

HERR

Wasco Energy Group of Companies



Wasco Subsea and Pipeline Support Unplanned Repair (SPUR[™]) Initiative AOG 2019 14th March 2019

Credit picture: Axel Scmidt Nord Stream 2 Pipeline Project **Agenda**

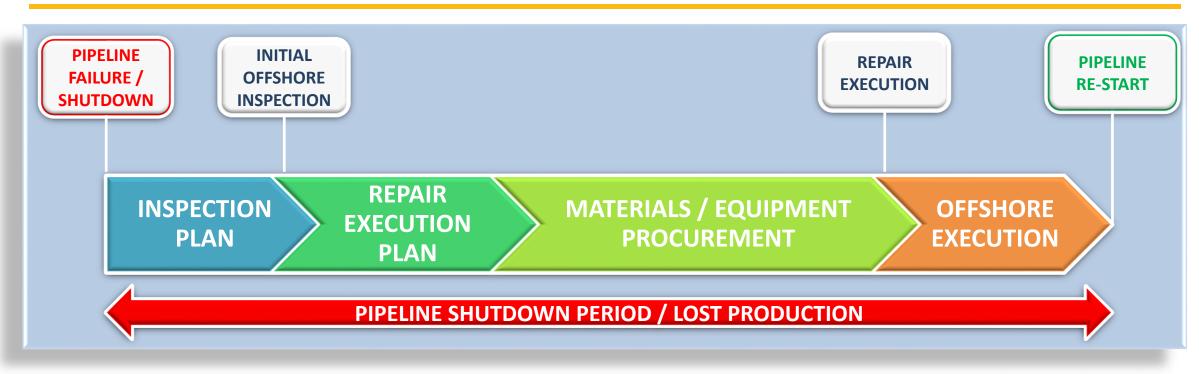


1	Challenges Faced During Unplanned Repair Scenarios
2	Subsea & Pipeline Unplanned Repair Initiative (SPUR™)
3	The Operational Model



Typical Pipeline Failure Response



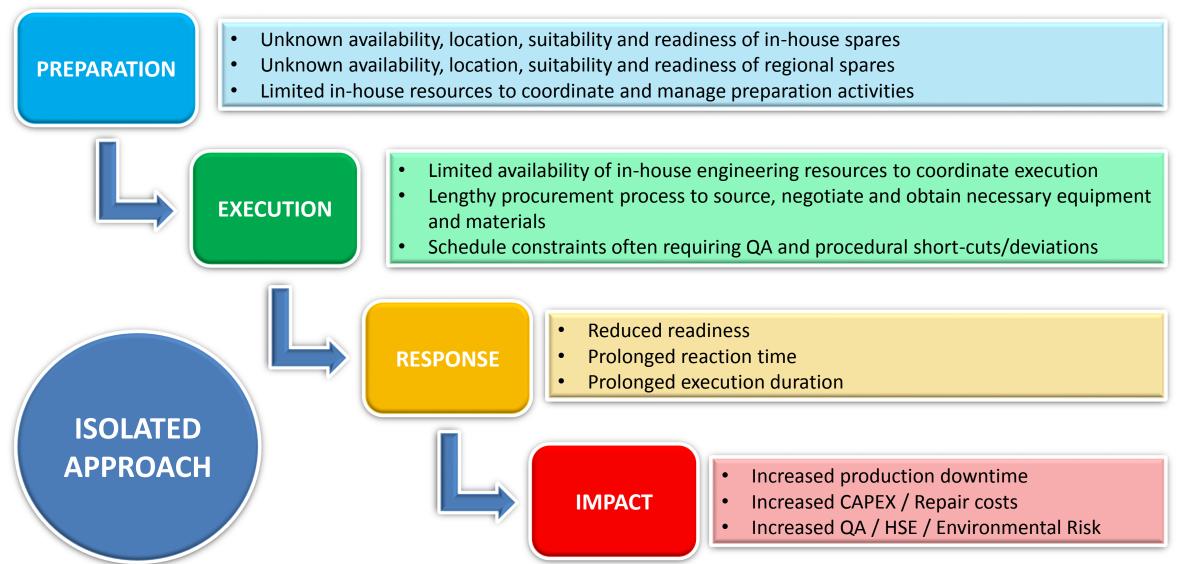


Risk of pipeline failures increasing annually due to:

- Ageing assets;
- Changes to operational conditions;
- Reduced Integrity Management Programs resulting from recent market conditions.

