

3/13/78 - 7/9/78

SUMMARY OF CRUISE 78-10

This cruise was started on 13 March 78 when the repairs to the bow were finished -Hero started loading supplies and Palmer personnel moved aboard After taking water and fuel departure was taken from Ushuaia on 14 March 78 and after uneventfull crossing of the Drake passage arrived at Palmer 18 March with two Boxes of live Krill aboard for the labs at Palmer- after unloading cargo and personnel vessel rerigged for another Krill cruise Departed Palmer 21 March and made three 24 hour stations in Dallman bay and Crocker passage Then returning to Palmer with good live and preserved specimens on arrival vessel rerigged for return to Ushuaia and topped off with fuel and water- With full complement of 25 Personnel vessel departed Palmer 0800 Local 28 March 78 and dumped garbage on the way to Strait of Gerlache Visited Almirante Brown for a short inspection of the Krill facilities and then ran in some heavy weather in the Bransfield strait wich forced entry into Deception island for shelter on the morning of 29 March-with moderating weather Hero departed the next morning and set course for King George Island - Made short visit to Polish base Arotowski to deliver mail and inspect Krill facilities Departed Almirante Bay in moderated seas and swells making good time towards Cape Melville This far in the cruise only moderate and localized patches of pack ice had been met and no more was expected-more than normal amounts of bergs are all over the place and navigatic navigation at night was slow and difficult. On entering Drake passage encountered heavy weather and at Noon time 30 March lost the Starboard engine-this meant that Hero was reduced to Half speed at the most and encountered encountered difficulty maintaining headway in the heavy headseas Slow progress was made untill 3 April when the Port engine developed cooling problems and the vessel was stopped and hove too in center of Drake passage while temporary repairs were made,After drifting for more than two hours resumed course for Ushuaia with the Port engine ruming at slow speed while further repairs were attempted to the Turbo charger-At late afternoon Turbo charger was back in use without cooling system and Hero now could proceed at 170 RPM barely making headway in the continiung heavy weather With deteriorated weather and 40 foot seas breaking no head way was made during the morning of 4 April and it was decided to seek shelter at Islas de Los Estados while awaiting better weather conditions in quiet Harbor the engineers managed to replace the headgasket on the starboard engine and rig it the same as the Port engine when departing Isla de Los Estados with the two engines Hero managed to make 200RPM 5 April was spend running from Isla de Los Estados to the Beagle canal in heavy weather never making more than four knots but at least making some headway. Picked up Argentine Pilot at 0630 Local April 6,1978 and made good speed in the canal towards Ushuaia arriving there at 1345 Local-All scientists and Palmer personnel departed Hero at 1600 Local 7 April was spend getting all equipment and baggage ashore or cleared by Customs and most of them left Ushuaia 0900 Local April 8,1978 Vessel now on maintenance status

Respectfully



13 MARCH 78

Start of cruise 78-10

0800-All repairs on the hull finished, now start loading material and supplies for Palmer

1100-Contact with Palmer -passed traffic

1500-All cargo loaded-crew securing and stowing for sea.

1730-All fresh supplies for Palmer and Hero Loaded-

The palmer crew moved aboard-

clear weather-Vessel riding easy at the dock

2000-All fresh supplies stowed and ready for sea

14 MARCH 78

0600-Clear dry day, preparing to get underway

0800-Depart dock for Fueling station

0830-Alongside the dock at the fuel facility

0900-Start fueling

1058-Finish fueling-awaiting clearance from Prefectura

1116-Received clearance-S.B.E. -

1120-Clear of dock-^D part Ushuaia for Palmer station

1220-Pilot Capt. Grubisich away on Angel B - Proceeding East in Beagle canal

1635-Chilean Pilot Capt. Poffan away on "Castor"

1705-All sail set on ^Starnboard tack-Proceeding to Paso Richmond

1900-Passed Chilean Naval vessel "Lientuer"-Passed destination information

2255-Passing ^Isla Barneveld-^Rolling heavily

15 MARCH 78

0030-Start making XBT casts-Short violent roll of the vessel makes for uncomfortable conditions

