GO-SHIP I6S: 20 April to 1 May 2019, currently somewhere near 51°S 30°E

Dear Colleagues and Friends,

Since April 20, in one way or another, we have worked progressively along the main I6S meridional line. At the time of this writing work has been halted for about 40 hours, including the premature termination of Sta. 44. We remain waiting for recommended working conditions with swells smaller than 3-5 m. Almost twice as long, almost 3 full days, was the work delay we experienced during 25-28 April due to the passage of a large cyclone.

During the workable periods of time we managed to maintain a commendable pace. A total of 27 stations (Sta. 16-43) were occupied in the Enderby Abyssal Plain, all located at water depths greater than 5000 m, at an average time of 3.9 hours per station. All of the 30-nm transits between stations were done at ship speeds exceeding 11 knots.

Trained students assisted in the overboard deployment of more surface drifters, ARGO and SOCCOM floats. Yesterday, the successful ~4-hr deployment of one glider was carried out from a zodiac, with the joyful assistance and training of a graduate student and the Co-Chief Scientist. A second glider was more spectacularly launched with the Thompson's crane.

Preliminary inspection of high-quality data acquired during this cruise indicates the regional distribution of the multiple frontal structure of the Antarctic Circumpolar Current. However, assuming no further weather delays, we only have nine full days to continue work across its northern fringes and the Agulhas Current Retroflection system. Accordingly, the original plan to occupy 48 more stations (91 in total) by the end of our cruise will be modified. An alternative plan of thinned out stations for much of the remaining portion of the cruise is envisioned.

Best regards, Alex Orsi Chief Scientist 106S-2019





