

General Program Overview:

1. Scientific objectives and activities:

The primary objective of this cruise is a 10 day AUV search of the El Faro's Voyage Data Recorder (VDR). AUV Sentry will be the primary piece of equipment. If warranted the Alvin observation vehicle will be deployed for video feed. Telepresence supported by URI will be utilized for direct ship to shore communications and data transfer.

Activities:

- Sentry survey operations
- Ship acoustics multibeam and bathymetry surveys
- Alvin Observation vehicle
- Telepresence

2. Identify PIs participating in this cruise:

Morgan Turell (NTSB)

3. Identify the at-sea Chief Scientist:

Eric Stolzenberg

4. Identify operating area (See cruise synopsis for details):

- General search area centered around 23°23'30.00"N, 73°54'30.00"W (~ 6km search radius).
- Depth range: ~5,000m

5. **Voyage Dates and Leg #:** April 15 – May 5 // AT33-04
Start Port: Bridgetown Barbados
End Port: Woods Hole, MA
Mobilization: Feb 14th. Telepresence team may begin set up April 12 afternoon (ETA tbd into Barbados).
Move aboard date: April 14
Demobilization @ WHOI, May 5 and May 6.
Science moves off ship May 6

6. **Science party (size)-**
Science = 5
 - 1) Eric Stolzenberg, NTSB
 - 2) Sean Payne, NTSB
 - 3) Doug Mansell, NTSB
 - 4) Dennis O'Meara, Tote Services
 - 5) Evan Reger, USCGSentry = 5
Alvin =2

Pre-cruise and Administrative:

1. **Diplomatic clearance requirements for operations in EEZs:**
From US State Dept. Feb 23: *“The Bahamian government will need to authorize RV Atlantis to enter Bahamian waters and conduct the search, just as it did a couple of months ago for the Navy vessel that located the El Faro. Post’s Office of Defense Cooperation will take the lead on this, and will send a Diplomatic Note requesting authorization.”*

2. **Financial responsibility for port logistical costs:**

3. **Personnel forms (Passports, Driver’s License, Visas, Entry Fees)**
Personnel forms are req. 1 month prior to cruise.
We will need list for foreign collaborators if any.
<http://www.whoi.edu/page.do?pid=8232>

4. **Any Special Food Requirements (Gluten Free, Vegetarian, Kosher, etc.)**
5. **Berthing Plan - 1 week prior to mobilization;**
<http://www.whoi.edu/page.do?pid=822>
6. **Lab Layout plan:**
<http://www.whoi.edu/main/ships/atlantis/lab-science-spaces>

RV ATLANTIS Instrumentation & Technician Support **[Shipboard Installed Scientific Equipment]**

1. **General Duties of Marine Technicians (SSSG techs)**
Scheduled SSSG techs for this cruise are *Catie Graver and Allison Heater*
Each tech works a 12 hr shift. Techs will work with entire science party for communication support other shipboard scientific instruments.
2. **WHOI general use equipment required for cruise [Installed Scientific Equipment]:**
 - A) 12kHz & 3.5 kHz Bathy
 - B) ADCP 75 kHz
 - C) Sippican XBT's ?
 - D) Multibeam EM 122 – WILL NEED to generate maps
 - E) High Seas Net – ship to shore data transfer req.
 - F) Navigation position / heading readouts.
 - G) Shipboard USBL sonardyne
 - H) Sample storage –, 3.2 c/ft -070 freezers, 25 c/ft -75 freezer (Walk Ins?)
 - I) AUV Sentry (see below)
 - J) Alvin observation vehicle (Bob Waters, Bruce Strickrott)
3. **Science Party Supplied Equipment:**
 - Telepresence – URI, Dwight Coleman

- Other

Scientific Instrumentation for AUV SENTRY:

(It is important to communicate with Carl Kaiser directly and to Refer to the Sentry Fact Sheet published on the WHOI website: <http://www.whoi.edu/page.do?pid=38095>)

Carl Kaiser Expedition Leader

General work description & brief operations description or comments;

AUV Sentry should have magnetometer and imaging capability and sidescan and multibeam sonar and Eh sensor (NOAA ORP sensor) and CTD

