

## Scope of Work for ICN Gateway Scarborough Floating Production Unit

<b>Package Name</b>	Nitrogen Generator Package
<b>Package Number</b>	SA5810RM0000001
<b>Scope of Supply</b>	<p>A58101 Nitrogen Generator Package A58102 Nitrogen Generator Package</p> <p>Each Nitrogen Generator Package comprising: Pressure Vessels (High purity PSA + Low purity membrane) Inlet air filter Electrical Heater Flow Indicator and Transmitter Pressure Indicator and Transmitter Inlet / Outlet Isolation Valves Junction Box Interconnecting Piping &amp; Skid Anchor Bolts Lifting Lug/Arrangement Earthing Lug Flanged Connection at Inlet &amp; Outlet Tie-in point of Skid Two (2) spare gaskets and 10% spare studs and nuts (with a minimum quantity of 2 sets for each size) for each blinded nozzle Instrumentation, Instrument wiring and Junction Boxes, Integrated Structural skid c/w drip pans, acoustic attenuation (if required)</p> <p>Options One (1)-year of operational and maintenance spare parts Capital / Insurance Spare Parts (see chapter 4.1) Site Acceptance Test (hourly rates) Training (see chapter 22) Aftermarket Support Contract Options to be defined by Supplier for consideration by Company and Contractor Technical Improvements and Upgrades to address OEM field/fleet lessons learnt and OEM improvement programs Vendor "remote monitoring and diagnostics" technology.</p>
<b>Specifications and Standards:</b>	<ul style="list-style-type: none"> <li>▪ W1000SM3124353 Pressure Vessel Specification</li> <li>▪ W1000SM001 Engineering Standard Hydrostatic and Pneumatic Pressure Testing</li> <li>▪ W1000SM8746247 Vessel Internals Mechanical Requirements</li> <li>▪ W1000SL8512367 Engineering Standard: Pressure Equipment Materials</li> <li>▪ W1000SM030 Engineering Standard: Pressure Equipment Bolts, Stud Bolts and Nuts</li> <li>▪ W1000SL8805574 Equipment Preservation</li> <li>▪ W1000SG8676422 Engineering Standard Lifting Equipment</li> <li>▪ W1000SM5234504 Welding Management</li> <li>▪ W1000SM3132441 Engineering Standard Thermal and Acoustic Insulation</li> <li>▪ W0000PV1400355151 Marine offshore vessel assurance procedure</li> <li>▪ W1000SM002 Engineering Standard Protective Coating Systems - Amendments to NORSOK M – 501</li> <li>▪ WM0000MG10678350 SAP PMRC Development Guideline</li> <li>▪ WM0000MG1400443137 Project Preservation Guideline</li> <li>▪ WM0000MG1400295276 Bill of Materials Procedure</li> <li>▪ W1000SE001 Engineering Standard Electrical, Instrument and Communications Cables and Accessories</li> <li>▪ W1000SE020 Engineering Standard Electrical Installation</li> <li>▪ W1000SE025 Engineering Standard Electrical Design</li> <li>▪ W1000SE028 Engineering Standard Hazardous Area Equipment Verification Dossier</li> <li>▪ W1000SE0290001 Engineering Standard Hazardous Area Electrical Equipment Selection Installation Inspection and Maintenance</li> </ul>

