

HAWAII UNDERSEA RESEARCH LABORATORY
QUICK LOOK REPORT MISSION NO. P5-061

MISSION STATUS

Location: Alenuihaha Channel - Maui slope
Mission Date: 18 May 1988
Maximum Depth: 1015 m
Project Title: Hawaii Deep Water Cable Route Survey
Project Leader: Dr. Alexander Malahoff
Address: University of Hawaii
Dept. of Oceanography
1000 Pope Road, MSB 319
Honolulu, Hawaii 96822
Phone: 948-6802
Observers: Kimo Zaiger, Dr. Ed Noda
Address: University of Hawaii
Department of Oceanography
1000 Pope Road, MSB 318
Honolulu, Hawaii 96822

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

Objective: This dive was to survey the portion of the proposed cable route located between 1050 m and 900 m depth on the Maui slope. This is the area in which the cable route has to make a 90 degree turn to the east in order to avoid rough features inferred from side scan sonar data.

Procedure: The cable route and rough features of engineering interest were verified and plotted by visual observations from the submersible PISCES V. Real time navigational positions were received from a surface support vessel which used Datasonics long baseline and Edo Western short baseline systems to track the submersible,

and ranging data from shore-based Falcon mini-ranger transmitters to calculate the submersible's position with relatively high precision.

Findings: The proposed cable route was verified to be suitable with the substrate made up predominantly of sandy sediments with low roughness factor. There seems to be more leeway in the route path than the 200 meters minimum width just upslope from the 90 degree turn which was depicted on the side scan based working charts. In that location, the sandy bottom extends laterally at least another 100 meters in width. The rough features from side scan data were found to be mixtures of reef terraces, reef rock and basalt talus. Limitations, failures, or operational problems noted:

MISSION EVALUATION:

Limitations, failures, or operational problems noted:

None

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. Survey produced usable data and verified that the proposed cable route is practicable in this area.

List specimens or samples collected on the mission.

Cemented sand and shell fragments from Maui slope terrace at approximately 900 meters.

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 "HDWC ROUTE SURVEY"
(project title) held on MAY 18, 1988 (date) in the following way:

- a. CTD data by May, 1989 (date)
- b. voice transcripts, video, and still camera film by May, 1989 (date)
- c. other May, 1989 (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