A client with a well in Norway was developing guidelines for their smart completions. They were using multiple completion technologies from various vendors making it a complex process.

While completing their second intelligent well systems (IWS), a preset IWS premier packer got stuck during a trial run. The client contacted Baker Hughes for assistance.

The team jumped into action and arrived at the rigsite along with the 2 1/8-in Mechanical Pipe Cutter™ (MPC) tool. They successfully installed the MPC tool to the competitor’s wireline and 2 1/8-in tractor.

One obstacle the team encountered was selecting the premier packer cut point. By using the Baker Hughes Deployment Risk Management (DRM) process and leveraging the Baker Hughes global knowledge base, they addressed the challenges of correlating the tractor at 12,000 ft and 70° deviation and identified the parameters to successfully complete the cut.

The client was able to pull on the tubing string to free the premier packer. However, the tubing became stuck in the casing again stopping the operation before retrieval was complete.

In order to complete the operation, the client decided to cut the tubing above the packer. To conform to the new parameters, the team reconfigured the tool for the larger tubing inside diameter (ID). The operation began again with minimal interruption.

In less than 25 minutes, Baker Hughes used the MPC tool to cut the tubing and safely recovered the entire tubing and packer from the well. The team made six cleanup trips capturing debris from a damaged swab cup tool before running a new IWS completion with a flawless installation delivering substantial savings to the client.

Challenges
- Competitor’s wireline and 2 1/8-in tractor
- 2¾-in minimum ID

Results
- Rapid sourcing and mobilization of equipment and personnel
- DRM process correlated 2 1/8-in MPC tool on depth limiting tractor use
- Premier packer cut at depth first time
- Subsequent run to cut stuck tubing was flawless
- Quality cut offered multiple options for additional intervention
- Avoided explosives for rapid mobilization
- Entire operation completed without nonproductive time