- W1000SE164592 Engineering Standard Hazardous Area Equipment (EEHA) Competency Requirements
- W1000SP017 Engineering Standard Hazardous Area Classification
- W1000SE025 Cables, Wires and Accessories
- W1000SJ005 Engineering Standard Actuator ON-OFF Valves (AMENDMENTS TO ISO 12490)
- W1000SJ010 Engineering Standard Instrument Installation
- W1000SJ025 Engineering Standard Instruments for Measurement and Control
- W1000SJ072 Engineering Standard Instrument, Control and Electrical Requirements for Packaged Equipment Specifications
- W1000SJ5378900 Engineering Standard Management of Alarm Systems - Amendments to ANSI ISA 18.2
- A9000PG7788396 FAT Testing Procedure
- W0000MG4785296 Selection Acquisition and Review of Production Equipment Operating Inventory and Commissioning Spare Parts Guideline
- W1000MG130110 Inspection and Function Test Records Procedure
- W1000SE0290002 Inspection of Electrical Equipment in Hazardous Areas, Procedure
- W1000SL001 Engineering Standard Materials Selection and Corrosion Control (Amendments to ISO 21457, ISO 13628-1 And ISO 17348)
- W1000SL8107502 Engineering Standard Positive Material Identification
- W1000SM5234504 Welding Management
- W1000SQ002 Engineering Standard Certification, Traceability and Identification Requirements for Engineering Products
- W1000SQ8474523 Engineering Standard Quality Requirements for Supply of Products and Services
- W1000UE7105725 199 Hazardous Area Electrical Equipment Inspection Sheet
- W9000SQ005 Positive Material Identification
- WM0000PG1400145354 Welding Procedure Spec Work Instruction
- W1000MF9545209 Engineering Standard Guideline Human Factors Engineering
- W1000MH10219324 Engineering Standard Guideline Environment in Design
- W1000SF5568513 Engineering Standard Safety in Design
- W1000SF5568543 Engineering Standard Human Factors in Design
- W1000SF5593268 Engineering Standard: Noise Management Requirements (Amendments to ISO 15664)
- W1000SH8033902 Environment Engineering Standard
- WM0000MF9917149 Engineering Standard: Human Factors Engineering in Projects Guideline
- W1000SM003 Engineering Standard Pipe Supports Design and Selection
- W1000SM3131997 Engineering Standard: Piping Flange Bolting
- W1000SM3267221 Engineering Standard: Supply of Valves
- W1000SM7129624 Engineering Standard: Piping Details
- W1000SM8253595 Piping Systems General Requirements
- W1000SM9099854 Engineering Standard: Piping Material Specification Offshore
- W1000SX3215141 Engineering Standard Piping Fabrication, Installation, Erection and Testing
- W1000SP8714776 Engineering Standard Piping Process Design Requirements
- W1000SS8108463 Engineering Standard Offshore Structures Weight Control (Amendments to ISO 19901-5)
- W1000SS3129863 Woodside Engineering Standard Frp Grating Handrails Ladders\_Structural Shapes
- WM0000MG9599934 Start-Up Excellence Guideline
- R3868-MDR-PN-WEL-000001 Manning Philosophy and Efficient Operations Presentation
- A3200MG1400926686 Plug and Play Design Guide
- W1000SK8627655 Engineering Standard SELLER Documentation Requirements
- W1000SG0105 Engineering Standard Marine Operations Construction Vessels And Transportation - Amendments to DNVGL-ST-N001
- W1000SP3179994 Engineering Standard Pressure Relief Devices Selection, Sizing and Process Requirements
- W1000SP8738900 Engineering Standard Pressure Relief, Emergency Depressuring, Flare and Vent Systems

	<ul style="list-style-type: none"> <li>▪ W1000SP8739009 Engineering Standard Design Pressure and Temperature for Process Equipment and Piping</li> <li>▪ W1000SP8739040 Engineering Standard Process Flow Diagrams and Piping and Instrumentation Diagrams</li> </ul>
<b>Minimum Scope of Work Requirements:</b>	<ol style="list-style-type: none"> <li>1. Engineering Detailed Design and Procurement of Materials and Equipment.</li> <li>2. Fabrication</li> <li>3. Inspection &amp; Testing</li> <li>4. Documentation</li> <li>5. Packing &amp; Preservation Package</li> <li>6. Proven Design</li> <li>7. Offshore application.</li> <li>8. Low/ Unmanned</li> </ol>
<b>Contact:</b>	<p>Industry Capability Network Western Australia (+61 8) 9365 7623  Name: Carla Peyton / Linus O'Brian  Phone No.: T: (08) 9365 7543 / M: 0428 403 072 / (08) 9365 7556  E-mail: Carla.Peyton@icnwa.org.au / Linus.OBrien@icnwa.org.au</p> <p>Please Note:</p> <ul style="list-style-type: none"> <li>▪ <b>This is a request for specific expressions of interest, vendors and contractors will be considered for prequalification and / or tender if suitably qualified. For general expressions of interest please ensure you are registered with Industry Capability Network Western Australia.</b></li> </ul>
<b>URL</b>	<p>For more information about <b>McDermott</b>, please refer to the McDermott website  <a href="https://www.mcdermott.com/">https://www.mcdermott.com/</a></p>
<b>Closing Date:</b>	1 <sup>st</sup> March 2020