1. Sentry will need to generate maps of area(s): YES
2. Science will need to have Sentry generate maps: YES
3. USBL Navigation: YES (ship)
4. Doppler/GPS Nav: YES
5. Digital still camera: YES
6. Other

Ship [Other Requirements] [Shipboard Equipment/Nav]

1. Science / Ship Operations

A. Instrument Deployment / Recovery Procedures:

Sentry ops

B. Vans: 2 SENTRY vans (1 on Main deck, 1 on 01 deck).

C. Night Operations: **YES. Sentry**

D. Deck Safety – Safety Shoes (X), Experience (X)

E. Science personnel have Training/Experience to operate/deploy gear.

F. Lab Safety – PPE (), Lab Training () Spill Kits ()

G. Hazardous Material- Please Fill out HAZMAT INVENTORY FORM

[Weight, bulk, chemical, pres.] Types?

- Gas - **none**
- Chems - **none**
- Batteries - **Sentry**

<http://www.whoi.edu/sbl/liteSite.do?litesiteid=7092&articleId=10875>

- Chemicals & Compressed Gases?
- Spill Kits
- Loading and waste removal logistics.

I. Isotope Use [Isotope Use Approval] – **none req.**

<http://ehs.whoi.edu/ehs/DesktopDefault.aspx?tabindex=2&tabid=5&itemID=543>

2. Policies: (speed, departure/arrival times, moving aboard, etc
3. Ship Navigation
4. Communication (voice, fax, e-mail)
5. Equipment
 - a. Cranes (**X**)
 - b. Oceanographic winches: Hydro (), Trawl (),
 - c. CTD ()
 - d. Electrical power (**X**)

Cruise Logistics

1. Shipping gear to and from vessel.

SHIPPING ADDRESS FOR ALL PACKAGES FOR BARBADOS

NOTE: WHOI contacts should be copied on all communications with Agents. Please send shipping information for all equipment and supplies to the Agent and to all WHOI contacts

TO: Master R/V Atlantis

Attn: Scientist's Name - AT33-04

c/o Massy Trading, A division of Massy Distribution (Barbados) Ltd.

Shipping Division

Brandons Complex

Brandons

St. Michael

BARBADOS

Phone: (246) 430-4809; (246) 430-4825

Primary Contact: Anthony Oliver, Operations Coordinator*

Email Address: <mailto:anthony.oliver@massygroup.com>

Tel. no. (246) 430-4809

Cell no. (246) 231-5382

Fax: (246) 431-0878 or (246) 431-0051

*Note: All requests and correspondence should be sent to **Anthony Oliver** at the email address above with copies to Arlin Kellman and David Priddee.

Contact: Arlin Kellman, Manager of the Shipping Division

Email Address: <mailto:arlin.kellman@massygroup.com>

Tel. No. (246) 430-4804

Cell no. (246) 230-4353

Fax: (246) 431-0878 or (246) 431-0051

Contact: David Priddee, Operations Manager

Email Address: <mailto:david.priddee@massygroup.com>

Tel. no. (246) 430-4819

Cell no. (246) 231-5348

Fax: (246) 431-0878 or (246) 431-0051
Note: Agent and Eric Benway should be copied on all communications. It is requested that shipment information of any equipment be communicated to the Agent and WHOI contacts.

Post-Cruise Responsibilities

1. Actions departing ship.
 - a. **CLEAN** your work areas, cabins and heads before disembarking.
 - b. **LABEL** all gear.

Please send Eric Benway all Air Way Bills (AWB's) for items being shipped to Barbados. This is CRITICAL FOR US CUSTOMS PURPOSES on arrival into WHOI.

2. UNOLS cruise evaluation [Chief Scientist & Master] – **UNOLS PCA.**
3. Reports to foreign government/State Department [required for work in EEZs]
N/A
4. Data delivery [shipboard underway data] – SENTRY OPS and Shipboard underway data (?)
5. Data archiving policy:

All data on a WHOI Cruise Data Distribution (which includes all underway data) will, by default be considered publicly available once a copy of it has been delivered to the chief scientist at the end of the cruise. Please review the Cruise Assignment of Data Access Protection