

HAWAII UNDERSEA RESEARCH LABORATORY  
QUICK LOOK REPORT MISSION NO. P5-236

## MISSION STATUS

Location: Pensacola Seamount  
Mission Date: August 21, 1993  
Maximum Depth: 1550 meters  
Project Title: Effects of limited dispersal on population genetics of seamount benthos  
Principal Investigator: Lauren Mullineaux, Scott France  
Address: Woods Hole Oceanographic Institution  
Biology Department  
Woods Hole, MA 02543  
Phone: (508) 457-2000  
Observers: Scott France  
Addresses: Same as above

Scientific Data Acquired : Prepare an abstract outlining your objectives, techniques, findings, etc.

This dive was the second in a series of 4 dives to 3 seamounts SW of Hawaii to collect deep-sea benthos for use in population genetic studies. This was the first ever dive onto Pensacola Seamount and thus in addition to collecting samples for genetic study, we wanted to document as much of the fauna and terrain as possible using video and still camera photography. Samples for genetics were collected using specifically designed nets (see Quick Look Report Mission No. P5-235). We also collected several rock samples for analysis. Sampling was done between 1500-1350 m depth. Bottom water was relatively murky, and the bottom was primarily sediment interspersed around talus and cobblestones, with rocky outcrops and steep rocky walls between 1400-1350 m. We collected 8 coral specimens and a few associated ophiuroids, one anemone, and a crinoid.

## MISSION EVALUATION:

## Limitations, failures, or operational problems noted:

Poor bathymetric charts of this seamount required a topographic survey prior to the dive. However, poorly functioning fathometer on R/V KILA rendered this task extremely difficult. Sonar on sub was not operational and thus we were not able to locate bottom efficiently. Combined, these led to a 3-hour time between launch and arrival on bottom, severely limiting collection time.

## Recommendations for corrective action or improvement:

Need improved method (equipment) for charting bottom topography/depth.

In your opinion, did the mission essentially achieve its purpose? Compare actual work accomplished with the work that was expected to be accomplished.

Bottom time was very limited and thus we were not able to sample as many individuals as was desired; however, the samples we did collect will be valuable to our research.

## List specimens or samples collected on the mission.

3 individuals - ?Lepidisis olapa  
1 individual - beige-white bamboo coral  
3 individuals - ?Narella bowersi  
1 individual - Venus fly trap anemone  
1 individual - crinoid  
1 individual - purple octocoral

## DATA RELEASE

Data may be retained by the project leader for up to 2 years after the mission date with the following exception. NOAA may request to use photos for publication or publicity purposes at any time.

Fill in the appropriate statement below and sign this form.

I hereby release the data archived by HURL for public consumption following mission Effects of limited dispersal on population genetics of seamount benthos (project title) held on August 21, 1993 (date) in the following way:

- a. CTD data by August 21, 1993 (date)
- b. voice transcripts, video, and still camera film by August 21, 1995 (date)
- c. other August 21, 1993 (date)
- d. I will give my written consent to individuals wishing to use these data prior to the above dates depending on the nature of the request(s).

---

Principal Investigator