P6 Leg 2 Week 1 Report

1400 local time 26 August 2017 32 30' S 145 09' W, winds 30-35 kn En route to Stn 149

On August 20 2017 at 1100 hrs we left the dock in Papeete, Tahiti, one of the numerous islands of French Polynesia, and began Leg 2 of the 2017 occupation of the P06 hydrographic line. Steaming nearly due south towards the 32.5 S line over the course of several days gave us time to prepare, carry out training exercises for the CTD watch and other newcomers, and for NASA group to set up their instruments. On 23 Aug around noon we began a test station with the deployment of the NASA profilers, which are supplemental casts for Leg 2. Several hand-held optical profiles were achieved, both for the data and for practice with the new ship operations needed to position the fantail appropriately in relation to the sun for best data collection, all of which takes time. A CTD cast to 2000m depth was carried out and all bottles tripped to provide "clean" water from mid-depth for analytical calibrations and to give students their first experience with the CTD console and winch operations.

The following day our first station (144) on the line was completed. Due to weather and medevac on Leg 1 we started several degrees west of the initial plan. All water sample operations went well and sample cops realized their needed authority. One of the two upward-pointed Chipods units showed some problems, and the LADCP lost its configuration file. The LADCP file was soon rescued and the instrument has been performing well.

Weather picked up Friday 25 Aug, resulting in wash through the Baltic Room (where CTD operations take place) halfway through Stn 147 and a rushed end to the cast. Operations were stalled overnight due to waves entering the Baltic room but resumed at first light, with somewhat reduced seas, thanks to the positive attitude by our crew and Marine Techs.

We are very well taken care of by the technical support group and crew of the N. B. Palmer. The food is excellent and our only desire is to see the work continue and the line progress to the east.

Kevin Speer (Chief Scientist) Lena Schulze (co-Chief Scientist)