

APPLICATION OF SEABED CORING TECHNIQUES TO HYDROCARBON EXPLORATION IN THE BAHAR-2 AREA, OFFSHORE AZERBAIJAN

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A joint seabed coring project has been carried out by Socar and Statoil in the Bahar-2 area, located directly southeast of Bahar Field in the Caspian Sea, offshore Azerbaijan, with the objective of testing the application of this technique as a prospect evaluation tool in the South Caspian.

During the period August - October 1996, 164 seabed cores were collected predominantly along existing shallow seismic lines. Preparation and analysis of sample material were carried out in Baku and Norway during September 1996 - March 1997. The cores were analyzed for the amount and composition of gaseous and liquid hydrocarbons.

After interpretation of the analytical data the following conclusions were reached:

- * On a regional scale, the clear presence of migrated petroleum in several of the cores confirms the existence of an active source system in this area.

- * A more detailed evaluation of the surface anomaly patterns highlights several areas for further investigation of the petroleum prospectivity, especially:

- a) directly south of Bahar Field, where the anomaly pattern is very similar to that observed in "calibration" cores collected over the known petroleum accumulation in Bahar Field;

- b) in the south-eastern part of the study area, where high amounts of methane in conjunction with positive indications for the presence of liquid petroleum are found (similar to positive seepage patterns observed in other parts of the world).