Existing Risks Factors





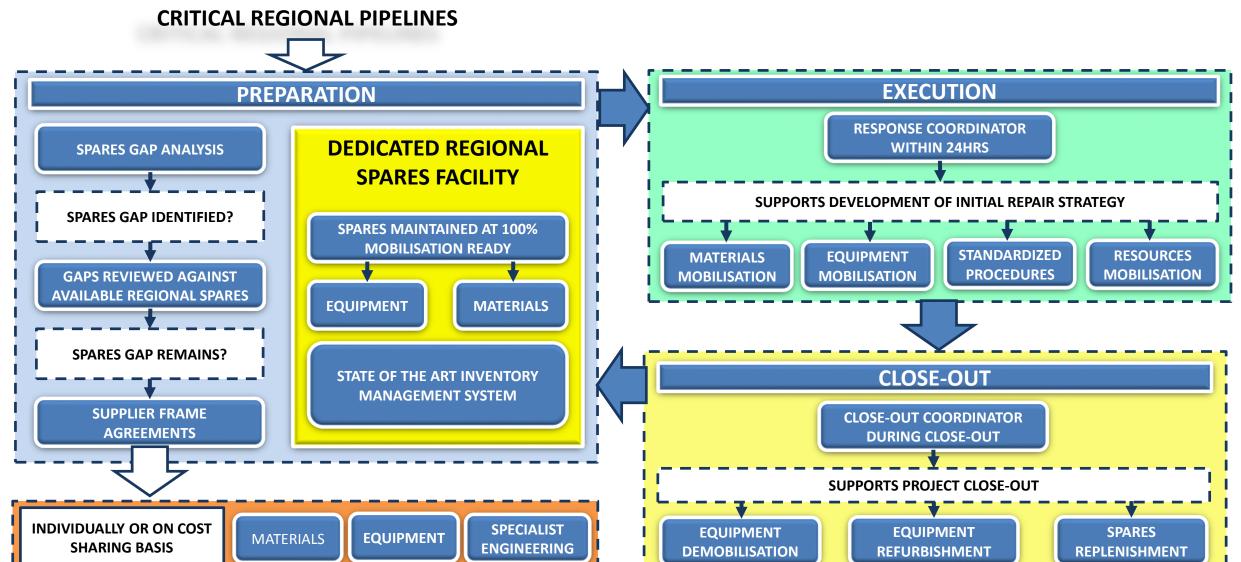
Wasco SPUR[™] Outline Principals



Region wide collaboration Dedicated Regional between Pipeline Operators **Storage Facility** and Service Providers targeted towards: Improved preparation and -**Cross-utilization of Dedicated SPUR[™]** reaction time; **Assets Between Response Team Regional Operators** Improved quality and efficiency of repairs; Reduced CAPEX risk; -Reduced production risk; Reduced Quality, HSE and -Cost **Optimization/Sharing** Environmental risk. **Between Regional Fast-Track Execution Operators**

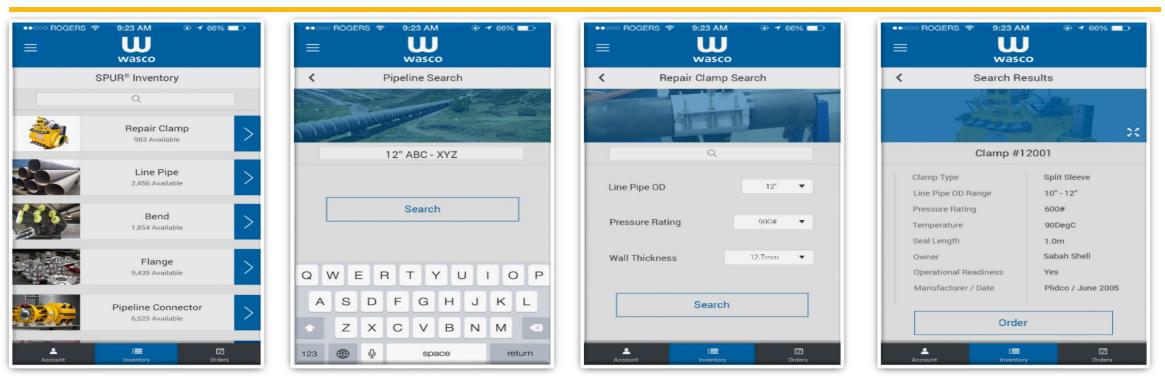
SPUR™ Initiative – Operational Model





Wasco

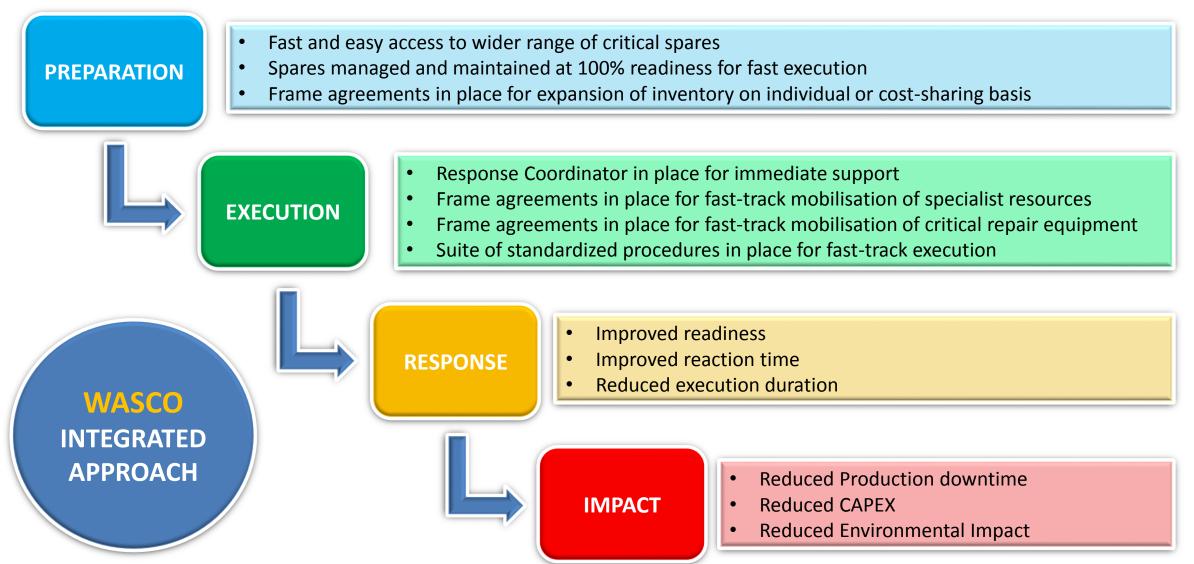
SPURTM Inventory Management System



- Fast-Response Inventory Management system developed purposely for SPUR[™];
- Fast, user friendly navigation via online computer system and/or tablet/smartphone;
- Search by Pipeline or Equipment/Material Type instantly;
- Dedicated 24hr SPUR[™] Inventory Management Support Center;

Benefits of SPUR™







- 1. If done correctly, industry collaboration can be a very powerful tool;
- 2. Current market conditions driving towards industry collaboration;
- 3. SPUR[™] model low complexity to implement and execute;
- 4. SPUR[™] model easily adaptable to regional requirements;
- 5. Provides benefit to all parties;
 - 1. Reduced CAPEX risk;
 - 2. Reduced Production Risk;
 - 3. Reduced Quality, HSE and Environmental Risk.

For more information, visit our website: www.wascoenergy.com

Alternatively, visit our Drop-in Centre today at Parmelia Hilton Hotel for more information