0700-Vessel rolling heavily-all cargo secure -bowleak seems to be holding its own

1200-Making good speed in spite of heavy roll-

1415-Light snow -little visibility

1800-XBT launchings are good sofar-All sail drawing full -No change in the weather

2300-Full ahead on both engines -making good speed -Bow leak remains the same

16 MARCH 78

0300-Had some failures in the last two XBT stations-probably due to the heavy weather

0800-Slow to 200 RPM due to heavy head seas-Snowing--

1250-Resumed full speed ahead with moderating weather-Sighted first ice berg for this cruise-very large ^Tabular berg 11 miles on the Port bow-

1830-Sighted more icebergs-Installing Iceights

2100-Slowed to 200 RPM -More bergs in failing light-

2120-Start trawling -good ^Sonar targets-

2308-Stopped trawling and resumed course and speed for ^Palmer-Found no Krill-

17 MARCH 78

0300-Smith ^Island on Radar -49 miles on the Port bow-

0600-Clear cold weather-Moderated seas and swell-making good speed -

0821-Start trawling -Indistinct Sonar targets at all depths to 250 meters-

1200-Still trawling with small catches being made all the time-Fair weather prevails

17 MARCH -Cont....

1408-~~No~~ more Krill indications on Sonar -Stopped trawling and proceedo
proceeding across Bransfield strait to Dallman Bay

1734-Taking down and furling sails-

1807-All sail, furlled-Start trawling On some good Sonar targets

2000-Continue trawling in good weather with small catches getting on deck-

2310-~~Finished~~ trawling -secured gear and resume course and speed for Palmer station
^{Now leak}
Now leak remains the same-Now estimate to be making 10% of prerepair volume.

18 MARCH 78

0100-Proceeding down Dallman Bay at slow speed -Many bergs on Brash

0520-^Bnter Gerlache strait-Less ice in Gerlache-

0650-Enter area of 7/8 Crta -slow ahead--

0715-Enter Lion sound-Mostly brash ice -

0830-Neumayer channel contains bands of heavy brash and bergu bits

0946-Entering Bismarck strait-Bands of ice with leads -running at reduced speeds-

1103-Entering ^Arthur Harbor-Free and clear

1114-Alongside the dock-unloading Jamesway boxes from the stern

1130-finished unloading the stern-moving in regular berth

1144-All secure alongside the dock-F.W.E. -Continue off loading all other supplies

1330-Finish offloading all supplies and start cleaning vessel

1700-Secured crew-Labs and decks cleaned-

2030-All Krill specimens ashore -secured pumps

2300-Vessel secure alongside the dock-cold clear weather-

19 MARCH 78

0100-Starting to snow-Temp. minus 2°C

0700-All station and Here are covered with six inches of snow and light snow persists

1200- No change in the weather-Overcast with light snow

1600-Clearing weather-snow stopped

1800-Clear sky-unlimited visibility

2200-Riding easy at the dock-clear weather-calm

20 MARCH 78

0600-^Clear weather prevails-calm

~~0800~~ Crew on maintenance and preparing for sea

0900- Heavy calving of the glacier surged vessel violently against the dock

1200⁰ High light overcast -snow on the glacier-many bergs coming in from the bismarok

1600-four live boxes ready and water circulating trough them

all supplies and fuel loaded-

1830-finished taking water-vessel now ready for sea.

2200-Riding easy alongside the dock-calm clear weather-all secure

21 MARCH 78

0600-Cold overcast day,preparing to get underway

0750-Depart Palmer -Calm weather-much ice and bergs

1100Contact with Palmer-Passed traffic

1200-Enter Gerlache trough ~~JENN~~ John sound much brash abd bergs

21 MARCH -Cont...

1700-Dallman bay-Showing-little visibility

1800-On station-Preparing for trawling and photo sensitivity test

2000-Start first 24 hours of trawling and photo cell tests

Overcast-rain-little visibility-many bergs

2400-Finish trawling-low overcast -heavy snow-Hove to

22 MARCH 78

015-All gear secured-drifting on station

0200-Start trawling-Nly winds 15 Kt.-Wet snow-

0315-Stopped trawling-No change in the weather

0600-Start trawling-Nly winds 20 kts. wet snow-choppy seas

0900-Stopped trawling -heavy seas-water breaking on deck-start photo cell test

1000-No results this station -secured gear and depart Dallman Bay for Croker passage

ENE winds 35 Kt.-Little visibility-many bergs

0630-Passed trough Schollesart channel and Gerlache strait-Little visibility in low clouds and rain-Scattered bergs and bergy bits

0800-Enter Croker passage-Looking for good trawl area-

0930-Stopped and start photocell test

1000-Start trawling -Heavy weather-Little visibility in low clouds and rain

Many bergs and bergy bits

202-While trying to set trawl hit berg head on at low speed,mainly due to the fact that I was hooked on the steering wheel with my jacket and could not get loose in time to prevent the collision-No damage,but point up the need to remove the engine telegraph from its present location

240-Finished trawling-hove to in center of Croker passage

23 MARCH 78

0200-Start trawling-Choppy seas-scattered ice

0457-Very good trawls from 200 meters to the surface-Hove to in moderating weather

0600-Start trawling-rough seas -dawn breaking-

0825-Very good specimens caught this time again-start photocell test

0845-Finished all test -Hove to in lee of the cliff at Liege Island

0900-Still hove to in Croker passage -in lee of Liege Island -Low clouds

1300-Start photocell test-L.A.N. is 13-18137

1348-Figging for trawling-

1353-Start trawling in moderating weather-

1603-Launch XBT -195 to assist in the Krill experiments

1613-Hove to -Made good trawls -Broken skies

1900-Start photocell test-Overcast-Fog

1948-Finished photocell test and start trawling-low clouds and rain

214-Stopped trawling -another good series-

2300-Hove to in the passage -little visibility-heavy fog

24 MARCH 78

0200-Start trawling-little visibility in heavy fog

0415-Stopped trawling-hove to in Lee of Liege island-all hands getting tired

0600-Calm weather -good visibility-scattered bergs-start trawling

0820-Finish trawling -another good catch made-start photocell test

24 MARCH-Cont...

- 1300-Start photocell test-clear sunny weather
1349-Start trawling-Calm clear weather-long low swell
1359-Stopped trawling-good catch- secured gear and prepare to depart
1600-Depart Croker passage-set course for Palmer station
2000-Stopped twice to identify a total of six Humpback whales-
Garlache is free and clear -scattered bergs
2030-Slow to 210 RPM due to failing light.
2125-Passing the Waife-making good progress
2255-Approaching Lion sound-
2310-Turning into Neumayer -Slow ahead on the Port engine -secured the Starboard engine

25 MARCH 78

- 0015-Turning Dogleg in Neumayer channel-free and clear
0300-Rounding Exposure rock into Bismarck strait-scattered ice
0400-Running through patches of freezing pancake ice -
0500-Approaching Inagard rocks-heavy snow-little visibility-many big bergs into the
approaches to Arthur Harbor-
0600-Approaching the dock at Palmer
0615-All secured at the dock-F.W.E.-----
0800-Crew on maintenance and clean up
1200-No change in the weather-riding easy at the dock
1700- All secured-no change in the weather-
2300-Vessel riding easy at the dock-light overcast -

26 MARCH 78

- 0800-Crew on minimum maintenance -high light overcast-Ely winds-
1200-No change in the weather-Light overcast-Icebergs in the Harbor and brush around
the dock area-
1600-Glacier calving continuously-vessel riding securely
2300-Found packages labeled EMERGENCY RATIONS to contain only candy and chewing gum.
This type of rations supposedly to be used during besetment.

27 MARCH 78

- 0700-Overcast -warm weather - 5°C -
0800-Crew on maintenance and preparing for seas
1200-Contacted Ushuaia and made plane reservations for both Mates-Ushuaia to B.A.
1700-All equipment loaded and fuel and water aboard -ready for sea-
2100-Vessel riding easy at the dock

28 MARCH 78

- 0600-Start main engines-preparing to get underway
0644-SBE-let go lines to turn vessel around
0716-secured with the port side to the dock-start loading Garbage
0734-All personnel departing aboard-let go lines
Passed by the Bransfield and blew goodby-set course for Almirante Brown-
0845-At Cape Lancaster-dumped Garbage
0945-Passed Capstan rocks
1015-Light fog -reduced visibility

28 MARCH-Cont. ...

1030-Rounding into Paradise Harbor-Many bergs in the way

1125-Stopped at Almirante Brown and launched Zodiac for visit to the station-

1140-All available scientists and crew visit Base to say Goodby to old and new friends

14110-All personnel and Zodiac aboard after nice visit to the base -set course for Bransfield strait

1735-Abeam the Waifs-2.2 miles to Port

2000-Switch controls to Ice comm-reduced speed-

2340-Passing Franklin point-Interourrence Island-

29 MARCH 78

0130-Enter Bransfield strait -short choppy swells-pitching sharply

0600-Switched to lower bridge-Rolling and pitching violently

0900-Entering Deception Island to get out of the weather-

0927-Anchored in Whalers bay -Port anchor in 30 meters-4 shots in the water--

0938-Anchor dragging-Let go 2 extra shots-

1200-Mooring at anchor in Gale force winds-All secure-Vessel icing from spray whipping aboard -

1930-Winds increasing-Vessel holing at anchor-Continuous icing from spray

2130-Wind shifted to the East-Driving snow-Zero visibility

2345-Gale force winds continue-light snow

30 MARCH 78

0230-Winds easing-but gusting

0537-Winds moderated-Start main engines-Preparing to get underway

0552-SBE-Start heaving anchor-

0623-Anchor aweigh-start raising sails

0635-Sails set-Depart Whalers bay

0645-Passed trough Neptunes Bellows-enter Bransfield strait-Set course for King George

1100-Contact with Palmer-passed traffic-Heavy swells remain but with little wind

1600-Arrival Secoura inlet-

1618-Arotowski's amphibian alongside loading scientists and crew who want to visit the station -

1900-Amphibian returns all personnel -depart Arotowski and set course for Ushuaia

1935-Enter Bransfield strait-Slow to 200 RPM and change to ice comm control

2345-Passing Cape Melville 2.2 miles to Port- fresh breeze

31 MARCH 78

0210- Set course for Tierra del Fuego-320° true-vessel pitching sharply in headseas

0500-Last sounding at 1200Fathoms

0845-Launch XHT-

1100-Slow to 200 RPM due to heavy head winds-

1150-Engineers ask to dump Starb. engine to investigate Knock

1230-Engineer reports the Starb.engine headgasket blown-will take down head and investigate

1612-Engineer reports the Starb.engine off the line until alongside the dock-No gasket and the Turbo after cooler is leaking-

1900-Winds increasing-vessel starting to leak badly

2345-No relief from the weather-Rolling and pitching heavily in headwinds

1 APRIL 78

0100-Westerly Gale forces cancellation of XBT program -Vessel rolling and pitching violently

0200-Skies clearing-Barometer rising rapidly and winds and seas moderating-

0600-Restart XBTs

1100-Contact with Palmer and Ushuaia-Passed traffic

2300-All day tacked all over the ocean trying to make some headway -most personnel in bad shape from the constant violent motion

2 APRIL 78

All day trying to get the best course for easier riding but getting set gradually to the East-Salt water entering galley at rapid rate endangering the stove and other wiring

Did some XBTs at haphazard rate-

winding up with squally weather gusting to 40 knots

3 APRIL 78

0030-Set course 270° true trying to make some Westing

0230-Forced back to course 320° due to the violent motion of the vessel

0300-Heavy squalls continue without break-Vessel almost at standstill and getting set Eastward at great rate-best guess ahead is 2 kts.

0630-Engineer reports Nozzles on the Port engine are clogging intermittently,request stop to investigate ASAP

0825-Stopped Port engine-vessel move to and drifting -all main deck hatches closed

0930-Engineer reports that the Port engine has the same problem as the Starboard with a leaking turbo charger after cooler- but they didn't blow the Gasket -they are now making a bypass line for the cooling water

1045-Port engine back on the line without Turbo charger-making 150 RPM and smoking heavily-regained some control over the vessel

1600-Port engine Turbo charger back on the line -Now making 170 RPM -Picking up some speed

2245-Picking up faint Radar target -45.5 miles on the Starboard bow-

2345-Driving snow squalls continue with WSWly winds -Estimating 4 kts.

Radar showing definite shoreline-Staten Island

4 APRIL 78

0125-Contact with ARA Diaguita -Passed position and course -

0400-Due to violent seas unable to change course for the Beagle Canal-SWly winds setting vessel to the North,towards Staten Island

Winds are 40 Kts.-Seas 30 feet and breaking-

0915-Giving up -winds 45 to 50 knots -seas 35 to 40 feet and breaking -cannot keep control and vessel setting towards Staten Island-Change course and make for shelter

1025-Contact ARA Diaguita and report vessel will seek shelter in Bahia Capitan Canepa

1050-Turning into Bahia Capitan Canepa

1130-All sails furled-

1135-Let go Starb. anchor in 30 meters -5 shots in the water-North arm of Bahia Capitan Canepa

1147-All secure -FWB-13

1320-Contact with Base Naval Ushuaia and reported position and intention-Engineers are getting on the Starb. engine

1700-No relief from the weather-Cylinder head is back on the Starb engine

2030-Engineer reports that the Starb. engine has been put together using the old gasket

4 APRIL 78 -Cont.....

2030-Engineer reports that the starboard engine has been put together using the old gasket and a water cooler bypass-if the gasket holds

we will have two engines and a total of about 200 RPM

2100-No relief from the weather-Gusting winds and snow squalls

5 APRIL 78

0600-Start main engines

0700-Strong winds and rain squalls continue

0800-SBE-preparing to depart

0815-Anchor aweigh depart anchorage

0830-Set mainsail and Mizzen-enter outer bay

0900-Clear of Bahia Capitan Canepa

0930-Winds WSW at 20 kts.-Tide rips -Short 10 to 12 foot swells-making little headway

1100-Contact with Palmer-Passed traffic

1700-Six miles SE of Cabo Buen Socoesso-Averaging 4 kts.

1930-Abeam Cabo Buen Socoesso-Contrary winds and current

2100-Abeam Cabo Hall-Now estimating Cabo San Pio at 0500AM

6 APRIL 78

0630-Picked up Pilot Capt. Grubissich at Rada Piota-

0800-Abeam Islas Beasas-Wly winds and contrary current-

0940-Enter Paso Mackinlay

1030-Exit Paso Mackinlay-clear calm weather -making good speed

1100-Contact with Palmer -Passed traffic-

1345-Approaching dock at Ushuaia-

1400-All secure at dock -F.E.E.

1430-Vessel cleared to enter-

1600-Passports returned-

1630-All extra personnel ashore -Cleaning vessel

1700-Vessel secure at dock -Crew on minimum maintenance

2000-Clear weather-Calm-Riding easy

7 APRIL 78

0800-Crew on maintenance and clearing vessel of all extra gear -cleaning up

0900-Scientists and Palmer crew show up to take care of the baggage and turn in their gear to the warehouse-

1100-Contact with Palmer station-Passed traffic

1600-All equipment ashore-cleanup getting along well

1730-Secured crew -vessel reasonably clean and equipment stowed-

END OF CRUISE 78- 1 C

TOTALS FOR CRUISE 78-1C

Start of cruise - - - - - 131100Z march 78
End of cruise - - - - - 072030Z April 78
Total time at sea - - - - - 23D-2H-40M
Total distance - - - - - 1990 Miles
Anchored two times for weather - - - - - 41H-36M
Made two Zodiac launches