CASE STUDY- 2020-NORTH SEA

LOCK & LOAD® System Saves Major Operator 14 hours of rig time

Challenge

A major operator on the Norwegian Continental Shelf planned to install a LASTLOCK® followed by cementing and dressing & tagging of the plug for verification. This was to be done inside a 9 5/8" casing at 5,675mMD with 80 degrees inclination. With an average tripping speed of 800m/hr every round-trip was estimated to take 14 hours between subsequent operations that cannot be combined within the same trip.

Solution

Archer has developed a new system with a customized cementing stinger and incorporated drilling blades on the running tool for the bridge plug. A multi-combo BHA was prepared including a scraper to clean the setting area and a LASTLOCK® bridge plug with new LOCK & LOAD® running tool. The BHA was planned to be hung-off in the wellhead after cementing while nipping the BOP instead of pulling out. After nipping the plug can be dressed and tagged.

5,675 mMD and 80° inclination

Result

The LOCK & LOAD® system was successfully deployed achieving all planned objectives in one run. The cement was confirmed to be firm with the required integrity and the operator effectively saved a full round-trip of 14 hours along with a reduction of work in the red zone.

14 hours saved by using LOCK & LOAD®

“Successfully scraped, set bridge plug, cemented, dressed and tagged plug in one run”