

## *“Can do” is no match for “have done”*

### **Well Challenge:**

BG Tunisia had to drill and complete a 4850m MD well on the Bireno East Field offshore Tunisia. Initial Caledus modelling of the “S” shape profile showed that torque in excess of 40,000ft.lbs would be required to drill the 8 ½” hole and over 52000ft.lbs would be required to drill the 6” hole section. In addition to this there were concerns over possible casing wear to overcome due to the relatively high side loads (in excess of 4800lbs in the 8 ½” hole and 5600lbs in the 6” hole respectively).

### **TD Solution™:**

Caledus modelled the drill string applying RotoTEC Friction Reducer® tools at 2 tools per joint in order to withstand and spread the high side loads. The low friction self lubricating free rotating sleeves keeps the drill pipe from contacting the well bore, thereby taking away the potential for casing wear and reducing the friction factor seen with steel on steel when drill pipe on is rotating on casing, to the low factors provided by the RotoTEC® tools.

347 tools were applied to the 5 ½” drill string in total and the string was tripped 5 times in total carrying out both drilling the 8 ½” and 6” hole and 7” x 4 ½” liner running operations.

### **Result/Benefit:**

Torque was reduced by – 30% on the 8 ½” hole section and 25% on the 6” hole

RotoTEC® tools subjected to over ½ million revolutions

Only 3 tools were removed from the string throughout the well operations , due to normal wear an tear

No tools or parts thereof were damaged to beyond use



## **Success Story #105**

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