

PIPELINE & PROCESS

LOCATION

Gulf of Mexico

SPECIFICATIONS

6 inch Oil Sales Pipeline
9,900 feet
346 bbl. capacity

SOLUTION

BlueFin was challenged to develop a remediation plan that alleviated the accumulation of solids material.

Combining in-depth analysis on the oil and deposit material with a modeled estimate of deposition severity, BlueFin's approach utilized customized Inferno® thermal fluids coupled with SafeHeat technology.

Flow Assurance

SafeHeat® technology, custom thermal fluids, and flow assurance engineering provide total approach for plugged GoM pipeline.

A GoM operator experienced increased differential pressures on a bulk crude sales pipeline. Failed production chemical soaks deemed ineffective in mitigating the issue and indicated paraffin deposition near the subsea tie-in location.

Once differential pressures levels reached severe ranges, well production rates dramatically overshadowed oil sales capacity.



Plan of Execution

- Isolate the operator's crude pipeline through closure of the SSTI valve adjoining the 16-inch sales pipeline to the 20-inch liquids transmission pipeline.
- Pump Inferno® 4030 to the SSTI manifold via the bypass line and into the flowline covering 25% of the flowline geometry.
- Utilize crude production and platform pumps to flow back Inferno® 4030 treatments to the marine vessel.
- Repeat this step until pressure differentials reach 100 psi.

Technical Achievements & Benefits

- 175 bbl of solids were removed.
- An additional 30 bbl of liquid deposition was removed in solution form with our Inferno 4030 solvent
- Decreased differential pressure from 1,300 psi at 26 gpm to 100 psi at 80 gpm.
- Increased production and reduced pump wear through excessive utilization.
- Remediated obstructions that would have eventually caused a total line restriction.
- Alleviated the need for expensive coil tubing intervention.
- Project executed with assistance from a major marine contractor onboard a DP2 vessel.
- Project completed with zero incidents and no environmental impact.