible for data collection from AXBTs, AXCPs, AXCTDs, BUOYs, and sea surface temperature radiometers (if these systems are used on the mission). Detailed calibration and instrument operation procedures are contained in the air-sea interaction (ASI) manual supplied to each operator. General supplementary procedures follow. (Check off and initial.)

E.4.1 Preflight

_____ 1. Determine the status of equipment and report results to the on-board lead project scientist (LPS).

_____ 2. Confirm mission and pattern selection from the on-board LPS.

_____ 3. Select the mode of operation for instruments after consultation with the HRD/BLS and the on-board LPS.

_____ 4. Complete appropriate preflight check lists as specified in the ASI manual and as directed from the on-board LPS.

E.4.2 In-Flight

_____ 1. Operate the instruments as specified in the ASI manual and as directed by the on-board LPS.

E.4.3 Post flight

_____ 1. Complete summary check list forms and all other appropriate check list forms.

_____ 2. Brief the on-board LPS on equipment status and turn in completed check lists to the LPS.

_____ 3. Debrief as necessary at MGOC or the hotel during a deployment.

_____ 4. Determine the status of future missions and notify MGOC as to where you can be contacted.

Form E-4

AXCP Log

Flight Number ____________________ AXBT/AXCP Contract Number ____________________

Take-Off Time ____________________ Landing Time ____________________

Storm ____________________ Storm Direction/Speed ____________________

Leg Number	Out/In	RA (m)	PMIN (mb)	VMAX (m/s)	RMAX (km)	Time PMIN	Time VMAX	Time End Pass

Leg/Drop #	Tube #	Channel #	Probe Type		Ground Speed	Drop Time (HHMMSS)	Latitude (deg min)	Longitude (deg min)	Status		Comments
			Slow	Reg					Good	Bad	

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AXBT and AXCP Check Sheet

P Black

Flight Number 991004I

AXBT/AXCP Contract Number _____

Take-Off Time 1810Z

Landing Time _____

Storm _____

Storm Direction/Speed _____

SFMR reading low by factor of 2; 15 kt winds should be 30 kt

		AXCP/ AXBT #/Type	Channel Number	Lot Number	Drop Time (HHMMSS)	Lat. Deg.	Lat. Min.	Long. Deg.	Long. Min.	Surface Temp. AXBT	IRT	MLD (m)	Comments	
IP	1.	CTD	14		190602	26	50	86	00	noise	<6oeth	43	in mod rain 3.5 dBZ ok	GPS#1 OK
	2.	CP	12		190716	26	37	86	46	28.5		40	no rain ok	
	3.	CP	16		192500	26	27	87	16	28.3		60	ok	
	4.	BT	12		193330	26	19	87	51	28.1		65	ok	
	5.	CTD	14		194232	26	07	88	27			85	ok	GPS#2 ok
	6.	BT	16		194824	26	00	88	51	28.3		60	ok	
	7.	CP	12		195154	25	55	89	06	28.8		50	4F out ok	
	8.	CP	14		200122	25	43	89	46	28.3		55	wire broke at 4600 m	
1	9.	CTD	16		200758	25	33	90	07	28.3		55	ok	GPS #3 ok
	10.	BT	12		201907	25	03	89	36	28.3		45	ok	
	11.	BT	16		203450	24	29	88	39	28.5		45	ok	GPS#4 ok
	12	BT	12		205057	23	47	87	43	27.7		25	ok	
2														
	13.	CP	12		210312	23	42	86	51				NG DVD probe hung	GPS #5 N.G.
	14.	CTD	14		210940	24	02	86	31				NG no sig.	
	15.	CP	16		213354	24	31	86	01	28.9		50	ok	GPS #6 ok
	16.	BT	12		213920	24	48	85	44				DVD no sig	may not have been launched
3	17.	CTD	14		212507	24	01	86	29			70	ok	
	18.	BT	12		215036	25	28	85	03				DVD - noisey sig	(probably due to climb-out)
	19.	BT	16		214425	25	06	85	26	27.9		70		
														also probe may be hung up at surface

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AXBT/AXCP Check Sheet Summary

Flight _____ Aircraft _____ Operator _____

	Number	
(1) Probes dropped	19	8 BTs 5 CTDs 6 CPs
(2) Failures	4	(2 BT, 1 CP; 1 CPT)
(3) Failures with no signal	2	(bts)
(4) Failures with sea surface temperature, but terminated above thermocline		_____
(5) Probes that terminated above 250 m, but below thermocline		_____
(6) Probes used by channel number	CH12	_____
	CH14	_____
	CH16	_____
	CH__	_____

NOTES: