

# United States Antarctic Activities 2003-2004

---

*This site fulfills the annual obligation of the United States of America as an Antarctic Treaty signatory to report its activities taking place in Antarctica. This portion, Modifications to Plans 2003-2004, supplements Planned Activities for July 2003 through June 2004 published elsewhere on this site.*



**National Science Foundation  
Arlington, Virginia 22230  
October 1, 2004**

## **Introduction**

Organization and content of this site respond to articles III(1) and VII(5) of the Antarctic Treaty. Format is as prescribed in the Annex to Antarctic Treaty Recommendation VIII-6, as amended by Recommendation XIII-3.

The National Science Foundation, an agency of the U.S. Government, manages and funds the United States Antarctic Program. This program comprises almost the totality of publicly supported U.S. antarctic activities—performed mainly by scientists (often in collaboration with scientists from other Antarctic Treaty nations) based at U.S. universities and other Federal agencies; operations performed by firms under contract to the Foundation; and military logistics by units of the Department of Defense.

Activities such as tourism sponsored by private U.S. groups or individuals are included. In the past, some private U.S. groups have arranged their activities with groups in another Treaty nation; to the extent that these activities are known to NSF, they are included. Visits to U.S. Antarctic stations by non-governmental groups are described in Section XVI.

This document is intended primarily for use as a Web-based file, but can be printed using the PDF option. Its internal cross links and links to other sites present more information than in the print publications of past years. These links also are intended to facilitate easy use of the site.

## Contents

<b>Introduction</b>	<b>ii</b>	<b>IV. PERSONNEL</b>	<b>9</b>
<b>Contents</b>	<b>iii</b>	<b>Senior United States Representatives</b>	<b>9</b>
<b>I. SHIPS AND AIRCRAFT</b>	<b>1</b>	<b>NSF Representatives in Antarctica</b>	<b>*</b>
<b>Ships</b>	<b>1</b>	Denotes Science Representative	<b>9</b>
<b>Aircraft</b>	<b>1</b>	<b>Officers in Charge of Bases</b>	<b>10</b>
		McMurdo Station	10
		Amundsen-Scott South Pole Station	10
		Palmer Station	10
<b>II. EXPEDITION DATES</b>	<b>2</b>	<b>Numbers, Occupations and Specialization of Personnel</b>	<b>10</b>
<b>Significant Dates of Expeditions</b>	<b>2</b>	<b>Numbers of Personnel Who Are Members of The Military Service</b>	<b>11</b>
<b>III. STATIONS</b>	<b>5</b>	<b>Personnel Engaged in Scientific Activities</b>	<b>11</b>
<b>Year Round Stations</b>	<b>5</b>	(with professional affiliation)	
McMurdo Station	5		
Amundsen-Scott South Pole Station	5		
Palmer Station	5		
<b>Austral Summer Camps</b>	<b>6</b>	<b>V. ARMAMENTS</b>	<b>12</b>
Siple Dome Camp	6	<b>VI. PROJECT DESCRIPTIONS</b>	<b>13</b>
Byrd Camp	6	<b>VII. SCIENTIFIC EQUIPMENT</b>	<b>14</b>
Lake Hoare Camp	6	<b>VIII. TRANSPORTATION AND COMMS</b>	<b>18</b>
Lake Bonney Camp	6		
Lake Fryxell Camp	7	<b>Surface, Marine, and Air Transportation Vehicles</b>	<b>18</b>
F6 Camp	7	McMurdo Station	18
Moody Camp	7	Amundsen-Scott South Pole Station	18
Beardmore Camp	7		
Odell Glacier Camp	7		
Megadunes Camp	8		
Copacabana, King George Island	8		
Cape Shirreff Field Station, Livingston Island	8		

<b>Description of Communications Facilities</b>	<b>19</b>	<b>Society Expeditions</b>	<b>67</b>
McMurdo Station	19	<i>M/V World Discoverer</i>	67
South Pole Station	19		
Palmer Station	19	<b>Discovery World Cruises</b>	<b>73</b>
		<i>M/V Discovery</i>	73
<b>Description of Airfields</b>	<b>19</b>		
		<b>Travel Dynamics International</b>	<b>75</b>
<b>IX. ASSISTANCE FACILITIES</b>	<b>20</b>	<i>M/V Orion</i>	75
<b>McMurdo Station</b>	<b>20</b>	<b>Elegant Cruises and Tours</b>	<b>79</b>
		<i>M/S Andrea</i>	79
<b>South Pole Station</b>	<b>20</b>		
<b>Palmer Station</b>	<b>20</b>	<b>ResidenSea</b>	<b>83</b>
		<i>M/S The World</i>	83
<b>X. TOURISM</b>	<b>21</b>	<b>Other</b>	<b>84</b>
		SHIP BORNE	84
<b>Abercrombie &amp; Kent International, Inc.</b>	<b>21</b>	<b>XI. REFUGES</b>	<b>85</b>
<i>M/S Explorer</i>	21	Tamseis Camp	85
<b>Quark Expeditions</b>	<b>25</b>	Onset D Camp	85
<i>Professor Molchanov</i>	26	Siple Dome Camp	86
<i>M/V Kapitan Khlebnikov</i>	34	Byrd Surface Camp	86
<i>Professor Multanovskiy</i>	38		
<i>Lubov Orlova</i>	45	<b>XII. PERMITS, SPECIES KILLED, CAPTURED</b>	<b>87</b>
<b>Orient Lines, Inc.</b>	<b>52</b>		
<i>Marco Polo</i>	52	<b>XIII. RADIOACTIVE MATERIALS</b>	<b>91</b>
<b>Clipper Cruise Lines</b>	<b>55</b>	<b>Add</b>	<b>91</b>
<i>Clipper Adventurer</i>	55	<b>Delete</b>	<b>92</b>
<b>Lindblad Expeditions</b>	<b>62</b>		
<i>M/V Endeavor</i>	62	<b>XIV. RESEARCH ROCKETS</b>	<b>93</b>

<b>XV. OCEANOGRAPHY- GOVERNMENT</b>	<b>94</b>	<b>XVI. VISITING EXPEDITIONS</b>	<b>103</b>
<i>R/V Nathaniel B. Palmer</i>	<b>94</b>	<b>McMurdo Station</b>	<b>103</b>
Biology & Medicine	97	<b>Amundsen-Scott South Pole Station</b>	<b>103</b>
Oceans and Climate	97	<b>Palmer Station</b>	<b>105</b>
Geology & Geophysics	97		
<i>R/V Laurence M. Gould</i>	<b>98</b>		
Biology & Medicine	102		
Geology and Geophysics	102		
Ocean & Climate	102		



# I. Ships and Aircraft

---

*Section I of the Modifications of Activities Planned for 2003-2004  
lists any changes to ship and aircraft usage planned for this time  
period.*

## **Ships**

The US Coast Guard Icebreakers Polar Star and Polar Sea arrived McMurdo this season to support cutting and clearing of the channel due to extremely heavy ice conditions in the Ross Island area. The Resupply Vessel *American Tern* arrived McMurdo on February 05, and completed vessel operations on February 11. The *American Tern* sailed on February 12 for Port Lyttleton, NZ.

## **Aircraft**

During Winfly (August) the USAP used 3 C-17 missions to move people and cargo between Christchurch and McMurdo. The USAF C-141 completed 19 missions and the C-17 completed 12 missions between Christchurch and McMurdo during October and November. The USAF C-141 returned to McMurdo during January and February completing 22 missions. The Royal New Zealand Air Force completed 15 missions between Christchurch and McMurdo during November and December.

## II. Expedition Dates

---

*Section II of the Modifications of Activities Planned for 2003-2004  
lists the actual dates of significant events occurring during this time  
period.*

### **Significant Dates of Expeditions**

<u>Date</u>	<u>Activity</u>
05 Apr 03	LMG03-04
10 May 03	LMG03-04A
16 June 03	LMG03-05
16 Aug 03	LMG03-05A
21 Aug 03	First flight to McMurdo Station for Winfly operations
22 Aug 03	NBP03-04C
07 Sep 03	LMG Maintenance open period for maintenance
14 Sep 03	NBP03-04C
22 Sep 03	LMG03-06
28 Sep 03	Palmer Station annual relief
30 Sep 03	First C-141 mission to McMurdo Station during Ice Runway period McMurdo Station commenced summer operations (1 of 19)
05 Oct 03	Marble Point opens
01 Oct 03	First C-17 mission of the season to McMurdo Station (1 of 12)
09 Oct 03	NBP03-04D
10 Oct 03	LMG03-07 (Palmer Station Shuttle)
14 Oct 03	Pieter J. Lenie Field Station (Copacabana) opens
14 Oct 03	Odell Glacier Camp Opens
14 Oct 03	Lake Hoare Camp opens
16 Oct 03	Lake Bonney Camp opens
17 Oct 03	F6 Camp opens
18 Oct 03	Lake Fryxell Camp opens



<u>Date</u>	<u>Activity</u>
22 Oct 03	Three (3) 109 <sup>th</sup> AW LC-130's arrive McMurdo Station to start on-continent missions
23 Oct 03	LMG03-07A
02 Nov 03	One additional LC-130 aircraft arrive McMurdo Station
27 Oct 03	NBP03-05
28 Oct 03	South Pole Station begins summer operations
31 Oct 03	Beardmore Camp opens
03 Nov 03	Siple Dome Camp Opens
07 Nov 03	LMG03-08
11 Nov 03	Cape Sherriff field camp opens
13 Nov 03	Byrd Camp Opens
17 Nov 03	C-130 flights to McMurdo Station, operated by the Royal New Zealand Air Force, commenced (1 of 15)
23 Nov 03	NBP off hire for main engine repairs
23 Nov 03	LMG03-09
14 Dec 03	Moody camp opens
18 Dec 03	NBP03-05A
27 Dec 03	Transfer flight operations from Sea Ice Runway to Williams field Skiway and Pegasus Blue Ice Runway
26 Dec 03	Megadunes Camp opens
03 Jan 04	First C-141 mission to McMurdo Station for redeployment (1 of 22)
05 Jan 04	NBP03-06
26 Jan 04	Beardmore Glacier camp closes
19 Jan 04	NBP04-01
27 Jan 04	Megadunes Camp closes
28 Jan 04	Lake Bonney Camp closes
30 Jan 04	Moody Camp closes
30 Jan 04	Lake Fryxell Camp closes
05 Feb 04	F6 Camp closes
05 Feb 04	Lake Hoare Camp closes
04 Feb 04	Odell Glacier camp closes
04 Feb 04	Byrd camp closes
04 Feb 04	Siple Dome Camp closes
08 Feb 04	Marble Point closes
05 Feb 04	<i>M/V American Tern</i> arrives at McMurdo Station ice pier, cargo offload

<u>Date</u>	<u>Activity</u>
	operation commence
12 Feb 04	LMG04-01, LMG04-02
15 Feb 04	Winter operations commence at South Pole Station
12 Feb 04	<i>M/V American Tern</i> Departs McMurdo Station ice pier, cargo operations completed
18 Feb 04	109th AW departs McMurdo Station
23 Feb 04	NBP04-02
23 Feb 04	Final C-141 turnaround mission at McMurdo Station
07 Mar 04	Cape Shirreff Field Station closes
08 Mar 04	Pieter J. Lenie Field Station (Copacabana) Closed
23 Mar 04	McMurdo Station commences winter-over operations
28 Mar 04	LMG04-03

**Note:** LMG = R/V *Laurence M. Gould*  
NBP = R/V *Nathaniel B. Palmer*

## III. Stations

---

*Section III of the Modifications of Activities Planned for 2003-2004 lists the names, locations, and actual opening dates of the Party's bases and subsidiary stations established in the Antarctic Treaty Area, and whether they are for summer and/or winter operations.*

### Year Round Stations

#### **McMurdo Station**

Location: Hut Point Peninsula on Ross Island in McMurdo Sound  
77° 55'S Latitude  
166° 39'E Longitude  
WINFLY: 21 August 2003

#### **Amundsen-Scott South Pole Station**

Location: 90° 00'S Latitude  
Annual Relief: 25 October 2003

#### **Palmer Station**

Location: Anvers Island near Bonaparte Point  
64° 46'S Latitude  
64° 05'W Longitude  
Annual Relief: 28 September 2003

## **Austral Summer Camps**

### **Siple Dome Camp**

Location: 81° 39'S Latitude  
149° 04'W Longitude

Open: 03 November 2003

Close: 04 February 2004

### **Byrd Camp**

Location: 80° 05'S Latitude  
119° 32'W Longitude

Open: 13 November 2003

Close: 04 February 2004

### **Lake Hoare Camp**

Location: 76°38'S Latitude  
162°57'E Longitude

Open: 14 October 2003

Close: 05 February 2004

### **Lake Bonney Camp**

Location: 77°42'S Latitude  
162°27'E Longitude

Open: 16 October 2003

Close: 28 January 2004

### **Lake Fryxell Camp**

Location: 77°36'S Latitude  
163°07'E Longitude

Open: 18 October 2003

Close: 30 January 2004

### **F6 Camp**

Location: 77°21'S Latitude  
163°9'E Longitude

Open: 17 October 2003

Close: 05 February 2004

### **Moody Camp**

Location: 80°01'S Latitude  
119.58'E Longitude

Open: 14 December 2003

Close: 30 January 2004

### **Beardmore Camp**

Location: 84°00'S Latitude  
164.50'E Longitude

Open: 31 October 2003

Close: 26 January 2004

### **Odell Glacier Camp**

Location: 76°43'S Latitude  
159°54'E Longitude  
Open: 14 October 2003  
Close: 04 February 2004

### **Megadunes Camp**

Location: 80°30'S Latitude  
125°00'E Longitude  
Open: 26 December 2003  
Close: 27 January 2004

### **Copacabana, King George Island**

Location: 62° 10'S Latitude  
58° 28'W Longitude  
Open: 14 October 2003  
Close: 08 March 2004

### **Cape Shirreff Field Station, Livingston Island**

Location: 62° 28'S Latitude  
60° 47'W Longitude  
Open: 11 November 2003  
Close: 07 March 2004

## IV. Personnel

---

*Section IV of the Modifications of Activities Planned for 2003-2004 lists actual dates senior management personnel were on-station in Antarctica during this time period. Appendix III of this document provides a comprehensive listing of all persons transiting the 60<sup>th</sup> South parallel, the date of transit, their professional affiliation, and visitor category.*

### Senior United States Representatives

<b>DATES</b>	<b>NAME</b>
12 Dec 03 – 29 Dec 03 and 26 Jan 04 – 03 Feb 04	Erick Chiang
13 Jan 03 – 17 Jan 04	Karl A. Erb

### NSF Representatives in Antarctica

\* Denotes Science Representative

<b>DATES</b>	<b>NAME</b>	<b>LOCATION</b>
30 Sep 03– 27 Nov 03	Alexander Sutherland	McMurdo
22 Oct 03 – 25 Nov 03	Bernhard Lettau *	McMurdo
04 Dec 03 – 18 Feb 04	Susanne LaFratta	McMurdo
05 Dec 03 – 03 Jan 04	Julie Palais *	McMurdo
05 Dec 03 – 29 Jan 04	Jerry Marty	South Pole
16 Dec 03 – 30 Jan 04	Vladimir Papitshvili *	South Pole
03 Jan 04 – 09 Feb 04	Marie Bundy *	McMurdo
04 Jan 04 – 02 Feb 04	David Bresnahan	Palmer

## **Officers in Charge of Bases**

Station managers for the 2002-2003 season were:

### **McMurdo Station**

Foster Scott	21 Aug 03 – 18 Dec 03 and 03 Jan 04 – 18 Feb 04
Terry Melton	
Tom Vinson (winter over)	15 Dec 03 – 04 Jan 04 and 16 Jan 04 -
William Coughran (winter over)	16 Jan 04 -

### **Amundsen-Scott South Pole Station**

Bettie Grant	24 Oct 03 – 15 Feb 04
Pete Koson (winter over)	14 Feb 04 -

### **Palmer Station**

Joseph Pettit	27 Sep 03 – 07 Dec 03
Robert Farrell	07 Dec 03 – 08 April 04
Gerry Ness (winter over)	08 April 04

## **Numbers, Occupations and Specialization of Personnel**

No Significant Changes



## **Numbers of Personnel Who Are Members of The Military Service**

No significant Changes

## **Personnel Engaged in Scientific Activities**

(with professional affiliation)

Please see Appendix II of the Planned Activities for 2003-2004

## V. Armaments

---

*Section V of the Modifications of Activities Planned for 2003-2004  
details changes in the number and type of armaments possessed by  
personnel at the main Antarctic stations and on research vessels.*

*No significant changes were noted during the reporting period at any  
station or on research vessels.*

## VI. Project Descriptions

---

*No modifications of field research projects are presented here, but  
original plans and project descriptions are available in Appendix II  
of this document.*

## VII. Scientific Equipment

*Section VII lists additions and deletions to the principal scientific equipment available at McMurdo, South Pole, and Palmer stations and onboard USAP research vessels.*

### ADDITIONS

	<u>McMurdo</u>	<u>SPole</u>	<u>Palmer</u>	<u>LMG</u> <sup>1</sup>	<u>NBP</u> <sup>2</sup>	<u>AGO</u> <sup>3</sup>
<b>Astrophysics Aeronomy</b>						
Thermal Electric Generator (TEG)						X
<b>Biology</b>						
Analyzer, Carbon/Nitrogen/Sulfur			X			
Bath, Water, Shaking				X		
Centrifuge, 20K RPM				X		
Chart Recorder, Three Channel				X		
Chromatography, High Performance Liquid System (HPLC)				X		
Collector, Fraction				X		
Cryostat		X				
Data Acquisition System		X				
Deck Unit/Transducer			X			
Electrophoresis Equipment				X		
Photosynthesis System			X			
Phototrans illuminator				X		
Thermocycler, PCR				X		
Ultracentrifuge				X		
VCR, High Resolution			X			

	<u>McMurdo</u>	<u>SPole</u>	<u>Palmer</u>	<u>LMG</u> <sup>1</sup>	<u>NBP</u> <sup>2</sup>	<u>AGO</u> <sup>3</sup>
<b>Environmental Monitoring</b>						
Sampler, Air, Hi-Vol.		X				
<b>Geology/Geophysics</b>						
Ball Mill			X			
Jack Hammer			X			
<b>Meteorology</b>						
Laser Ceilometer			X			
Transmitters, PTT			X			
Weather System			X			
<b>Oceanography/Limnology</b>						
Echo Sounder, Biosonics Acoustic Profiler				X		
<b>Seismology</b>						
<b>Other</b>						
Frequency Counter			X			
Resistors and Capacitors, Decade			X			

**DELETIONS**

	<u>McMurdo</u>	<u>SPole</u>	<u>Palmer</u>	<u>LMG</u> <sup>1</sup>	<u>NBP</u> <sup>2</sup>	<u>AGO</u> <sup>3</sup>
<b>Astrophysics Aeronomy</b>						
Chart Recorder, Eight Channel		X				
<b>Biology</b>						
Bath, Water, Shaking			X			
Calorimeter			X			
Collector, Fraction			X			
Colorimeter			X			
Dry Ice Maker			X			
Hood, Portable Fume Absorber			X			
Luminometer			X			
Meter, Microoxygen			X			
Meter, Oxygen			X			
Microscope, Inverted, Epifluorescence			X			
Osmometer, Vapor Pressure			X			
Respirometer, Gilson			X			
Spectrophotometer, Diode Array			X			
Stage, Cooling, Microscope			X			
Thermocycler			X			
Thermocycler, PCR			X			
<b>Geology &amp; Geophysics</b>						
Microscopes, Petrographic			X			
<b>Geomagnetism</b>						
Magnetometer, Portable		X				
Magnetometer, Visible Recording			X			

	<u>McMurdo</u>	<u>SPole</u>	<u>Palmer</u>	<u>LMG</u> <sup>1</sup>	<u>NBP</u> <sup>2</sup>	<u>AGO</u> <sup>3</sup>
<b>Meteorology</b>						
Laser Ceilometer		X				
<b>Oceanography/Limnology</b>						
Niskin Bottle			X			
Salinometer			X			

1 = R/V Laurence M. Gould

2 = R/V Nathaniel B. Palmer

3 = Automated Geophysical Observatory

## VIII. Transportation and Comms

---

*Section VIII of Modifications of Activities Planned for 2003-2004  
details additions and deletions to the number and type of  
transportation facilities, and changes to proposed projects that affect  
communications equipment used within the Antarctic Treaty area.*

### Surface, Marine, and Air Transportation Vehicles

#### McMurdo Station

##### **Delete**

Forklift, warehouse	2
---------------------	---

##### **Add**

Tractor, crawler	3
------------------	---

#### Amundsen-Scott South Pole Station

##### **Add**

Tractor, crawler	2
Snowmobiles	2

##### **Delete**

Personnel carrier	2
-------------------	---



## **Description of Communications Facilities**

### **McMurdo Station**

No significant changes are noted.

### **South Pole Station**

No significant changes are noted.

### **Palmer Station**

No significant changes are noted.

## **Description of Airfields**

No significant changes are noted.

## IX. Assistance Facilities

---

*Section IX of the Modifications of Activities Planned for 2003-2004  
details changes in the facilities available for rendering assistance in  
Antarctica including medical, transport services and emergency shelters.*

### **McMurdo Station**

A Physical Therapist Assistant was added to the medical staff at McMurdo Station for the Austral Winter season.

### **South Pole Station**

Medical facilities were moved to the new elevated station during January 2004.

### **Palmer Station**

No changes were noted at Palmer Station.

## X. Tourism

---

*Section X presents planned itineraries for U.S. based non-governmental activities in the Treaty area.*

### Abercrombie & Kent International, Inc.

Explorer Shipping Corporation and Abercrombie & Kent International, Inc. of Oak Brook, Illinois, conducted a total of eight cruises to the Antarctic Peninsula during the 2003-2004 season using the *M/S Explorer II*. Given below, for each cruise, is the port of origin, sites visited (with dates)

#### ***M/S Explorer***

***Cruise EX-#331 - Cruise Cancelled***  
November/December 2003

***Cruise EX-#332 – Cruise Cancelled***  
December 2003

***Cruise EX-#333***  
December 2003/January 2004  
114 PAX; 15 STAFF; 146 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Port Stanley, FALKLAND ISLANDS		23 DEC 2003
Carcass and Westpoint Islands		24 DEC 2003
New Island		25 DEC 2003
At sea		26-27 DEC 2003
Arctowski Station, King George Island	145	28 DEC 2003

Presidenti Frei Station, King George Island	87*	28 DEC 2003
Telefon Bay, Deception Island	123	29 DEC 2003
Pendulum Cove, Deception Island	133	29 DEC 2003
Damoy Point, Wiencke Island	89	30 DEC 2003
Goudier Island	145	30 DEC 2003
Pleneau Island	122*	30 DEC 2003
Almirante Brown	132	31 DEC 2003
Cuerville Island	91	31 DEC 2003
Half Moon Island	122	01 JAN 2004
At sea		02-03 JAN 2004
Ushuaia, ARGENTINA		04 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise EX-#401**

January 2004

170 PAX; 15 STAFF; 146 CREW

<b><u>Ports</u></b>	<b><u># PAX <sup>1</sup></u></b>	<b><u>Dates</u></b>
Ushuaia, ARGENTINA		04 JAN 2004
At sea		05-06 JAN 2004
Pendulum Cove, Deception Island	186	07 JAN 2004
Telefon Bay, Deception Island	163	07 JAN 2004
Neko Harbor, Andvord Bay	190	08 JAN 2004
Goudier Island	194	09 JAN 2004
Joula Point	188	09 JAN 2004
Cuerville Island	169	10 JAN 2004
Enterprise Island	157*	10 JAN 2004
Half Moon Island	186	11 JAN 2004
At sea		12-13 JAN 2004
Ushuaia, ARGENTINA		14 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise EX-#402**

January 2004

159 PAX; 15 STAFF; 154 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		14 JAN 2004
Southeast Falklands		15-16 JAN 2004
At sea		17-18 JAN 2004
Arctowski Station, King George Island	170	19 JAN 2004
Neko Harbor, Andvord Bay	182	20 JAN 2004
Paradise Bay	154*	20 JAN 2004
Goudier Island	181	21 JAN 2004
Pleneau Island	111*	21 JAN 2004
Pendulum Cove, Deception Island	148	22 JAN 2004
At sea		23-24 JAN 2004
Ushuaia, ARGENTINA		25 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise EX-#403**

January / February 2004

170 PAX; 15 STAFF; 154 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		25 JAN 2004
Southeast Falklands		26-27 JAN 2004
At sea		28-29 JAN 2004
Aitcho Island	186	30 JAN 2004
Half Moon Island	177	30 JAN 2004
Goudier Island	182	31 JAN 2004
Pleneau Island	150*	31 JAN 2004
Neko Harbor, Andvord Bay	175	01 FEB 2004
Almirante Brown Station	161*	01 FEB 2004

Pendulum Cove, Deception Island	154	02 FEB 2004
At sea		03-04 FEB 2004
Ushuaia, ARGENTINA		05 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise EX-#404**

February 2004

150 PAX; 15 STAFF; 152 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		05 FEB 2004
At sea		06-07 FEB 2004
Neko Harbor, Andvord Bay	168	08 FEB 2004
Waterboat Point, Graham Land	150*	08 FEB 2004
Petermann Island	159	09 FEB 2004
Vernadsky Station	182	09 FEB 2004
Argentine Islands	160	09 FEB 2004
Damoy Point, Wiencke Island	70	10 FEB 2004
Goudier Island	152	10 FEB 2004
Foyn Harbor	144*	10 FEB 2004
Pendulum Cove, Deception Island	134	11 FEB 2004
Half Moon Island	166	12 FEB 2004
At sea		13-14 FEB 2004
Ushuaia, ARGENTINA		15 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise EX #405**

February/March 2004

129 PAX; 15 STAFF; 153 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		15 FEB 2004
At sea		16 FEB 2004
Aitcho Island	150	17 FEB 2004
Cuerville Island	139	18 FEB 2004
Damoy Point, Wiencke Island	78	18 FEB 2004
Goudier Island	141	18 FEB 2004
Pleneau Island	85	19 FEB 2004
Almirante Brown Station	135	19 FEB 2004
Telefon Bay, Deception Island	123	20 FEB 2004
Pendulum Cove, Deception Island	118	20 FEB 2004
At sea		21-22 FEB 2004
South Georgia		23-26 FEB 2004
At sea		27-28 FEB 2004
Southeast Falklands		29 FEB 2004
At sea		01 MAR 2004
Ushuaia, ARGENTINA		02 MAR 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

## Quark Expeditions

Quark Expeditions of Darien, Connecticut, conducted 30 cruises to the Antarctic during 2003-2004 season using three chartered vessels. The *Professor Molchanov* conducted 10 cruises. The *Professor Multanovskiy* conducted 9 cruises, the *Lyubov Orlova* conducted 9, and the *Kapitan Khlebnikov* conducted two cruises. Given below, for each cruise, is the port of origin, sites visited (with dates) and the return port.

**Professor Molchanov**

**Cruise MOL #101103**

November 2003

26 PAX; 4 STAFF; 24 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Puerto Madryn, ARGENTINA		10 NOV 2003
At sea		11-12 NOV 2003
West Falkland Islands		13-14 NOV 2003
At sea		15-16 NOV 2003
South Georgia		17-20 NOV 2003
At sea		21 NOV 2003
Point Wild, Elephant Island	37	22 NOV 2003
Hannah Point, Livingston Island	35	23 NOV 2003
Whalers Bay, Deception Island	34	23 NOV 2003
Pendulum Cove, Deception Island	35	23 NOV 2003
Cuerverville Island	27	24 NOV 2003
Goudier Island	26	24 NOV 2003
Almirante Brown Station	37	24 NOV 2003
Pleneau Island	33*	25 NOV 2003
At sea		26-27 NOV 2003
Ushuaia, ARGENTINA		28 NOV 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MOL #281103**

November/December 2003

47 PAX; 4 STAFF; 24 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		28 NOV 2003
At seas		29 NOV 2003
Aitcho Islands	55	30 NOV 2003
Hannah Point, Livingston Island	51	01 DEC 2003



Whalers Bay, Deception Island	54	01 DEC 2003
Baily Head, Deception Island	50	01 DEC 2003
Paradise Harbor	52	02 DEC 2003
Skontorp Cove, Paradise Bay	50	02 DEC 2003
Petermann Island	52	03 DEC 2003
Goudier Island	51	03 DEC 2003
Neko Harbor	55	04 DEC 2003
Melchoir Islands	53*	04 DEC 2003
At sea		05-06 DEC 2003
Ushuaia, ARGENTINA		07 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MOL #071203**

December 2003

33 PAX; 4 STAFF; 24 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		07 DEC 2003
At sea		08-09 DEC 2003
Aitcho Islands	37	10 DEC 2003
Hannah Point, Livingston Island	33	10 DEC 2003
Baily Head, Deception Island	31	10 DEC 2003
Whalers Bay, Deception Island	35	10 DEC 2003
Pendulum Cove, Deception Island	23	10 DEC 2003
Cuerverville Island	37	11 DEC 2003
Almirante Brown Station	36	11 DEC 2003
Skontorp Cove, Paradise Bay	40*	11 DEC 2003
Petermann Island	38	12 DEC 2003
Pleneau Island	38*	12 DEC 2003
Goudier Island	39	12 DEC 2003
Neko Harbor, Andvord Bay	34	13 DEC 2003

Melchior Islands	36*	13 DEC 2003
At sea		14-15 DEC 2003
Ushuaia, ARGENTINA		16 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MOL #161203**

December 2003

32 PAX; 4 STAFF; 24 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		16 DEC 2003
At sea		17-18 DEC 2003
Aitcho Islands	36	19 DEC 2003
Half Moon Island	40	19 DEC 2003
Yankee Harbor, Greenwich Island	32	19 DEC 2003
Hannah Point, Livingston Island	34	20 DEC 2003
Baily Head, Deception Island	33	20 DEC 2003
Whalers Bay, Deception Island	42	20 DEC 2003
Pendulum Cove, Deception Island	27	20 DEC 2003
Cuerville Island	34	21 DEC 2003
Almirante Brown Station	40	21 DEC 2003
Skontorp Cove, Paradise Bay	36*	21 DEC 2003
Petermann Island	39	22 DEC 2003
Goudier Island	42	22 DEC 2003
Jougla Point	6	22 DEC 2003
Neko Harbor, Andvord Bay	34	23 DEC 2003
Melchior Island	37*	23 DEC 2003
At sea		24-25 DEC 2003
Ushuaia, ARGENTINA		26 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MOL #261203**  
December/January 2004  
42 PAX; 4 STAFF; 24 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		26 DEC 2003
At sea		27 DEC 2003
Aitcho Island	47	28 DEC 2003
Brown Bluff, Tabarin Peninsula	45	29 DEC 2003
Hope Bay	46	29 DEC 2003
Hannah Point, Livingston Island	46	30 DEC 2003
Baily Head, Deception Island	40	30 DEC 2003
Whalers Bay, Deception Island	41	30 DEC 2003
Pendulum Cove, Deception Island	44	30 DEC 2003
Cuerville Island	47	31 DEC 2003
Almirante Brown Station	40	31 DEC 2003
Skontorp Cove, Paradise Bay	47*	31 DEC 2003
Petermann Island	41	01 JAN 2004
Pleneau Island	47*	01 JAN 2004
Goudier Island	46	01 JAN 2004
Neko Harbor, Andvord Bay	48	02 JAN 2004
Melchior Islands	48	02 JAN 2004
At sea		03-04 JAN 2004
Ushuaia, ARGENTINA		05 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MOL #050104**  
January 2004  
46 PAX; 5 STAFF; 23 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		05 JAN 2004
At sea		06 JAN 2004
Falkland Islands		07-08 JAN 2004

At sea		09-10 JAN 2004
South Georgia		11-14 JAN 2004
At sea		15-17 JAN 2004
Penguin Island	55	18 JAN 2004
Skontorp Cove, Andvord Bay	54*	19 JAN 2004
Almirante Brown Station	53	19 JAN 2004
Goudier Island	55	20 JAN 2004
Petermann Island	53	20 JAN 2004
Pleneau Island	54*	20 JAN 2004
Melchior Islands	50*	20 JAN 2004
At sea		21-22 JAN 2004
Ushuaia, ARGENTINA		23 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

***Cruise MOL #230104 – Sub-chartered by Thika Travel***  
January/February 2004  
48 PAX; 4 STAFF; 24 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		23 JAN 2004
At sea		24 JAN 2004
Penguin Island	53	25 JAN 2004
Brown Bluff, Tabarin Peninsula	53	26 JAN 2004
Paulet Island	55	26 JAN 2004
Whalers Bay, Deception Island	53	27 JAN 2004
Hannah Point, Livingston Island	54	27 JAN 2004
Neko Harbor, Andvord Bay	54	28 JAN 2004
Paradise Bay	55	29 JAN 2004
Pleneau Island	53	29 JAN 2004
Petermann Island	53	29 JAN 2004
Cuerverville Island	53	30 JAN 2004

Goudier Island	54	30 JAN 2004
At sea		31 JAN – 01 FEB 2004
Ushuaia, ARGENTINA		02 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

***Cruise MOL #020204***

February 2004

48 PAX; 5 STAFF; 23 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		02 FEB 2004
At sea		03-04 FEB 2004
Devil Island	58	05 FEB 2004
Brown Bluff, Tabarin Peninsula	55	05 FEB 2004
Hannah Point, Livingston Island	55	06 FEB 2004
Baily Head, Deception Island	34	06 FEB 2004
Whalers Bay, Deception Island	60	06 FEB 2004
Cuerville Island	49	07 FEB 2004
Skontorp Cove, Paradise Bay	55*	07 FEB 2004
Almirante Brown Station	41	07 FEB 2004
Petermann Island	50	08 FEB 2004
Pleneau Island	31*	08 FEB 2004
Goudier Island	53	08 FEB 2004
Neko Harbor, Andvord Bay	51	09 FEB 2004
Orne Island	45	09 FEB 2004
Melchior Island	53*	09 FEB 2004
At sea		10-11 FEB 2004
Ushuaia, ARGENTINA		12 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MOL #120204**  
February 2004  
48 PAX; 6 STAFF; 23 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		12 FEB 2004
At sea		13 FEB 2004
Point Wild, Elephant Island	53*	14 FEB 2004
Danger Islands	54	15 FEB 2004
Paulet Island	51	15 FEB 2004
Hannah Point, Livingston Island	56	16 FEB 2004
Whalers Bay, Deception Island	53	16 FEB 2004
Skontorp Cove, Paradise Bay	55*	17 FEB 2004
Almirante Brown Station	55	17 FEB 2004
Jougla Point	8	17 FEB 2004
Damoy Point, Wiencke Island	25	17 FEB 2004
Goudier Island	47	17 FEB 2004
Pleneau Island	56*	18 FEB 2004
Petermann Island	52	18 FEB 2004
Vernadsky Station	66	18 FEB 2004
At sea		19-20 FEB 2004
Ushuaia, ARGENTINA		21 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MOL #210204**  
February/March 2004  
48 PAX; 5 STAFF; 23 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		21 FEB 2004
At sea		22 FEB 2004
Penguin Island	54	23 FEB 2004
Snow Hill Island	61	24 FEB 2004
Devil Island	56	24 FEB 2004

Brown Bluff, Tabarin Peninsula	53	24 FEB 2004
Hannah Point, Livingston Island	54	25 FEB 2004
Baily Head, Deception Island	58	25 FEB 2004
Whalers Bay, Deception Island	56	25 FEB 2004
Skontorp Cove, Paradise Bay	55*	26 FEB 2004
Almirante Brown Station	52	26 FEB 2004
Goudier Island	56	26 FEB 2004
Pleneau Island	52*	27 FEB 2004
Petermann Island	45	27 FEB 2004
Vernadsky Station	61	27 FEB 2004
At sea		28-29 FEB 2004
Ushuaia, ARGENTINA		01 MAR 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MOL #010304**

March 2004

25 PAX; 7 STAFF; 23 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		01 MAR 2004
At sea		01-03 MAR 2004
Pleneau Island	32*	04 MAR 2004
Goudier Island	41	04 MAR 2004
Skontorp Cove, Paradise Bay	33*	04 MAR 2004
Almirante Brown Station	33	04 MAR 2004
Hannah Point, Livingston Island	34	05 MAR 2004
Whalers Bay, Deception Island	31	05 MAR 2004
Devil Island	33	06 MAR 2004
Paulet Island	31	06 MAR 2004
Point Wild, Elephant Island	36	07 MAR 2004
Shingle Cove, Iceberg Bay	32	08 MAR 2004
At sea		09-10 MAR 2004
South Georgia		11-13 MAR 2004
At sea		14-15 MAR 2004

Falkland Islands	16-17 MAR 2004
At sea	18 MAR 2004
Ushuaia, ARGENTINA	19 MAR 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MOL #190304** – Sub-chartered by Oceanwide Expeditions of  
Vlissingen, Netherlands  
March/April 2004  
27 PAX; 6 STAFF; 23 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		19 MAR 2004
At sea		20 MAR 2004
Aitcho Islands	37	21 MAR 2004
Brown Bluff, Tabarin Peninsula	35	22 MAR 2004
Esperanza Station	39	22 MAR 2004
Devil Island	36	23 MAR 2004
Paulet Island	39	23 MAR 2004
At sea		24 MAR – 21 APR 2004
Cape Verde (islands off Atlantic coast of Africa)		22 APR 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

### ***M/V Kapitan Khlebnikov***

**Cruise KLB #051103**  
November 2003 – January 2004  
99 PAX; 16 STAFF; 61 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Port Elizabeth, AUSTRALIS		05 NOV 2003
At sea		06-09 NOV 2003
Crozet Island		10 NOV 2003



At sea		11-12 NOV 2003
Kerguelen Islands		13-14 NOV 2003
Heard Island		15 NOV 2003
At sea		16 NOV 2003
Ice Edge/Pack Ice		17-19 NOV 2003
Davis Station	138	20 NOV 2003
Pack Ice		21-27 NOV 2003
At sea		28 NOV – 03 DEC 2003
Hobart, TASMANIA		04 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only; # = helo landing

***Cruise KLB #041203***

December 2003

73 PAX; 11 STAFF; 66 CREW

<b><u>Ports</u></b>	<b><u># PAX <sup>1</sup></u></b>	<b><u>Dates</u></b>
Hobart, TASMANIA		04 DEC 2003
At sea		05-06 DEC 2003
Macquarie Island		07-08 DEC 2003
At sea		09-10 DEC 2003
Cape Adare	87	11 DEC 2003
Cape Hallett	87#	12 DEC 2003
Cape Washington	98#	13 DEC 2003
Drygalski Ice Tongue	93#	14 DEC 2003
At sea		15 DEC 2003
Coulman Island	96#	16 DEC 2003
Pack Ice		17-20 DEC 2003
At sea		21-22 DEC 2003
Campbell Island		23 DEC 2003
Enderby Island		24 DEC 2003

The Snares	25 DEC 2003
At sea	26 DEC 2003
Lyttleton, NEW ZEALAND	27 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only; # = helo landing

**Cruise KLB #281203**

December 2003 –January 2004

80 PAX; 10 STAFF; 64 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Lyttleton, NEW ZEALAND		28 DEC 2003
At sea		29 DEC 2003
Enderby Island		30 DEC 2003
Campbell Island		31 DEC 2003
At sea		01-02 JAN 2004
Cape Adare	88	03 JAN 2004
Coulman Island	95#	04 JAN 2004
Cape Washington	44#	04 JAN 2004
Campbell Glacier	88#	05 JAN 2004
Taylor Valley	87#	06 JAN 2004
Cape Royds Hut	91#	06 JAN 2004
Cape Evans Hut	89#	06 JAN 2004
McMurdo Station	97#	07 JAN 2004
Scott Base	97#	08 JAN 2004
Mount Erebus Summit over flight	36#	08 JAN 2004
Wilson Piedmont fuel cache (maintenance)	8#	08 JAN 2004
Cape Crozier (over flight outside ASPA)	7	09 JAN 2004
Terra Nova Bay Station	60	10 JAN 2004
At sea		11 JAN 2004
Sabrina Island, Balleny Islands	62*	12 JAN 2004
At sea		13-15 JAN 2004

Macquarie Island	16-17 JAN 2004
At sea	18-19 JAN 2004
Hobart, TASMANIA	20 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only; # = helo landing

**Cruise KLB #200204**

January/February 2004  
102 PAX; 11 STAFF; 65 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Hobart, TASMANIA		20 JAN 2004
At sea		21-22 JAN 2004
Macquarie Island		23-24 JAN 2004
At sea		25-26 JAN 2004
Cape Adare	120	27 JAN 2004
Cape Hallett	66	28 JAN 2004
Cape Washington	115#	29 JAN 2004
Taylor Valley	116#	30 JAN 2004
Wilson Piedmont fuel cache (maintenance)	4#	30 JAN 2004
McMurdo Station	115	30 JAN 2004
Scott Base	116	31 JAN 2004
Mount Erebus summit (helo over flight)	30	31 JAN 2004
Cape Royds Hut	112#	31 JAN 2004
Cape Evans Hut	113#	31 JAN 2004
Mount Discovery (helo over flight)	4	01 FEB 2004
Cape Crozier (helo over flight outside ASPA)	5	01 FEB 2004
Mount Erebus summit (helo over flight)	11	01 FEB 2004
Drygalski Ice Tongue	114#	02 FEB 2004
Mobray Bay, Cape Hallett	121	03 FEB 2004
Ironside Glacier, Cape Hallett (over flight)	129	03 FEB 2004
Unger Island, Lyall Islands	107#	04 FEB 2004
Ice edge		05 FEB 2004
At sea		06-07 FEB 2004

Campbell Island	08 FEB 2004
Enderby Island	09 FEB 2004
At sea	10-11 FEB 2004
Hobart, TASMANIA	12 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only; # = helo landing

### ***Professor Multanovskiy***

***Cruise MULT #291103***  
November/December 2003  
47 PAX; 5 STAFF; 26 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Port Stanley, FALKLAND ISLANDS		29 NOV 2003
At sea		30 NOV – 01 DEC 2003
South Georgia		02-05 DEC 2003
At sea		06-07 DEC 2003
Arctowski Station	51	08 DEC 2003
Half Moon Island	49	09 DEC 2003
Baily Head, Deception Island	56	09 DEC 2003
Cuerville Island	36*	10 DEC 2003
Neko Harbor, Andvord Bay	52	10 DEC 2003
Goudier Island	29	10 DEC 2003
Petermann Island	52	11 DEC 2003
Pleneau Island	54	11 DEC 2003
At sea		12-13 DEC 2003
Ushuaia, ARGENTINA		14 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MULT #141203**  
December 2003  
33 PAX; 5 STAFF; 26 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		14 DEC 2003
At sea		15 DEC 2003
Aitcho Islands	41	16 DEC 2003
Brown Bluff, Tabarin Peninsula	37	17 DEC 2003
Hope Bay	38*	17 DEC 2003
Hannah Point, Livingston Island	28	18 DEC 2003
Whalers Bay, Deception Island	40	18 DEC 2003
Neko Harbor, Andvord Bay	35	19 DEC 2003
Paradise Bay	38*	19 DEC 2003
Goudier Island	37	19 DEC 2003
Petermann Island	38	20 DEC 2003
Pleneau Island	35*	20 DEC 2003
At sea		21-22 DEC 2003
Ushuaia, ARGENTINA		23 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MULT #231203**  
December/January 2004  
49 PAX; 5 STAFF; 26 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		23 DEC 2003
At sea		24-25 DEC 2003
Hope Bay	53	26 DEC 2003
Brown Bluff, Tabarin Peninsula	53	26 DEC 2003
Hannah Point, Livingston Island	54	27 DEC 2003
Whalers Bay, Deception Island	53	27 DEC 2003
Pendulum Cove, Deception Island	51	28 DEC 2003
Danco Island	52	28 DEC 2003

Paradise Bay	53	28 DEC 2003
Petermann Island	49	29 DEC 2003
Pleneau Island	52*	29 DEC 2003
Goudier Island	54	29 DEC 2003
Neko Harbor, Andvord Bay	47	30 DEC 2003
Melchior Islands	52*	30 DEC 2003
At sea		31 DEC – 01 JAN 2004
Ushuaia, ARGENTINA		02 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MULT #010204**

January 2004

49 PAX; 5 STAFF; 26 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		02 JAN 2004
At sea		03 JAN 2004
Aitcho Islands	54	04 JAN 2004
Gourdin Island	55	05 JAN 2004
Paulet Island	51	05 JAN 2004
Brown Bluff, Tabarin Peninsula	56	06 JAN 2004
Esperanza Station	56	06 JAN 2004
Yankee Harbor, Greenwich Island	55	07 JAN 2004
Whalers Bay, Deception Island	54	07 JAN 2004
Pendulum Cove, Deception Island	33	07 JAN 2004
Goudier Island	53	08 JAN 2004
Jougla Point	40	08 JAN 2004
Petermann Island	49	08 JAN 2004
Pleneau Island	51*	08 JAN 2004
Neko Harbor, Andvord Bay	51	09 JAN 2004

Melchior Islands	52*	09 JAN 2004
At sea		10-11 JAN 2004
Ushuaia, ARGENTINA		12 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

***Cruise MULT #120104***

January 2004

48 PAX; 5 STAFF; 26 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		12 JAN 2004
At sea		13-14 JAN 2004
Gourdin Island	56	15 JAN 2004
Paulet Island	54	15 JAN 2004
Hannah Point, Livingston Island	54	16 JAN 2004
Neko Harbor, Andvord Bay	54	17 JAN 2004
Almirante Brown Station	55	17 JAN 2004
Skontorp Cove	55*	17 JAN 2004
Petermann Island	53	18 JAN 2004
Pleneau Island	47*	18 JAN 2004
Vernadsky Station	56	18 JAN 2004
Goudier Island	56	19 JAN 2004
Jougla Point	55	19 JAN 2004
Melchior Islands	49*	19 JAN 2004
At sea		20-21 JAN 2004
Ushuaia, ARGENTINA		22 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MULT #220104**  
January/February 2004  
49 PAX; 5 STAFF; 26 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		22 JAN 2004
At sea		23 JAN 2004
Falkland Island		24-25 JAN 2004
At sea		26-27 JAN 2004
South Georgia		28-31 JAN 2004
At sea		01 FEB 2004
Point Wild, Elephant Island	54	02 FEB 2004
Paulet Island	57	03 FEB 2004
Brown Bluff, Tabarin Peninsula	57	03 FEB 2004
Hannah Point, Livingston Island	51	04 FEB 2004
Whalers Bay, Deception Island	57	04 FEB 2004
Pendulum Cove, Deception Island	30	04 FEB 2004
Cuerverville Island	54	05 FEB 2004
Neko Harbor, Andvord Bay	58	05 FEB 2004
Goudier Island	53	05 FEB 2004
Pleneau Island	54*	06 FEB 2004
At sea		07-08 FEB 2004
Ushuaia, ARGENTINA		09 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MULT #090204**  
February 2004  
45 PAX; 7 STAFF; 27 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		09 FEB 2004
At sea		10-11 FEB 2004
Gourdin Island	54	12 FEB 2004
Brown Bluff, Tabarin Peninsula	56	12 FEB 2004



Hannah Point, Livingston Island	50	13 FEB 2004
Pendulum Cove, Deception Island	36	13 FEB 2004
Whalers Bay, Deception Island	56	13 FEB 2004
Cuerville Island	51	14 FEB 2004
Danco Island	12*	14 FEB 2004
Neko Harbor, Andvord Bay	55	14 FEB 2004
Skontorp Cove, Paradise Bay	44*	14 FEB 2004
Paradise Bay	15	15 FEB 2004
Pleneau Island	50*	15 FEB 2004
Jougla Point	55	15 FEB 2004
Goudier Island	55	15 FEB 2004
Damoy Point, Wiencke Island	16^	15 FEB 2004
Melchior Islands	49*	15 FEB 2004
At sea		16-18 FEB 2004
Ushuaia, ARGENTINA		19 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only; ^ = camping

***Cruise MULT #199294***  
February 2004  
44 PAX; 8 STAFF; 27 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		19 FEB 2004
At sea		20-23 FEB 2004
Aitcho Islands	54	24 FEB 2004
Cuerville Island	54	25 FEB 2004
Neko Harbor, Andvord Bay	56	25 FEB 2004
Skontorp Cove	54	25 FEB 2004
Damoy Point, Wiencke Island	17	26 FEB 2004
Jougla Point	46	26 FEB 2004
Goudier Island	45	26 FEB 2004

Pleneau Island	54*	26 FEB 2004
At sea		27-28 FEB 2004
Ushuaia, ARGENTINA		29 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

***Cruise MULT #290204***  
February/March 2004  
27 PAX; 5 STAFF; 27 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		29 FEB 2004
At sea		01-02 MAR 2004
Petermann Island	34	03 MAR 2004
Pleneau Island	37*	03 MAR 2004
Goudier Island	34	03 MAR 2004
Jougla Point	34	03 MAR 2004
Skontorp Cove	32*	04 MAR 2004
Neko Harbor, Andvord Bay	35	04 MAR 2004
Cuerverville Island	31	04 MAR 2004
Whalers Bay, Deception Island	37	05 MAR 2004
Pendulum Cove, Deception Island	20	05 MAR 2004
Half Moon Island	31	05 MAR 2004
Cape Lookout, Elephant Island	35	06 MAR 2004
Shingle Cove, Iceberg Bay, Coronation Is.	37	07 MAR 2004
At sea		08-09 MAR 2004
South Georgia		10-13 MAR 2004
At sea		14 MAR 2004
Falkland Islands		15-16 MAR 2004
At sea		17 MAR 2004
Ushuaia, ARGENTINA		18 MAR 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Lubov Orlova**

**Cruise ORL #111103**

November 2003

53 PAX; 9 STAFF; 61 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		11 NOV 2003
At sea		12 NOV 2003
Falkland Islands		13-14 NOV 2003
At sea		15-16 NOV 2003
South Georgia		17-20 NOV 2003
At sea		21-24 NOV 2003
Mikkelsen Harbor	60	25 NOV 2003
Portal Point, Charlotte Bay	58	25 NOV 2003
Whalers Bay, Deception Island	56	26 NOV 2003
Aitcho Islands	60	26 NOV 2003
At sea		27-28 NOV 2003
Ushuaia, ARGENTINA		29 NOV 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise ORL #291103**

November/December 2003

105 PAX; 10 STAFF; 63 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		29 NOV 2003
At sea		30 NOV 2003
Aitcho Islands	108	01 DEC 2003
Hannah Point, Livingston Island	106	02 DEC 2003
Whalers Bay, Deception Island	105	02 DEC 2003
Paradise Bay	113*	03 DEC 2003
Neko Harbor, Andvord Bay	108	03 DEC 2003
Vernadsky Station	112	04 DEC 2003

Petermann Island	107	04 DEC 2003
Cierva Cove	114*	05 DEC 2003
Mikkelsen Harbor	102	05 DEC 2003
At sea		06-07 DEC 2003
Ushuaia, ARGENTINA		08 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise ORL #191202**

December 2003

55 PAX; 9 STAFF; 61 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		08 DEC 2003
At sea		09 DEC 2003
Aitcho Islands	64	10 DEC 2003
Goudier Island	60	11 DEC 2003
Petermann Island	62	11 DEC 2003
Paradise Bay	64	12 DEC 2003
Neko Harbor, Andvord Bay	74	12 DEC 2003
Whalers Bay, Deception Island	61	13 DEC 2003
Half Moon Island	59	13 DEC 2003
Bellingshausen Station	70	14 DEC 2003
At sea		15-16 DEC 2003
Ushuaia, ARGENTINA		17 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise ORL #171203**

December 2003

88 PAX; 10 STAFF; 62 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		17 DEC 2003
At sea		18-19 DEC 2003
Aitcho Islands	96	20 DEC 2003
Yankee Harbor, Greenwich Island	96	20 DEC 2003
Half Moon Island	89	20 DEC 2003
Baily Head, Deception Island	89	21 DEC 2003
Whalers Bay, Deception Island	91	21 DEC 2003
Goudier Island	90	22 DEC 2003
Petermann Island	87	22 DEC 2003
Cuerville Island	90	23 DEC 2003
Almirante Brown Station	95	23 DEC 2004
At sea		24-25 DEC 2003
Ushuaia, ARGENTINA		26 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise ORL #261203**

December/January 2004

105 PAX; 10 STAFF; 63 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		26 DEC 2003
At sea		27 DEC 2003
Arctowski Station	118	28 DEC 2003
Half Moon Island	112	29 DEC 2003
Whalers Bay, Deception Island	113	29 DEC 2003
Paradise Bay	116	30 DEC 2003
Cuerville Island	109	30 DEC 2003
Petermann Island	108	31 DEC 2003

Goudier Island	111	31 DEC 2003
Neko Harbor, Andvord Bay	109	01 JAN 2004
Melchior Islands	107*	01 JAN 2004
At sea		02-03 JAN 2004
Ushuaia, ARGENTINA		04 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise ORL #040104**

January 2004

107 PAX; 10 STAFF; 63 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		04 JAN 2004
At sea		05 JAN 2004
Half Moon Island	114	06 JAN 2004
Turret Point, King George Bay	114	07 JAN 2004
Arctowski Station	113	07 JAN 2004
Telefon Bay, Deception Island	109	08 JAN 2004
Whalers Bay, Deception Island	111	08 JAN 2004
Cuerville Island	111	09 JAN 2004
Paradise Bay	114	09 JAN 2004
Petermann Island	111	10 JAN 2004
Goudier Island	114	10 JAN 2004
Neko Harbor, Andvord Bay	113	11 JAN 2004
Melchior Islands	113*	11 JAN 2004
At sea		12-13 JAN 2004
Ushuaia, ARGENTINA		14 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise ORL #140104**

January 2004

89 PAX; 11 STAFF; 63 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		14 JAN 2004
At sea		15 JAN 2004
Falkland Islands		16-17 JAN 2004
At sea		18-19 JAN 2004
South Georgia		20-23 JAN 2004
At sea		24 JAN 2004
Orcadas Station, Laurie Island	100	25 JAN 2004
At sea		26 JAN 2004
Aitcho Islands	98	27 JAN 2004
Whalers Bay, Deception Island	100	27 JAN 2004
Jougla Point	96	28 JAN 2004
Petermann Island	100	28 JAN 2004
Vernadsky Station	98	28 JAN 2004
Paradise Bay	98	29 JAN 2004
Neko Harbor, Andvord Bay	100	29 JAN 2004
At sea		30-31 JAN 2004
Ushuaia, ARGENTINA		01 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise ORL #010204**

February 2004

103 PAX; 10 STAFF; 62 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		01 FEB 2004
At sea		02-03 FEB 2004
Paulet Island	114	04 FEB 2004
Brown Bluff, Tabarin Peninsula	114	04 FEB 2004
Yankee Harbor, Greenwich Island	69	05 FEB 2004

Cuerville Island	114	06 FEB 2004
Almirante Brown Station	113	06 FEB 2004
Goudier Island	114	07 FEB 2004
Jougla Point	114	07 FEB 2004
Whalers Bay, Deception Island	114	08 FEB 2004
Half Moon Island	114	08 FEB 2004
At sea		09-10 FEB 2004
Ushuaia, ARGENTINA		11 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise ORL #110204**

February 2004

95 PAX; 13 STAFF; 63 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		11 FEB 2004
At sea		12-13 FEB 2004
Half Moon Island	109	14 FEB 2004
Whalers Bay, Deception Island	109	14 FEB 2004
Paradise Bay	109	15 FEB 2004
Neko Harbor, Andvord Bay	109	15 FEB 2004
Petermann Island	107	16 FEB 2004
Argentine Islands	125	16 FEB 2004
Crystal Sound, Biscoe Islands	106*	17 FEB 2004
Goudier Island	109	18 FEB 2004
Jougla Point	108*	18 FEB 2004
Danco Island	109	18 FEB 2004
At sea		19-20 FEB 2004
Ushuaia, ARGENTINA		21 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only



**Cruise ORL #210204**

February/March 2004

82 PAX; 11 STAFF; 62 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		21 FEB 2004
At sea		22 FEB 2004
Aitcho Islands	94	23 FEB 2004
Paulet Island	92	24 FEB 2004
Half Moon Island	91	25 FEB 2004
Whalers Bay, Deception Island	109	25 FEB 2004
Pendulum Cove, Deception Island	80	25 FEB 2004
Danco Island	90	26 FEB 2004
Paradise Bay	87	26 FEB 2004
Goudier Island	90	27 FEB 2004
Jougla Point	80	27 FEB 2004
Neko Harbor, Andvord Bay	94	28 FEB 2004
At sea		29 FEB – 01 MAR 2004
Ushuaia, ARGENTINA		02 MAR 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise ORL #020304**

March 2004

110 PAX; 14 STAFF; 63 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		02 MAR 2004
At sea		03-04 MAR 2004
Half Moon Island	125	05 MAR 2004
Whalers Bay, Deception Island	123	05 MAR 2004
Neko Harbor, Andvord Bay	125	06 MAR 2004
Almirante Brown Station	125	06 MAR 2004
At sea		07 MAR 2004
Detaille Island	111*	08 MAR 2004

Goudier Island	124	09 MAR 2004
At sea		10-11 MAR 2004
Ushuaia, ARGENTINA		12 MAR 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

## Orient Lines, Inc.

Orient Lines, Inc. of Fort Lauderdale, Florida, conducted 5 cruises to the Antarctic during the 2003-2004 season using the *M/V Marco Polo*. Given below, for each cruise, is the port of origin, sites visited (with dates) and the return port.

### **Marco Polo**

#### **Cruise MP #031230**

December 2003/January 2004

474 PAX; 14 STAFF; 366 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Valparaiso, CHILE		30 DEC 2003
At sea		31 DEC 2003
Puerto Montt, Chile		01 JAN 2004
At sea		02-03 JAN 2004
Punta Arenas, Chile		04 JAN 2004
At sea		05-06 JAN 2004
Waterboat Point, Graham Land	497	07 JAN 2004
Cuerverville Island	432*	08 JAN 2004
At sea		09-11 JAN 2004
Ushuaia, ARGENTINA		12 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MP #040112**

January 2004

564 PAX; 14 STAFF; 365 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		12 JAN 2004
At sea		13 JAN 2004
Cuerville Island	552*	14 JAN 2004
Joula Point	610	15 JAN 2004
Waterboat Point, Graham Land	588	16 JAN 2004
Half Moon Island	576	17 JAN 2004
At sea		18-19 JAN 2004
Ushuaia, ARGENTINA		20 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MP #040120**

January 2004

500 PAX; 15 STAFF; 363 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		20 JAN 2004
At sea		21-22 JAN 2004
South Georgia		23-25 JAN 2004
At sea		26 JAN 2004
Shingle Cove, Iceberg Bay	541	27 JAN 2004
At sea		28 JAN 2004
Hope Bay	553	29 JAN 2004
At sea		30-31 JAN 2004
Ushuaia, ARGENTINA		01 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MP#040201**

February 2004

545 PAX; 15 STAFF; 368 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		01 FEB 2004
At sea		02 FEB 2004
Cuerville Island	544*	03 FEB 2004
Joula Point	558	04 FEB 2004
Waterboat Point, Graham Land	591	05 FEB 2004
Half Moon Island	549	06 FEB 2004
At sea		07-08 FEB 2004
Ushuaia, ARGENTINA		09 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise MP#040209**

February 2004

546 PAX; 15 STAFF; 371 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		09 FEB 2004
At sea		10 FEB 2004
Half Moon Island	576	11 FEB 2004
Joula Point	558	12 FEB 2004
Waterboat Point, Graham Land	596	13 FEB 2004
At sea		14-15 FEB 2004
Falkland Islands		16-17 FEB 2004
At sea		18-19 FEB 2004
Montevideo, Uruguay		20 FEB 2004
Buenos Aires, ARGENTINA		21 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

## Clipper Cruise Lines

Clipper Cruise Lines, of St. Louis, Missouri, conducted eight cruises to the Antarctic during the 2003-2004 season using the *M/V Clipper Adventurer*. Given below, for each cruise, is the port of origin, sites visited (with dates) and the return port.

### *Clipper Adventurer*

#### **Cruise CA #111203**

November 2003

109 PAX; 9 STAFF; 68 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Port Stanley, FALKLAND ISLANDS		12 NOV 2003
Falklands Islands		13-14 NOV 2003
At sea		15-16 NOV 2003
South Georgia		17-19 NOV 2003
At sea		20 NOV 2003
Shingle Cove, Iceberg Bay	111	21 NOV 2003
Penguin Island	113	22 NOV 2003
Cuerville Island	103	23 NOV 2003
Neko Harbor, Andvord Bay	114	23 NOV 2003
Paradise Bay	120*	24 NOV 2003
Jougla Point	101	24 NOV 2003
Pleneau Island	117*	25 NOV 2003
Melchior Islands	104*	25 NOV 2003
Baily Head, Deception Island	69	26 NOV 2003
Whalers Bay, Deception Island	105	26 NOV 2003
Pendulum Cove, Deception Island	88	26 NOV 2003
Hannah Point, Livingston Island	114	26 NOV 2003
At sea		27-28 NOV 2003
Ushuaia, ARGENTINA		29 NOV 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise CA #112903**

November/December 2003

114 PAX; 9 STAFF; 71 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		29 NOV 2003
At sea		30 NOV 2003
Robert Point, Robert Island	126	01 DEC 2003
Half Moon Island	120	02 DEC 2003
Hannah Point, Livingston Island	119	02 DEC 2003
Cuerville Island	111	03 DEC 2003
Petermann Island	108	03 DEC 2003
Palmer Station, Anvers Island	139	04 DEC 2003
Torgersen Island	123	04 DEC 2003
Jougla Point	81	04 DEC 2003
Neko Harbor, Andvord Bay	127	05 DEC 2003
Whalers Bay, Deception Island	108	05 DEC 2003
Pendulum Cove, Deception Island	52	05 DEC 2003
At sea		06-07 DEC 2003
Falkland Island		08 DEC 2003
At sea		09 DEC 2003
Ushuaia, ARGENTINA		10 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise CA #121003**

December 2003

119 PAX; 9 STAFF; 69 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		10 DEC 2003
At sea		11-13 DEC 2003
Aitcho Islands	125	14 DEC 2003
Cuerville Island	122	15 DEC 2003
Petermann Island	121	15 DEC 2003

Pleneau Island	125*	15 DEC 2003
Goudier Island	126	15 DEC 2003
Jougla Point	126	16 DEC 2003
Waterboat Point, Graham Land	110	16 DEC 2003
Neko Harbor, Andvord Bay	128	17 DEC 2003
Melchior Islands	123*	17 DEC 2003
Whalers Bay, Deception Island	109	18 DEC 2003
Hannah Point, Livingston Island	123	18 DEC 2003
At sea		19-20 DEC 2003
Ushuaia, ARGENTINA		21 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise CA #122103**

December 2003/January 2004

113 PAX; 9 STAFF; 69 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		21 DEC 2003
At sea		22-23 DEC 2003
Mudge Passage (btwn Beer & Dodman Islands)	120*	24 DEC 2003
Jougla Point	118	25 DEC 2003
Goudier Island	118	25 DEC 2003
Petermann Island	121	25 DEC 2003
Paradise Bay	114*	25 DEC 2003
Neko Harbor, Andvord Bay	123	26 DEC 2003
Melchior Islands	105*	26 DEC 2003
Baily Head, Deception Island	82	27 DEC 2003
Whalers Bay, Deception Island	117	27 DEC 2003
Pendulum Cove, Deception Island	74	27 DEC 2003
Hannah Point, Livingston Island	124	27 DEC 2003
Half Moon Island	106	28 DEC 2003
Yankee Harbor, Graham Land	79	28 DEC 2003
At sea		29-30 DEC 2003

South Georgia	31 DEC'03 – 02 JAN 2004
At sea	03-06 JAN 2004
Ushuaia, ARGENTINA	07 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise AFSG0401** – Sub-chartered by Zegrahm Expeditions of  
Seattle, Washington  
January 2004  
110 PAX; 13 STAFF; 68 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Port Stanley, FALKLAND ISLANDS		07 JAN 2004
Falkland Islands		08 JAN 2004
At sea		09 JAN 2004
South Georgia		10-15 JAN 2004
At sea		16-17 JAN 2004
Baily Head, Deception Island	121	18 JAN 2004
Whalers Bay, Deception Island	84	18 JAN 2004
Hannah Point, Livingston Island	125	18 JAN 2004
Neko Harbor, Andvord Bay	127	19 JAN 2004
Goudier Island	119	19 JAN 2004
Jougla Point	82	19 JAN 2004
Almirante Brown Station	117	20 JAN 2004
Cuerville Island	113	20 JAN 2004
Georges Point, Ronge' Island	124	20 JAN 2004
Port Charcot, Booth Island	121	21 JAN 2004
Palmer Station, Anvers Island	141	21 JAN 2004
Torgersen Island	108	21 JAN 2004
At sea		22-23 JAN 2004
Ushuaia, ARGENTINA		24 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only



**Cruise CA #012404**

January/February 2004  
120 PAX; 9 STAFF; 69 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		24 JAN 2004
At sea		25 JAN 2004
Aitcho Islands	124	26 JAN 2004
Cuerville Island	120	27 JAN 2004
Petermann Island	125	27 JAN 2004
Paradise Bay	130*	28 JAN 2004
Jougl Point	131	28 JAN 2004
Goudier Island	131	28 JAN 2004
Neko Harbor, Andvord Bay	131	29 JAN 2004
Melchior Islands	126*	29 JAN 2004
Whalers Bay, Deception Island	123	30 JAN 2004
Hannah Point, Livingston Island	129	30 JAN 2004
At sea		31 JAN – 03 FEB 2004
Ushuaia, ARGENTINA		04 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise CA #040204**

February 2004  
116 PAX; 9 STAFF; 69 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		04 FEB 2004
At sea		05-07 FEB 2004
Half Moon Island	119	08 FEB 2004
Cuerville Island	113	09 FEB 2004
Neko Harbor, Andvord Bay	120	09 FEB 2004
Paradise Bay	121*	10 FEB 2004
Jougl Point	120	10 FEB 2004
Goudier Island	120	10 FEB 2004

Petermann Island	113	11 FEB 2004
Pleneau Island	122*	11 FEB 2004
Baily Head, Deception Island	89	12 FEB 2004
Whalers Bay, Deception Island	108	12 FEB 2004
Telefon Bay, Deception Island	114	12 FEB 2004
Hannah Point, Livingston Island	120	12 FEB 2004
At sea		13-14 FEB 2004
Ushuaia, ARGENTINA		15 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise CAAF #150204**

February 2004

116 PAX; 9 STAFF; 70 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		15 FEB 2004
At sea		16-18 FEB 2004
Aitcho Islands	128	19 FEB 2004
Neko Harbor, Andvord Bay	123	20 FEB 2004
Cuerville Island	121	20 FEB 2004
Jougla Point	114	21 FEB 2004
Goudier Island	114	21 FEB 2004
Paradise Bay	106*	21 FEB 2004
Petermann Island	115	22 FEB 2004
Pleneau Island	127*	22 FEB 2004
Baily Head, Deception Island	46	23 FEB 2004
Whalers Bay, Deception Island	75	23 FEB 2004
Telefon Bay, Deception Island	69	23 FEB 2004
At sea		24-25 FEB 2004
Ushuaia, ARGENTINA		26 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise CA #33004**  
February/March 2004  
70 PAX; 7 STAFF; 72 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Port Stanley, FALKLAND ISLANDS		25 FEB 2004
Falkland Island		26 FEB 2004
At sea		27-28 FEB 2004
Aitcho Islands	80	01 MAR 2004
Hannah Point, Livingston Island	82	01 MAR 2004
Neko Harbor, Andvord Bay	85	02 MAR 2004
Vernadsky Station	80	02 MAR 2004
Petermann Island	76	03 MAR 2004
Pleneau Island	78*	03 MAR 2004
Almirante Brown Station	75	04 MAR 2004
Goudier Island (Port Lockroy)	84	04 MAR 2004
Jougla Point	70	04 MAR 2004
Whalers Bay, Deception Island	78	05 MAR 2004
Pendulum Cove, Deception Island	66	05 MAR 2004
At sea		06-07 MAR 2004
Ushuaia, ARGENTINA		08 MAR 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

## Lindblad Expeditions

Lindblad Expeditions of New York City, New York, conducted seven cruises to the Antarctic during the 2003-2004 season, using the *M/V Endeavor*. Given below, for each cruise, is the port of origin, sites visited (with dates) and the return port.

### ***M/V Endeavor***

#### ***Cruise EN4325***

December 2003

90 PAX; 12 STAFF; 68 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Port Stanley, FALKLAND ISLANDS		07 DEC 2003
Falkland Islands		08-09 DEC 2003
At sea		10-11 DEC 2003
South Georgia		13-15 DEC 2003
At sea		16 DEC 2003
Shingle Cove, Iceberg Bay		17 DEC 2003
At sea		18 DEC 2003
Baily Head, Deception Island	107	19 DEC 2003
Whalers Bay, Deception Island	101	19 DEC 2003
Yankee Harbor, Greenwich Island	105	20 DEC 2003
Aitcho Islands	103	20 DEC 2003
Cuerville Island	102	21 DEC 2003
Neko Harbor, Andvord Bay	88	22 NOV 2003
Detaile Island	60	23 DEC 2003
Petermann Island	102	24 DEC 2003
Jougla Point	103	25 DEC 2003
At sea		26-27 DEC 2003
Ushuaia, ARGENTINA		28 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise EN#4326**

December/January 2004

113 PAX; 12 STAFF; 68 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		28 DEC 2003
At sea		29 DEC 2003
Aitcho Islands		30 DEC 2003
Whalers Bay, Deception Island	84	31 DEC 2003
Neko Harbor, Andvord Bay	120	31 DEC 2003
Cuerville Island	126	01 JAN 2004
Petermann Island	84	02 JAN 2004
Detaille Island	112	03 JAN 2004
Yalour Island	121*	04 JAN 2004
Pleneau Island	102	04 JAN 2004
Jougla Point	127	05 JAN 2004
At sea		06-07 JAN 2004
Ushuaia, ARGENTINA		08 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise EN#4401**

January 2004

112 PAX; 13 STAFF; 66 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		08 JAN 2004
At sea		09 JAN 2004
Aitcho Islands	116	10 JAN 2004
Baily Head, Deception Island	123	11 JAN 2004
Whalers Bay, Deception Island	116	11 JAN 2004
Cuerville Island	116	12 JAN 2004
Almirante Brown Station	115	12 JAN 2004

At sea		13 JAN 2004
Palmer Station, Anvers Island	136	14 JAN 2004
Torgersen Island	111	14 JAN 2004
Pleneau Island	114	15 JAN 2004
Petermann Island	113	15 JAN 2004
Goudier Island	120	16 JAN 2004
Jougla Point	105	16 JAN 2004
At sea		17-18 JAN 2004
Ushuaia, ARGENTINA		19 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

***Cruise EN#4402***

January 2004

110 PAX; 11 STAFF; 66 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		19 JAN 2004
At sea		20 JAN 2004
Aitcho Islands	115	21 JAN 2004
Whalers Bay, Deception Island	104	22 JAN 2004
Telefon Bay, Deception Island	44	22 JAN 2004
Prospect Point, Graham Land	112	23 JAN 2004
Hanusse Bay (ice walking)	118	24 JAN 2004
Peterman Island	114	25 JAN 2004
Booth Island	115	25 JAN 2004
Goudier Island	118	26 JAN 2004
Jougla Point	91	26 JAN 2004
Palmer Station, Anvers Island	132	26 JAN 2004
Torgersen Island	90	26 JAN 2004
Almirante Brown Station	4%	27 JAN 2004

Cuerville Island	117	27 JAN 2004
At sea		28-29 JAN 2004
Ushuaia, ARGENTINA		29 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only; %= scuba

**Cruise EN#4403**

January /February 2004

112 PAX; 10 STAFF; 66 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		29 JAN 2004
At sea		30-31 JAN 2004
Aitcho Islands	122	01 FEB 2004
Petermann Island	116	02 FEB 2004
Detaile Island	112	03 FEB 2004
Lallemand Fjord (ice walking)	124	03 FEB 2004
Prospect Point, Graham Land	115*	04 FEB 2004
Pleneau Island	82	04 FEB 2004
Almirante Brown Station	106	05 FEB 2004
Booth Island	74	05 FEB 2004
Neko Harbor, Andvord Bay	109	06 FEB 2004
Goudier Island	117	06 FEB 2004
Jougla Point	117	06 FEB 2004
Whalers Bay, Deception Island	102	07 FEB 2004
Duff Point, Robert Island	73	08 FEB 2004
The Triplets, Coppermine Cove, Robert Is.	52	08 FEB 2004
At sea		09-10 FEB 2004
Ushuaia, ARGENTINA		11 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise EN#4404**  
February/March 2004  
74 PAX; 10 STAFF; 66 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		11 FEB 2004
At sea		12-13 FEB 2004
Damoy Point, Wiencke Island	78	14 FEB 2004
Palmer Station, Anvers Island	94	14 FEB 2004
Torgersen Island	68	14 FEB 2004
Petermann Island	77	15 FEB 2004
Prospect Point, Graham Land	74*	15 FEB 2004
Goudier Island	75	16 FEB 2004
Jougla Point	66	16 FEB 2004
Booth Island	68	16 FEB 2004
Baily Head, Deception Island	82	17 FEB 2004
Whalers Bay, Deception Island	74	17 FEB 2004
Brown Bluff, Tabarin Peninsula	78	18 FEB 2004
Paulet Island	76	18 FEB 2004
Penguin Island	58	19 FEB 2004
Gibbs Island	59*	19 FEB 2004
Point Wild, Elephant Island	81*	20 FEB 2004
Cape Valentine, Elephant Island	70*	20 FEB 2004
Sandefjord Bay, South Orkneys	81*	21 FEB 2004
At sea		22 FEB 2004
South Georgia		23-27 FEB 2004
At sea		28-29 FEB 2004
Falkland Islands		01-02 MAR 2004
Port Stanley, FALKLAND ISLANDS		03 MAR 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only



## Society Expeditions

Society Expeditions of Seattle, Washington, conducted seven cruises to the Antarctic during the 2003-2004 season, using the *M/V World Discoverer*. Given below, for each cruise, is the port of origin, sites visited (with dates) and the return port.

### *M/V World Discoverer*

#### **Cruise SE32011**

November/December 2003

116 PAX; 10 STAFF; 96 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Punta Arenas, CHILE		20 NOV 2003
At sea		21 NOV 2003
Falkland Islands		22-23 NOV 2003
At sea		24-25 NOV 2003
South Georgia		26-28 NOV 2003
At sea		29 NOV 2003
Orcadas Station, Laurie Island	112	30 NOV 2003
Sandefjord Bay, Coronation Island	120	30 NOV 2003
Point Wild, Elephant Island	107	01 DEC 2003
Arctowski Station	114	02 DEC 2003
Penguin Island	132	02 DEC 2003
Hannah Point, Livingston Island	120	03 DEC 2003
Baily Head, Deception Island	115	03 DEC 2003
Whalers Bay, Deception Island	109	03 DEC 2003
Almirante Brown Station	125	04 DEC 2003
Goudier Island	86	04 DEC 2003
Jougla Point	80	04 DEC 2003

Petermann Island	124	05 DEC 2003
At sea		06-07 DEC 2003
Ushuaia, ARGENTINA		08 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

***Cruise SE30812***

December 2003

156 PAX; 15 STAFF; 95 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		08 DEC 2003
At sea		09 DEC 2003
Half Moon Island	166	10 DEC 2003
Esperanza Station	164	11 DEC 2003
Penguin Island	153	12 DEC 2003
Almirante Brown Station	170	13 DEC 2003
Goudier Island	168	13 DEC 2003
Jougla Point	154	13 DEC 2003
Pleneau Island	156	14 DEC 2003
Cuerville Island	171	14 DEC 2003
Georges Point, Ronge Island	169	14 DEC 2003
Hannah Point, Livingston Island	136	15 DEC 2003
Whalers Bay, Deception Island	148	15 DEC 2003
Pendulum Cove, Deception Island	68	15 DEC 2003
At sea		16-17 DEC 2003
Ushuaia, ARGENTINA		18 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise SE31812**

December 2003/January 2004  
120 PAX; 10 STAFF; 98 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		18 DEC 2003
At sea		19 DEC 2003
Falkland Islands		20-21 DEC 2003
At sea		22-23 DEC 2003
South Georgia		24-26 DEC 2003
At sea		27 DEC 2003
Orcadas Station, Laurie Island	125	28 DEC 2003
Coronation Island	124	28 DEC 2003
Monroe Island	124	28 DEC 2003
At sea		29-30 DEC 2003
Baily Head, Deception Island	115	31 DEC 2003
Pendulum Cove, Deception Island	45	31 DEC 2003
Jougla Point	123	01 JAN 2004
Goudier Island (Port Lockroy)	125	01 JAN 2004
Petermann Island	115	01 JAN 2004
Almirante Brown Station	129	02 JAN 2004
Cuerville Island	120	02 JAN 2004
Georges Point, Ronge Island	118	02 JAN 2004
Neko Harbor, Andvord Bay	86	02 JAN 2004
At sea		03-04 JAN 2004
Ushuaia, ARGENTINA		05 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise SE40501**

January 2004  
156 PAX; 10 STAFF; 95 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		05 JAN 2004
At sea		06 JAN 2004
Aitcho Islands	169	07 JAN 2004
Paulet Island	164	08 JAN 2004
South Bay/Johnson's Dock	154*	09 JAN 2004
Whalers Bay, Deception Island	146	09 JAN 2004
Pendulum Cove, Deception Island	42	09 JAN 2004
Goudier Island (Port Lockroy)	162	10 JAN 2004
Jougla Point	156	10 JAN 2004
Petermann Island	154	10 JAN 2004
Detaile Island	117	11 JAN 2004
Almirante Brown Station	158	12 JAN 2004
Cuerville Island	159	12 JAN 2004
Georges Point, Ronge Island	150	12 JAN 2003
At sea		13-14 JAN 2004
Ushuaia, ARGENTINA		15 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise SE41501**

January/February 2004  
151 PAX; 9 STAFF; 94 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		15 JAN 2004
At sea		16 JAN 2004
Falkland Islands		17-18 JAN 2004
At sea		19-20 JAN 2004
South Georgia		21-23 JAN 2004

At sea		24 JAN 2004
Coronation Island	137	25 JAN 2004
Point Wild, Elephant Island	156*	26 JAN 2004
Brown Bluff, Tabarin Peninsula	155	27 JAN 2004
Paulet Island	148	27 JAN 2004
Hannah Point, Livingston Island	112	28 JAN 2004
Whalers Bay, Deception Island	144	28 JAN 2004
Pendulum Cove, Deception Island	114	28 JAN 2004
Goudier Island	150	29 JAN 2004
Jougla Point	148	29 JAN 2004
Almirante Brown Station	158	29 JAN 2004
Argentine Islands	162	30 JAN 2004
At sea		31 JAN-01 FEB 2004
Ushuaia, ARGENTINA		02 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise SE40202**

February 2004

103 PAX; 8 STAFF; 95 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u>	<u>Dates</u>
Ushuaia, ARGENTINA		02 FEB 2004
At sea		03 FEB 2004
Falkland Island		04-05 FEB 2004
At sea		05-07 FEB 2004
South Georgia		08-10 FEB 2004
At sea		11-12 FEB 2004
Point Wild, Elephant Island	92*	13 FEB 2004
Whalers Bay, Deception Island	104	14 FEB 2004
Hannah Point, Livingston Island	110	14 FEB 2004
Goudier Island	108	15 FEB 2004
Jougla Point	108	15 FEB 2004
Waterboat Point, Graham Land	115	15 FEB 2004
The Gullet, Marguerite Bay	98*	16 FEB 2004

Petermann Island	113	17 FEB 2004
At sea		18-19 FEB 2004
Ushuaia, ARGENTINA		20 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise SE42002**

February/March 2004

93 PAX; 9 STAFF; 92 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u>	<u>Dates</u>
Ushuaia, ARGENTINA		20 FEB 2004
At sea		21 FEB 2004
Falkland Islands		22-23 FEB 2004
At sea		24-25 FEB 2004
South Georgia		26-28 FEB 2004
At sea		29 FEB 2004
Monroe & Coronation Isls., South Orkneys	101	01 MAR 2004
Gibbs Island	82*	02 MAR 2004
Jubany Station, Potters Cove	98	03 MAR 2004
Telefon Bay, Deception Island	103	03 MAR 2004
Pendulum Cove, Deception Island	58	03 MAR 2004
Jougla Point	102	04 MAR 2004
Almirante Brown Station	105	04 MAR 2004
Petermann Island	107	05 MAR 2004
At sea		06-08 MAR 2004
Ushuaia, ARGENTINA		10 MAR 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

## Discovery World Cruises

Discovery World Cruises, of Fort Lauderdale, Florida, conducted three cruises to the Antarctic during the 2003-2004 season, using the *M/V Discovery*. Given below, for each cruise, is the port of origin, sites visited (with dates) and the return port.

### ***M/V Discovery***

#### ***Cruise #019***

December 2003/January 2004  
301 PAX; 13 STAFF; 295 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Rio de Janeiro, BRAZIL		21 DEC 2003
At sea		22-23 DEC 2003
Florianopolis, Brazil		24 DEC 2003
At sea		25 DEC 2003
Montevideo, Uruguay		26 DEC 2003
Buenos Aires, Argentina		27 DEC 2003
At sea		28-29 DEC 2003
Puerto Deseado, Argentina		30 DEC 2003
At sea		31 DEC 2003
Falkland Islands		01-02 JAN 2004
At sea		03-04 JAN 2004
Cuverville Island	258*	05 JAN 2004
Waterboat Point, Graham Land	313	06 JAN 2004
Half Moon Island	288	07 JAN 2004
At sea		08 JAN 2004
Ushuaia, ARGENTINA		09 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise #020**

January 2004

449 PAX; 13 STAFF; 290 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		10 JAN 2004
At sea		11-12 JAN 2004
Jouglá Point	485	13 JAN 2004
Waterboat Point, Graham Land	449	14 JAN 2004
Half Moon Island	417	15 JAN 2004
At sea		16 JAN 2004
Ushuaia, ARGENTINA		17 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise #021**

January 2004

414 PAX; 13 STAFF; 292 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		17 JAN 2004
At sea		18-20 JAN 2004
Jouglá Point	466	20 JAN 2004
Waterboat Point, Graham Land	457	21 JAN 2004
Half Moon Island	377	22 JAN 2004
At sea		23-30 JAN 2004
Valparaíso, CHILE		31 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only



## Travel Dynamics International

Travel Dynamics International of New York, New York, conducted five cruises to the Antarctic during the 2003-2004 season, using the *M/V Orion*. Given below, for each cruise, is the port of origin, sites visited (with dates) and the return port.

### ***M/V Orion***

#### ***Cruise #4601***

December 2003/January 2004  
75 PAX; 7 STAFF; 60 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		22 DEC 2003
At sea		23-24 DEC 2003
Aitcho Islands	89	25 DEC 2003
Half Moon Island	86	25 DEC 2003
Cierva Cove	84	26 DEC 2003
Portal Point, Charlotte Bay	79	26 DEC 2003
Vernadsky Station	99	27 DEC 2003
Petermann Island	89	27 DEC 2003
Almirante Brown Station	80	28 DEC 2003
Goudier Island	86	28 DEC 2003
Jougla Point	81	28 DEC 2003
Whalers Bay, Deception Island	78	29 DEC 2003
Hannah Point, Livingston Island	76	29 DEC 2003
At sea		30-31 DEC 2003
Ushuaia, ARGENTINA		01 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise #4602**

January 2004

93 PAX; 8 STAFF; 60 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		01 JAN 2004
At sea		02-03 JAN 2004
Point Wild, Elephant Island	103*	04 JAN 2004
Cape Lookout, Elephant Island	102	04 JAN 2004
Penguin Island	107	05 JAN 2004
Arctowski Station	110	05 JAN 2004
Half Moon Island	105	06 JAN 2004
Goudier Island	99	07 JAN 2004
Jougla Point	99	07 JAN 2004
Almirante Brown Station	105	07 JAN 2004
Whalers Bay, Deception Island	90	08 JAN 2004
Hannah Point, Livingston Island	97	08 JAN 2004
At sea		09-10 JAN 2004
Ushuaia, ARGENTINA		11 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise #4603**

January 2004

83 PAX; 8 STAFF; 60 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		11 JAN 2004
At sea		12-13 JAN 2004
Gibbs Island	94*	14 JAN 2004
Aitcho Islands	99	15 JAN 2004
Half Moon Island	79	15 JAN 2004
Almirante Brown Station	96	16 JAN 2004
Goudier Island	95	16 JAN 2004
Jougla Point	95	16 JAN 2004

Whalers Bay, Deception Island	83	17 JAN 2004
Hannah Point, Livingston Island	81	17 JAN 2004
Penguin Island	79	18 JAN 2004
Arctowski Island	91	18 JAN 2004
At sea		19-20 JAN 2004
Ushuaia, ARGENTINA		21 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise #4604**

January 2004

92 PAX; 7 STAFF; 60 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		21 JAN 2004
At sea		22-23 JAN 2004
Cape Lookout, Elephant Island	100	24 JAN 2004
Paulet Island	102	25 JAN 2004
Aitcho Islands	101	26 JAN 2004
Half Moon Island	106	26 JAN 2004
Goudier Island	105	27 JAN 2004
Jougla Point	105	27 JAN 2004
Almirante Brown Station	105	27 JAN 2004
Whalers Bay, Deception Island	99	28 JAN 2004
At sea		29-30 JAN 2004
Ushuaia, ARGENTINA		31 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise #4605**

January/February 2004  
74 PAX; 7 STAFF; 60 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		31 JAN 2004
At sea		01-02 FEB 2004
Penguin Island	83	03 FEB 2004
Esperanza Station	82	04 FEB 2004
Rosamel Island	79*	04 FEB 2004
Half Moon Island	59	05 FEB 2004
Aitcho Islands	61	05 FEB 2004
Almirante Brown Station	84	06 FEB 2004
Palmer Station, Anvers Island	67	06 FEB 2004
Torgersen Island	37	06 FEB 2004
Whalers Bay, Deception Island	72	07 FEB 2004
Hannah Point, Livingston Island	67	07 FEB 2004
At sea		08-09 FEB 2004
Ushuaia, ARGENTINA		10 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

## Elegant Cruises and Tours

Elegant Cruises and Tours of Port Washington, New York, conducted five cruises to the Antarctic during the 2003-2004 season, using the *M/S Andrea*. Given below, for each cruise, is the port of origin, sites visited (with dates) and the return port.

### ***M/S Andrea***

#### ***Cruise #17***

November/December 2003  
64 PAX; 8 STAFF; 49 CREW

<b><u>Ports</u></b>	<b><u># PAX <sup>1</sup></u></b>	<b><u>Dates</u></b>
Ushuaia, ARGENTINA		24 NOV 2003
At sea		25-26 NOV 2003
Whalers Bay, Deception Island	72	27 NOV 2003
Neko Harbor, Andvord Bay	78	28 NOV 2003
Hannah Point, Livingston Island	62	29 NOV 2003
At sea		30 NOV 2003
South Georgia		01-04 DEC 2003
At sea		05 DEC 2003
Falkland Islands		06-07 DEC 2003
At sea		08 DEC 2003
Ushuaia, ARGENTINA		09 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise #18**

December 2003

53 PAX; 8 STAFF; 49 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		09 DEC 2003
At sea		10-11 DEC 2003
Aitcho Islands	69	12 DEC 2003
Half Moon Island	59	12 DEC 2003
Hannah Point, Livingston Island	60	13 DEC 2003
Cuerville Island	63	14 DEC 2003
Jougla Point	61	14 DEC 2003
Damoy Point, Wiencke Island	63	15 DEC 2003
Petermann Island	65	15 DEC 2003
Neko Harbor, Andvord Bay	64	15 DEC 2003
Whalers Bay, Deception Island	57	16 DEC 2003
At sea		17 DEC 2003
South Georgia		18-21 DEC 2003
At sea		22 DEC 2003
Falkland Islands		23-24 DEC 2003
At sea		25 DEC 2003
Ushuaia, ARGENTINA		26 DEC 2003

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise # 19 – Ham Radio Team for Peter 1<sup>st</sup> Island - Cancelled**

**Cruise #20**

January 2004

94 PAX; 8 STAFF; 50 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		11 JAN 2004
At sea		12-13 JAN 2004
Whalers Bay, Deception Island	98	14 JAN 2004
Dorian Bay, Wiencke Island	100	15 JAN 2004
Pleneau Island	96	15 JAN 2004
Jougla Point	78	15 JAN 2004
Damoy Point, Wiencke Island	100	15 JAN 2004
Neko Harbor, Andvord Bay	97	16 JAN 2004
Cuerverville Island	97	16 JAN 2004
Hannah Point, Livingston Island	100	17 JAN 2004
At sea		18 JAN 2004
Ushuaia, ARGENTINA		19 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise #21**

January 2004

92 PAX; 8 STAFF; 50 CREW

<u>Ports</u>	<u># PAX <sup>1</sup></u> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		19 JAN 2004
At sea		20 JAN 2004
Penguin Island	99	21 JAN 2004
Petermann Island	96	22 JAN 2004
Dorian Bay, Wiencke Island	98	22 JAN 2004
Neko Harbor, Andvord Bay	99	23 JAN 2004
Jougla Point	83	23 JAN 2004
Damoy Point, Wiencke Island	97	23 JAN 2004
Pendulum Cove, Deception Island	62	24 JAN 2004

Aitcho Islands	84	24 JAN 2004
Hannah Point, Livingston Island	70	25 JAN 2004
At sea		26 JAN 2004
Ushuaia, ARGENTINA		27 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

**Cruise #22**

January/February 2004  
49 PAX; 6 STAFF; 49 CREW

<u>Ports</u>	<u># PAX <sup>1</sup> Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		27 JAN 2004
At sea		28 JAN 2004
Penguin Island	56	29 JAN 2004
Brown Bluff, Tabarin Peninsula	56	30 JAN 2004
Hope Bay	55	30 JAN 2004
Neko Harbor, Andvord Bay	61	31 JAN 2004
Dorian Bay, Wiencke Island	51	31 JAN 2004
Damoy Point, Wiencke Island	56	01 FEB 2004
Jougla Point	56	01 FEB 2004
Petermann Island	54	01 FEB 2004
Whalers Bay, Deception Island	52	02 FEB 2004
Hannah Point, Livingston Island	54	02 FEB 2004
At sea		03 FEB 2004
South Georgia		04-08 FEB 2004
At sea		09 FEB 2004
Falkland Islands		10-11 FEB 2004
At sea		12 FEB 2004
Ushuaia, ARGENTINA		13 FEB 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only



## ResidenSea

ResidenSea of Miami, Florida, conducted one cruises to the Antarctic during the 2003-2004 season, using the *M/S Andrea*. Given below, for each cruise, is the port of origin, sites visited (with dates) and the return port.

### ***M/S The World***

#### **Cruise #1335**

December 2003/January 2004  
310 PAX; 9 STAFF; 246 CREW

<u>Ports</u>	<u># PAX</u> <sup>1</sup> <u>Landed</u>	<u>Dates</u>
Ushuaia, ARGENTINA		30 DEC 2003
At sea		31 DEC 2003
Point Wild, Elephant Island	300*	01 JAN 2004
At sea		02 JAN 2004
Whalers Bay, Deception Island	108	03 JAN 2004
Cuerverville Island	375	04 JAN 2004
Almirante Brown Station	382	05 JAN 2004
Goudier Island	307	06 JAN 2004
Jougla Point	77	06 JAN 2004
Palmer Station, Anvers Island	135	07 JAN 2004
Yalour Islands	264*	07 JAN 2004
At sea		08-09 JAN 2004
Ushuaia, ARGENTINA		10 JAN 2004

<sup>1</sup> = Includes passengers, staff and crew landed

\* = zodiac cruising only

## **Other**

### **SHIP BORNE**

Holland America Line of Seattle, Washington, operated the *M/S Amsterdam* for two cruises during the 2003-2004 season to the Antarctic Peninsula

#### ***Cruise #108***

January 8-29, 2004 (Embarked Rio de Janeiro, Brazil and Disembarked Valparaiso, Chile)

No passenger landings were made in the Antarctic Treaty Area  
1,314 PAX; 4 STAFF; 586 CREW

#### ***Cruise #109***

January 29 – February 19, 2004 (Embarked Valparaiso, Chile and Disembarked Rio de Janeiro, Brazil)

No passenger landings were made in the Antarctic Treaty Area  
1,299 PAX; 3 STAFF; 588 CREW

Princess Cruises of Santa Clarita, California, operated the *M/V Royal Princess* on a cruise around South America, during which it crossed into the Treaty Area approximately 72 hours for scenic cruising during December 29, 2003 to January 1, 2004. The vessel carried 1,022 passengers and 549 crew. No landings were made.

## **XI. Refuges**

---

*Section XI of the Modifications of Activities Planned for 2003-2004 notes changes to existing refuges and survival caches in the McMurdo area as well as deactivated camps and stations elsewhere on the continent.*

*The following changes to these facilities occurred during the 2003-2004 season.*

### **Tamseis Camp**

**Position:** 81° 39.14'S, 122° 35.27'E

Camp was completely removed and all remaining cargo was retrograded to McMurdo Station during the 2003-04 season.

### **Onset D Camp**

**Position:** 80° 45.65'S, 125° 47.60'W

Camp was completely removed and all remaining cargo was retrograded to McMurdo Station during the 2003-04 season.

### **Siple Dome Camp**

**Position:** 81°39'S, 149°04'E

Camp winterized for the season. One Jamesway remains standing. Equipment and cargo staged for retrograde.

### **Byrd Surface Camp**

**Position:** 80°01'S, 119°32'E

Camp winterized for the season. One Jamesway remains standing. Food, fuel, survival equipment are on site. All permanent structures removed from the camp.

## XII. Permits, Species Killed, Captured

*The following chart provides information on Antarctic Conservation Act (P.L. 95-541) Permits issued during 1 July 2003 to 30 June 2004.*

Permit #	Active Dates	Permit Activity	Location	Purpose
2004-002	22 Aug 03 – 28 Feb 2004	Entry into ASPA	Barwick Valley (ASPA #123); Cape Evans (ASPA #154); Cape Royds (ASPA #156); and, Discovery Hut, Hut Point (ASPA #157)	Photography of sites and geographic features to illustrate a geographically arranged gazetteer or “field guide”.
2004-003	01 Oct 03 – 14 Feb 2006	Entry into ASPA	Beaufort Island (ASPA #105); New College Valley, Cape Bird (ASPA #116); Cape Royds (ASPA #121); and Cape Crozier (ASPA #124)	To photograph affects on penguin colonies due to large icebergs, C-19 and B-15A and interview scientists in the field for NSF directed news and public outreach projects and releases.
2004-004	01 Nov 03 – 31 Jan 2004	Taking; Import into the USA	Taylor Valley	Collect small samples of bone and tissue from decayed remains of penguins and seals on the snow surface of Lake Bonney to establish the age of the animals and subsequent age of the lake ice cover.
2004-005	30 Dec 03 – 31 Jan 2004	Taking; Import into the USA	Antarctic Peninsula	Salvage dead seabirds and import to the US for use as educational materials at Cornell University.

Permit #	Active Dates	Permit Activity	Location	Purpose
2004-006	01 Oct 03 – 30 Sep 2008	Entry into ASPA	Historic Huts at Cape Evans (ASPA #154); Cape Royds (ASPA #156); Discovery Hut (ASPA #157); and Cape Adare (ASPA #158)	Visit to historic huts by U.S. Antarctic Program personnel for educational purposes.
2004-007	10 Nov 03 – 28 Feb 2004	Taking; Import into the USA	Igloo Spur, near Cape Crozier	Collect 10 samples of lichens suspected to be <i>Umbilicaria nylanderia</i> for proper identification by a lichen expert.
2004-008	01 Dec 03 – 31 Dec 2003	Entry into ASPA	Barwick Valley (ASPA #123)	Removal of seismic equipment, solar panels and all associated equipment which are currently within the ASPA boundaries after the boundaries were modified.
2004-009	15 Jan 04 – 31 Mar 2005	Take and Import into the U.S.	Antarctic waters	Collect biopsy samples of skin from Antarctic killer whales to determine taxonomic status of the three different morphotypes in Antarctic waters.
2004-010	16 Sep 03 – 28 Feb 2006	Taking; Entry into ASPA; and Import into the USA	McMurdo Sound region; Cape Crozier (ASPA #124); and Beaufort Island (ASPA #105)	Capture Emperor penguins to collect blood samples, attach microprocessor recorders to study their diving physiology. Census penguins at Cape Crozier and Beaufort Island.
2004-011	15 Dec 2003 – 28 Feb 2007	Entry to ASPA	Cape Crozier (ASPA #124)	To remove old camp debris and to periodically conduct environmental field camp audit to ensure research activities comply with environmental impact assessment requirements.
2004-012	20 Oct 03 – 31 Dec 2003	Taking; Introduce into Antarctica	Antarctic waters	Cultures of marine phytoplankton from stateside laboratory will be used in experiments onboard ship to study the feeding rates of Antarctic protistan grazers.

<b>Permit #</b>	<b>Active Dates</b>	<b>Permit Activity</b>	<b>Location</b>	<b>Purpose</b>
<b>2004-013</b>	01 Nov 03 – 01 Apr 2005	Take; Import into the U.S.	East Antarctica and Davis Station	Capture diseased seabirds and collect blood samples to confirm presence of bacterial, viral, and parasitic agents in Antarctic populations.
<b>2004-014</b>	24 Dec 03 – 30 Sep 2004	Entry into ASPA	Arrival Heights (ASPA #122)	To conduct monitoring studies of the earth's magnetic field and ionosphere, high latitude neutral mesospheric and thermospheric dynamics, UV monitoring, aerosol investigations, and pollution surveys.
<b>2004-016</b>	06 Nov 03 – 31 Jan 2007	Entry into ASPA	Beaufort Island (ASPA #105); Cape Crozier (ASPA #124)	To deploy and retrieve GPS receivers used to take repeat measurements of established monuments in order to detect motion of the bedrock due to tectonism or post-glacial rebound.
<b>2004-017</b>	05 Apr 03 – 30 Aug 2005	Entry into ASPA	Barwick Valley (ASPA #123)	To collect rock samples as an essential part of an on-going project constraining the terrestrial production rate of the Cosmogenic nuclide <sup>38</sup> Ar.
<b>2004-018</b>	15 Dec 03 – 31 Aug 2006	Taking; Entry into ASPA	Biscoe Point (ASPA #139)	To collect plants and seeds of Antarctic hairgrass and Antarctic pearlwort to study the effects of climate change on Antarctic plants and productivity of terrestrial ecosystems.
<b>2004-019</b>	05 Jan 04 – 31 Dec 2007	Entry into ASPA	Historic huts at Cape Evans (ASPA #154); Cape Royds (ASPA #156); Discovery Hut (ASPA #157); and Cape Adare (ASPA #158)	To investigate the biological and non-biological deterioration processes and develop long-term conservation plans for the future preservation of the historic huts.

<b>Permit #</b>	<b>Active Dates</b>	<b>Permit Activity</b>	<b>Location</b>	<b>Purpose</b>
<b>2005-001</b>	13 Oct 04 – 31 Jan 2005	Entry into ASPA	Cape Royds (ASPA #121)	To conduct diving operations offshore to study benthic invertebrates affected by the significant organic enrichment from runoff of guano from the Adelie rookery.

**ASPA** = Antarctic Specially Protected Area (formerly SPA's and SSSI's)



## XIII. Radioactive Materials

*Section XIII of the Modifications of Activities Planned for 2003-2004 lists any changes in the radioactive materials used during this time period and provides information regarding their form, nuclide, site, and specific use.*

### Add

<u>PROJECT</u>	<u>NUCLIDE</u>	<u>FORM</u>	<u>SITE</u>	<u>USE</u>
B-002-N	<sup>3</sup> H <sup>35</sup> S <sup>14</sup> C <sup>35</sup> S	<sup>3</sup> H Leucine <sup>35</sup> S Methionine <sup>14</sup> C DMSP <sup>35</sup> S DMSP	R/V Nathaniel B. Palmer	Impact of solar radiation and nutrients on biogeochemical cycling of DMSP and DMS in the Ross Sea
B-228-L	<sup>14</sup> C <sup>3</sup> H <sup>55</sup> Fe <sup>14</sup> C	<sup>14</sup> C Bicarbonate <sup>3</sup> H Leucine/thymidine <sup>55</sup> Fe Ferrous chloride <sup>14</sup> C Glucose	R/V Laurence M. Gould	Plankton community structure and iron distribution in the Southern Drake passage
I-177-M	<sup>109</sup> Cd <sup>137</sup> Cs	Sealed Source Sealed Source	Mt Moulton	Refining a 500-thousand year climate record from the Mt. Moulton blue ice field in West Antarctica

## Delete

<u>PROJECT</u>	<u>NUCLIDE</u>	<u>FORM</u>	<u>SITE</u>	<u>USE</u>
B-002-N	<sup>3</sup> H <sup>35</sup> S <sup>14</sup> C	<sup>3</sup> H Leucine <sup>35</sup> S Methionine <sup>14</sup> C DMSO	R/V <i>Nathaniel B. Palmer</i>	Impact of solar radiation and nutrients on biogeochemical cycling of DMSP and DMS in the Ross Sea
B-029-M	<sup>35</sup> S <sup>14</sup> C	<sup>35</sup> S – Amino Acid <sup>14</sup> C – Phenylalanine	McMurdo Station	Geonomic networks for cold-adaptation in embryos of marine polar invertebrates
B-228-L	<sup>14</sup> C <sup>3</sup> H <sup>55</sup> Fe	<sup>14</sup> C Bicarbonate <sup>3</sup> H Leucine/thymidine <sup>55</sup> Fe sealed source	R/V <i>Laurence M. Gould</i>	Plankton community structure and iron distribution in the Southern Drake passage
B-423-M	<sup>14</sup> C	<sup>14</sup> C – Sodium Bicarbonate <sup>14</sup> C – Sucrose	McMurdo Station	McMurdo Dry Valleys LTER

## XIV. Research Rockets

---

*Section XIV of the Modifications of Activities Planned for  
2003-2004 reports any deviations from the original plans regarding  
the use of research rockets in Antarctica.*

*No significant changes are noted.*

## **XV. Oceanography- Government**

---

*Section XV of the Modifications of Activities Planned for 2003-2004 presents final information regarding United States Antarctic Program sponsored oceanographic expeditions during the 2003-2004 season.*

**Note:** For actual tracks of the Research Vessels *Nathaniel B. Palmer* and *Laurence M. Gould* please see Attachment C, Cruise Tracks.

### ***R/V Nathaniel B. Palmer***

The *R/V Nathaniel B. Palmer* made ten science cruises during the period of 30 March 2003 through 31 March 2004. Cruises are:

#### **Cruise NBP03-04**

23 May – 11 June 2003 Northbound transit to Alaska

*Late Cretaceous and Cenozoic Reconstructions of the Southwest Pacific*

GO-071-O (Steve Cande/Joann Stock)

#### **Cruise NBP03-04A**

05 July – 18 August 2003 Arctic Cruise

*Western Arctic Shelf-Basin Interaction*

O-287-N 7 (Jim Swift)

**Cruise NBP03-04B**

22 August – 08 September 2003 Southbound Transit to HI

*Late Cretaceous and Cenozoic Reconstructions of the Southwest Pacific*

GO-071-O (Steve Cande/Joann Stock)

*Production Observation Through Another Translatitudinal Oceanic Expedition (POTATOE)*

B-200-N (Wade Jeffrey)

**Cruise NBP03-04C**

14 September – 08 October 2003

*Late Cretaceous and Cenozoic Reconstructions of the Southwest Pacific*

GO-071-O (Steve Cande/Joann Stock)

*Production Observation Through Another Translatitudinal Oceanic Expedition (POTATOE)*

B-200-N (Wade Jeffrey)

**Cruise NBP03-04D**

09 October – 14 October 2003

*Late Cretaceous and Cenozoic Reconstructions of the Southwest Pacific*

GO-071-O (Steve Cande/Joann Stock)

*Production Observation Through Another Translatitudinal Oceanic Expedition (POTATOE)*

B-200-N (Wade Jeffrey)

**Cruise NBP03-05**

27 October – 19 November 2003 (Aborted due to major engine failures on 03 November)

*Interactive Effects of UV Radiation and Vertical Mixing on Phytoplankton and Bacterioplankton in the Ross Sea*

B-203-N (Pat Neale)

23 November – 12 December 2003

Vessel off hire for main engine repairs

**Cruise NBP03-05A**

18 December 2003 – 01 January 2004

*Interannual Variability in the Antarctic-Ross Sea (IVARS): Nutrients and Seasonal Production*

B-047-N (Walker Smith)

**Cruise NBP03-06**

05 January – 17 January 2004

*Collaborative Research: Antarctic Cretaceous-Cenozoic Climate, Glaciation, and Tectonics: Site surveys for drilling from the edge of the Ross Ice Shelf*

GO-152-N (Lou Bartek/Bruce Luyendyk)

**Cruise NBP04-01**

19 January – 18 February 2004

*Neotectonic Structure of Terror Rift, Western Ross Sea*

G-099-N (Larry Lawver/Terry Wilson)

**Cruise NBP04-02**

23 February – 10 April 2004

ANSLOPE III Collaborative Research: *Cross-Slope Exchanges at the Antarctic Slope Front*

O-215-N (Arnold Gordon)

**Biology & Medicine**

<b>Principal Investigator</b>	<b>Event</b>	<b>Institution</b>
Jeffrey	B-200-N	University of West Florida
Neal	B-203-N	Smithsonian Institution

**Oceans and Climate**

<b>Principal Investigator</b>	<b>Event</b>	<b>Institution</b>
Swift	O-287-N	Scripps Institution of Oceanography.
Gordon	O-215-N	Columbia University, LDEO

**Geology & Geophysics**

<b>Principal Investigator</b>	<b>Event</b>	<b>Institution</b>
Stock	G-071-0	California Institute of Technology
Luyendyk	G-152-N	University of California, Santa Barbara
Wilson	G-099-N	Ohio State University

## **R/V Laurence M. Gould**

The R/V *Laurence M. Gould* made twelve science cruises and passenger transports to the Antarctic Peninsula during the period of 31 March 2003 through 1 April 2004.

### **Cruise LMG03-04**

05 April – 07 May 2003

*Structure, function and expression of tubulins, globins, and microtubule-dependent motors from cold-adapted Antarctic fishes*

B-037-L (Bill Detrich)

*Cold body temperature as an evolutionary shaping force in the physiology of Antarctic fishes*

B-036-L (Bruce Sidell)

*CTD operations and mooring recovery*

Science of Opportunity (Martin Visbeck)

### **Cruise LMG03-04A**

10 May- 05 June 2003

*Structure, function and expression of tubulins, globins, and microtubule-dependent motors from cold-adapted Antarctic fishes*

B-037-L (Bill Detrich)

*Cold body temperature as an evolutionary shaping force in the physiology of Antarctic fishes*

B-036-L (Bruce Sidell)

### **Cruise LMG03-05**



16 June - 28 June 2003

Palmer Station Shuttle

29 June – 15 August 2003

Maintenance Period at Punta Arenas, Chile

**Cruise LMG03-05A**

16 August – 03 September 2003

Palmer Station Shuttle

*Advanced Microwave Scanning Radiometer (AMSR) Sea Ice Validation during the L.M.  
GOULD Traverse to Antarctica*

O-309-L (Konrad Steffen)

**Open Period for Maintenance**

07 – 20 September 2003

**Cruise LMG03-06**

22 September – 05 October 2003

Palmer Station Shuttle

**Cruise LMG03-07**

10 October - 23 October 2003

Palmer Station Shuttle, COPA Field Camp put-in

**Cruise LMG03-07A**

23 October - 06 November 2003

Open Period

**Cruise LMG03-08**

07 November – 19 November 2003

*Dynamic Similarity or Size Proportionality: Adaptations of a Polar Copepod*

B-285-L (Jeanette Yen)

*Long-Term Data Collection at Select Antarctic Peninsula Visitor Sites*

B-086-E (Ronald Naveen)

**Cruise LMG03-09**

23 November – 29 December 2003

*Global Climate Change and the Evolutionary Ecology of Antarctic Mollusks in the Late Eocene*

G-065-E (Daniel Blake)

*Evolution and Biogeography of Late Cretaceous Vertebrates from the James Ross Basin, Antarctic Peninsula*

G-061-E (Judd Case)

*Dynamics of Predator-Prey Behavior in the Antarctic Ocean*

B-023-L (Richard Veit)

**Cruise LMG04-01**

12 February – 24 March 2004

*Long-Term Ecological Research on the Antarctic Marine Ecosystem: An Ice-Dominated Environment (LTER)*

BP-013-O ( Bill Fraser)

BP-016-O (Maria Vernet)

BP-021-O (Doug Martinson)

BP-028-O (Langdon Quetin, Robin Ross)

BP-032-O (Ray Smith)

BP-045-O (Hugh Ducklow)

**Cruise LMG04-02**

12 February - 24 March 2004

*Plankton community structure and iron distribution in the southern Drake Passage*

B-228-L (Greg Mitchell)

B-248-L (Meng Zhou)

B-225-L (Christopher Measures)

**Cruise LMG04-03**

28 March – 12 April 2004

*Mysticete whale acoustic census in the GLOBEC west Antarctic project area*

B-239-L (John Hildebrand)

## **Biology & Medicine**

<b>Principal Investigator</b>	<b>I.D. No.</b>	<b>Institution</b>
Detrich	B-037-L	Northeastern University
Siddell	B-036-L	University of Maine
Yen	B-285-E/L	Georgia Institute of Technology
Naveen	B-086-E	Oceanites Inc., Chevy Chase, Maryland
Veit	B-023-L	City University of New York
Fraser	B-013-L/P	Polar Oceans Research Group
Vernet	B-016-L/P	Scripps Institution of Oceanography
Martinson	B-021-L	Columbia University, LDEO
Quetin/Ross	B-028-L/P	University of California, Santa Barbara
Smith	B-032-L/P	University of California, Santa Barbara
Ducklow	B-045-L/P	VIMS, The College of William and Mary
Mitchell	B-228-L	University of Hawaii, Manoa
Zhou	B-248-L	University of Massachusetts
Measures	B-225-L	University of Hawaii, Manoa
Hildebrand	B-239-L	Scripps Institution of Oceanography

## **Geology and Geophysics**

<b>Principal Investigator</b>	<b>I.D. No.</b>	<b>Institution</b>
Blake	G-065-E	University of Illinois, Urbana
Case	G-061-E	St. Mary's College of California

## **Ocean & Climate**

<b>Principal Investigator</b>	<b>I.D. No.</b>	<b>Institution</b>
Steffen	O-309-L	University of Colorado, Boulder

## XVI. Visiting Expeditions

---

*Section XVI of the Modifications of the United States Antarctic Activities Planned for 2003-2004 provides information on expeditions visiting U.S. stations during the 2003-2004 austral summer.*

### McMurdo Station

<u>Date of Visit</u>	<u>Duration of Visit</u>	<u>Number of Visitors</u>	<u>Group Name or # of Vessel or Aircraft</u>	<u>Purpose of Visit</u>
15 Jan 2004	5 hours	85	<i>Kapitan Khlebnikov</i>	Tourist visit
20 Jan 2004	5 hours	45	<i>Akademic Shokalskiy</i>	Tourist visit
7 Feb 2004	5 hours	95	<i>Kapitan Khlebnikov</i>	Tourist visit
19 Feb 2004	5 hours	45	<i>Akademic Shokalskiy</i>	Tourist visit

### Amundsen-Scott South Pole Station

<u>Date of Visit</u>	<u>Duration Of Visit</u>	<u>Number of Visitors</u>	<u>Group Name or # of Vessel or Aircraft</u>	<u>Purpose of Visit</u>
4 Dec 2003	1.5 hours	2	AL&E Twin Otter CFASG	Skier drop-off
4 Dec 2003	28 hours	3	AL&E	Tourist Visit - ski expedition departure

<u>Date of Visit</u>	<u>Duration Of Visit</u>	<u>Number of Visitors</u>	<u>Group Name or # of Vessel or Aircraft</u>	<u>Purpose of Visit</u>
17 Dec 2003	22 hours	2	Helo N44EA – Pole to Pole helicopter expedition	Tourist Visit
30 Dec 2003	24 hours	4	AL&E	Tourist Visit - ski expedition arrival
31 Dec 2003	2 hours	2	AL&E Twin Otter CFUGT	Skier pick-up
1 Jan 2004	18 days (432 hours)	1	AL&E – Fiona Thornewill solo ski	Tourist Visit
13 Jan 2004	20 hours	7	AL&E Twin Otter CFASG	Tourist Visit and skier pick-up
13 Jan 2004	40 hours	7	AL&E Twin Otter CFUGT – Pole to Pole Expedition	Tourist Visit
13 Jan 2004	58 hours	5	AL&E - Korean Ski Expedition	Tourist Visit
14 Jan 2004	24 hours	1	AL&E – Rosie Stancer solo ski	Tourist Visit
15 Jan 2004	1 hour	2	AL&E Twin Otter CFASG	Skier pick-up
21 Jan 2004	20 hours	5	AL&E ski expedition – Matty McNair	Tourist Visit
22 Jan 2004	3 hours	4	AL&E Twin Otter CFASG	Tourist Visit and Skier pick-up
28 Jan 2004	26 hours	5	AL&E ski expedition – Michael Thornewill	Tourist Visit
29 Jan 2004	1 hour	2	AL&E Twin Otter CFASG	Skier pick-up
29 Jan 2004	3 hours	4	AL&E Twin Otter CFUGT	Tourist Visit and Skier pick-up
29 Jan 2004	2 hours	2	AL&E ski expedition – Simon Murray & Pen Hadow	Tourist Visit

## Palmer Station

Date of Visit	Duration of Visit	Number of Visitors	Group Name Or # Of Vessel Or Aircraft	Purpose of Visit
4 Dec 03	5.0 hours	130	<i>M/S Clipper Adventurer</i>	Tourist
28 Dec 03	5.5 hours	10	<i>S/Y Sarah W. Vorwerk</i>	Yacht
7 Jan 04	5.0 hours	124	<i>M/V The World</i>	Tourist
12 Jan 04	6.0 hours	105	<i>Akademik Sergey Vavilov</i>	Tourist
13 Jan 04	2.0 hours	5	<i>S/Y Philos</i>	Yacht
13 Jan 04	2.0 hours	3	<i>S/Y White Haze</i>	Yacht
14 Jan 04	5.5 hours	121	<i>M/S Endeavour</i>	Tourist
15 Jan 04	2.0 hours	6	<i>S/Y Double Magic</i>	Yacht
19 Jan 04	5.0 hours	92	<i>M/S Polar Star</i>	Tourist
21 Jan 04	4.0 hours	125	<i>M/S Clipper Adventurer</i>	Tourist
24 Jan 04	2.5 hours	13	<i>S/Y Vaihere</i>	Yacht
26 Jan 04	5.5 hours	121	<i>M/S Endeavour</i>	Tourist
26 Jan 04	2.5 hours	10	<i>S/Y Pen Duick Vi</i>	Yacht
26 Jan 04	2.5 hours	14	<i>S/Y Croix St Paul Ii</i>	Yacht
29 Jan 04	3.0 hours	4	<i>S/Y Alibi</i>	Yacht
3 Feb 04	3.0 hours	11	<i>Las Palmas</i>	Spanish Navy

<b>Date of Visit</b>	<b>Duration of Visit</b>	<b>Number of Visitors</b>	<b>Group Name Or # Of Vessel Or Aircraft</b>	<b>Purpose of Visit</b>
6 Feb 04	3.5 hours	85	<i>M/S Orion</i>	Tourist
7 Feb 04	4.0 hours	0	<i>Ss Amsterdam</i>	Tourist
14 Feb 04	5.0 hours	83	<i>M/S Endeavour</i>	Tourist
18 Feb 04	3.0 hours	13	<i>S/Y Vaibere</i>	Yacht
22 Feb 04	3.0 hours	4	<i>S/Y Spirit Of Sydney</i>	Yacht
24 Feb 04	5.5 hours	10	<i>S/Y Sarah W. Vorwerk</i>	Yacht
24 Feb 04	2.5 hours	59	<i>M/S Orion</i>	Tourist