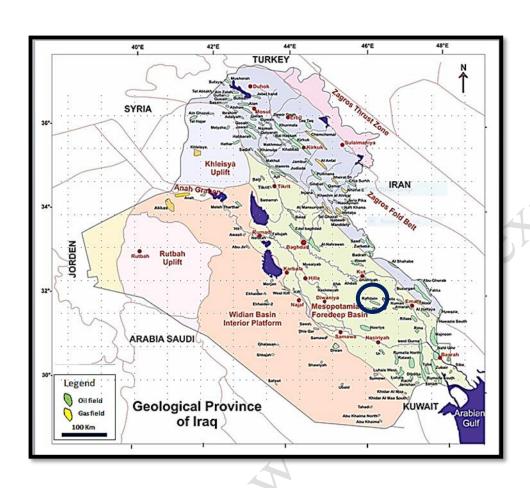
Target Exploration

Energy Geosciences Research & Development





Geology, Seismic, Log Analysis & Reserves of a Sleeping Giant; Rafidain (Abu-Amud) Field, Southern IRAQ

Target Exploration Report Tar31

The Report

This report is a review of the <u>Rafidain Field</u>, one of the underdeveloped fields of South Iraq. It includes descriptions of data, log analysis, seismic interpretations and reserves estimations.

The Location

The Rafidain Field is about 200 Km south of Baghdad; the nearest town is the Al-Rifai, which is 26km to the south of the field. The field is one of four-field cluster: the Gharraf field (20 km to the southwest), the Nasiriyah field (80km to the south) and the Ahdab field (60km to the northwest).

Field Properties

Date of discovery: 1984

Number of wells: 5

Size of the field: NW-SE trending anticline

Number of reservoir formations: 6.

Depth of reservoirs: Less than 4000m

Type of reservoirs: Carbonates and sandstone. Type of Crude: Under-saturated 26 to 39 °API

Data used in the field evaluation

Seismic data: 14 seismic lines totalling 345km covering the field area with a grid spacing of 4km to 5km was available for interpretation. The data quality is excellent and stratigraphic tie was achieved using synthetic seismic trace of one well.

Well data: 5 completion reports of the wells which include the drilling history, stratigraphy, hydrocarbon indications and test data of each well were available for review.

Interpretation

Seven seismic stratigraphic horizons from the Tertiary to the Lower Cretaceous were interpreted; TWT maps were constructed for the main formations from the Tertiary down to the Lower Cretaceous.

The well completion reports which contain the drilling history; the hydrocarbon indications and the test results of each well were reviewed. The copies of the open-hole logs were digitised and processed to calculate the porosity and the water saturation of each of the oil-bearing zones in the wells.

For each reservoir formation, structural correlation cross sections using the processed logs were prepared. These sections show correlation of the individual reservoir layers in each formation and the interpreted fluid levels (oil water contacts). Also cored and tested intervals and test results are indicated on the cross sections.

Oil-in-place and preliminary estimation for recoverable reserves in each of the six reservoir formations was calculated, and a preliminary plan for the development of the field was presented and discussed.

Figures and Enclosures

Seismic and structural interpretation maps of the field area.

Stratigraphic data (formation tops) of the five wells.

Two correlation cross-sections using the processed logs for each reservoir formation of the five wells.

Brief report describing the reservoirs and main test results.

Lithology and detailed petrophysical interpretation of the reservoirs showing porosity and water saturation of each reservoir.

Open hole DSTs and production test results.

Results of oil-in-place calculation of each reservoir.



The report is immediately available from

Target Exploration

Click to order your copy

For further information, contact:

M. Casey

Target Exploration Consultants

65 Kenton Court, London W14 8NW, UK. Tel: (+44) (0) 207 371 2240

target@targetexploration.com

www.targetexploration.com

<u>Home</u>	About Us	<u>Experience</u>	<u>Services</u>	Training	<u>Conferences</u>	<u>Publications</u>	Order Form	8
<u>News</u>	<u>Careers</u>	<u>Contracts</u>	<u>Downloads</u>	<u>Uploads</u>	<u>Links</u>	Rep/Software	Contact Us	<u>22-02-2022</u>