HAWAII UNDERSEA RESEARCH LABORATORY

QUICK LOOK REPORT MISSION NO. P5-216

MISSION STATUS

Location:

Cross Seamount (18044.962N

158⁰ 14.478W)

Mission Date:

September 4, 1992

Maximum Depth:

1050 meters

Project Title:

Microbial Geochemistry of Ferromanganese Crust

Project Leader:

Jim Cowen

Address:

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Dept. of Oceanography University of Hawaii Honolulu, HI 96822

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Observers:

J. Culp, M. Bertram

Address:

Same

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956-2135

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

Our objectives were to retrieve the experimental rack (#8) placed at 975 meters 4 weeks ago on dive P5-205. This rack was to be replaced by rack #10 (and a fresh transponder). Using the sediment scoopers we planned to obtain samples of surface sediments, pick up several FeMn encrusted rocks, take water samples using Niskin bottles, at 975 meters (on the bottom) and in the water column at 600 m. A fluorescent dye, encapsulated in plastic scintillation vials, rubberbanded and taped to a line between a float and weight, was to be used for measuring current speed. A line marked off with 12 inch increments was used to determine the distance the dye went during some period of time after the claw smashed the capsules. Animals were to be collected in the plexi-box tied to the basket.

MISSION EVALUATION:

Limitations, failures, or operational problems noted:

Maneuverability was minimal after the tilt on the thrusters broke. Luckily, we were near the experimental site. Pilot was able to maneuver enough to get the job done.

Still camera was not available.

Recommendations for corrective action or improvement:

None.

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

Yes, we accomplished most of the tasks as described on the previous page. We were unable to survey the surrounding areas because of the broken thruster tilt.

List specimens or samples collected on the mission.

- water samples @ 975 m and 600 m water depth.
- 4 FeMn rocks @ 975 m.
- Surface sediment.
- 1 experimental rack with transponder was retrieved.

Animals
ophioroids
crinoids
hard Corals - white Corallium? red Corallium?
soft coral - Narella bowersi?

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 Microbial Geochemistry of FeMn Crusts P5-216 (project title) held on September 4, 1992 (date) in the following way:

- a. CTD data by September 1994 (date)
- b. voice transcripts, video, and still camera film by <u>September 1994</u> (date)
- c. other <u>September 1994</u> (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).

Project	Leader	