

**Daily Drilling and Scientific Report for IODP Expedition 357
Atlantis Massif Serpentinization and Life, 2015**



15th Nov 00:00 - 24:00 Local Time (-2 GMT)

1. Location

30° 7.621' N 42° 7.065' W
IODP-MSP M0076B
Prospectus borehole AM-11A
Water Depth: 768m

2. Science Report

The MeBo rock drill was deployed at Hole M0073A (proposal site AM-05) and penetrated 2.2 m before having to abandon operations. No core was recovered, and no water samples were collected from the rock drill sensor package as the Niskin bottles failed to close.

The RD2 rock drill was launched at Hole M0076A (proposal site AM-11) and penetrated 1.72 m before having to return due to a hydraulic leak. One 0.4m core of un lithified basalt breccia was recovered. Samples for contamination tracer testing were collected from the core, with the remainder reserved for OSP analyses. Due to a short turn around time, no water samples were collected from the rock drill mounted sensor package samplers. The RD2 was redeployed at the same site (Hole M0076B) and began coring operations in the late evening. During drilling of the first core barrel, a spike in methane concentration was observed with the rock drill mounted sensor package. By the end of the day, two cores had been cut, penetrating 3.44 m.

3. Core Recovery Details

Hole	M0073A	M0076A
Cores recovered	1	1
Drilled length (Coring, m)	2	1.72
Drilled length (Open hole, m)	0	0
Recovered length (m)	0	0.4
Recovery (%)	0	23.26

4. Weather

Wind SW to WNW, 6 – 8 knots. NW'ly long low swell, with calm seas. Passing squalls late afternoon, and 3/8 cloud cover. Maximum temperature of 25°C.

Next 24 hours: Cloudy with scattered showers due to a front passing through.

5. Planned Activity for the next 24 hours

Continue coring operations at AM-11A (M0076B)

6. Health and Safety and Environmental

N/A

7. Photo of the day



Core curators on standby! Dave Smith@ECORD_IODP