

Daily Drilling and Scientific Report for IODP Expedition 313 New Jersey Shallow Shelf

19th May 2009 (0600-2400, local time)

1. Location

Hole MAT-1A (Hole M0027A).

Time zone: US Eastern Time, UTC -4

Position at midnight: Latitude: 39° 38.04606' N Longitude: 73° 37.30146' W

2. Activity summary

Currently logging Hole MAT-1A (M0027A). Through-pipe gamma ray, openhole resistivity and magnetic susceptibility logging of the lowermost interval is complete. Sonic, acoustic imaging and VSP logging will follow.

3. Science report

Today we began logging operations in the hole. Because of the instability in the upper part of the hole, we made the decision to log, in open-hole conditions, in three sections. We acquired Total Gamma Ray, through the pipe, along the full length of the hole and acquired Resistivity and Magnetic Susceptibility, in open hole, for the bottom section only, from 430-634m. The data are not yet processed but the quality of the raw data is very good. We can identify the main lithologies and the main unconformities bounding stacks of progradational and retrogradational events. These data are important in helping to fill in the gaps in core recovery and to confidently tie the core data to the overall large scale geometry of the sediment bodies as observed on the seismic profiles.

4. Core recovery details

NA

5. Weather

Sea swell 2-3 ft; wind direction variable; wind speed 5-10 kt; dry and sunny; 20°C.

Next 24 hrs: sea swell 2 ft; wind direction SW, becoming S; wind speed 5-10kt, becoming 10-15 kt (gusting 20 kt); dry; 24°C.