



Case Study:

Insert Valve Carrier (IVC) with Slips

Date: August 2021
Region: Norway



Key Capabilities

- Slim design
- ISO 14310:2008/Vo
- 345 bar differentiated above flapper
- 517 bar differential control line pressure
- Designed to straddle the safety valve independently from the existing valve profiles and lock
- System run on wireline slickline/E-line and retrieved on standard GS retrieving tools

Challenge

A major North Sea operator had recurring problems with a Down-Hole Safety Valve in one of its producer wells. The well had issues with both sulphate and sulfide scale as well as pitting and corrosion. Over the last 10 years, multiple attempts were made to repair the DHSV with acid wash, sulphate dissolver treatment and brush without success.

The operator was unable to source a standard retrievable safety valve with lock for the operation which resulted in an alternative straddle solution with short lead time being required.

Solution

Interwell's Insert Valve Carrier (IVC) straddle was selected to straddle the entirety of the existing safety valve. The element and slips were set in the tubing pups above and below the DHSV body in the completion. The IVC allowed for the retrofitting of the third-party replacement valve without using the existing safety valve lock profiles and no-go. The IVS made use of the existing hydraulic system to activate the newly placed safety valve below IVC straddle.

Value Created

The operator was able to retrofit the wireline retrievable safety valve, significantly reducing the cost of the operation. By implementing Interwell's IVC straddle, the operator avoided weeks of lost production waiting for a standard retrievable safety valve with lock as well as a \$5 million dollar recompletion cost of the operation failed.



IVC

Insert Valve Carrier

