



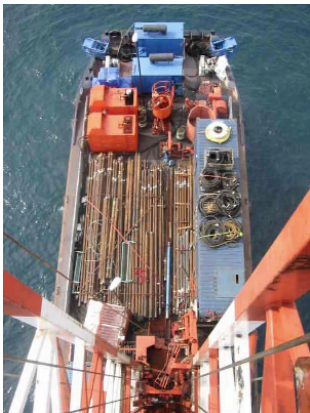
Lake Malawi Project

Location: Lake Malawi, Africa
Client: University of Rhode Island (USA) & University of Syracuse (USA)
Project aim: Recovery of a series of continuous sediment cores for palaeoclimate studies

ADPS role: Provide advice for the purchase and installation of a complete DP System
Provide vessel management and specialist crew for the project

ADPS concerns: Remote location and difficulty in obtaining spares
Conversion of dumb barge to working vessel to ABS standards
Procurement of DP System, thrusters and reference systems
Risk assessments
LSA, FFE, ISM, implementation
DP commissioning and trials
Tight project budget
Communications
Transport

“Lake Malawi is situated at the southern end of the East African Rift Valley, and has long been recognised as an outstanding laboratory and archive for the study of tropical palaeoclimatology, extensional tectonics, and evolutionary biology. Along with Lake Tanganyika, Lake Malawi holds the promise of a high-resolution palaeoclimate record of unparalleled antiquity in the continental tropics. Lake Malawi is one of the world's largest, deepest (maximum water depth of 700 m), and oldest lakes (2-7+ ma), and is the largest lake in the southern hemisphere (9°-14°S) after Lake Tanganyika.” (<http://malawidrilling.syr.edu/>)



ADPS were invited to join the University of Rhode Island & University of Syracuse Lake Malawi project in early 2001. The requirement was to provide advice on the optimum DP system needed for the project in order to overcome the challenges of operating coring equipment in such deep water. Following a feasibility study on converting a local ‘dumb’ barge anchored on the lake, ADPS were tasked with sourcing a suitable DP system, thrusters and engines. Accommodation and services were sourced by the lead organisations with some local technical assistance from ADPS. In addition ADPS were asked to work in conjunction with other marine consultants to design and implement a suitable vessel management system which included the supply of LSA equipment.

In order to achieve the project aims ADPS utilised the expertise of a commissioning engineer, DP Master, DP officers and marine crew.



The remote location and lack of ground support was a major consideration during project design and the requirement for the system to be used on other lakes around the world after the Malawi project completion dictated the need for a palletised shipping system.

ADPS promoted 4 different DP systems and three thruster solutions to the Client, taking into account the financial restrictions imposed due to grant based funding.

In its entirety the ADPS involvement in the project lasted for approximately 4 years and ADPS crew worked on site for 2 months during 2005. Personnel involved in the project still regard it as one of the most interesting assignments that they have worked on and enjoyed the challenges it presented.

Visit: <http://malawidrilling.syr.edu/>
<http://www.uri.edu/news/releases/index.php?id=3106>