

# DEEP-SEA OIL & GAS

*A Group Approach to Major Project Delivery*

CASE STUDY

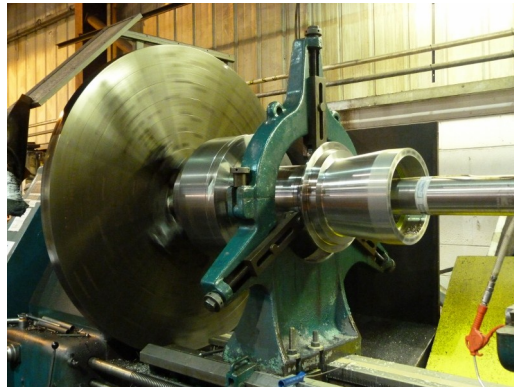
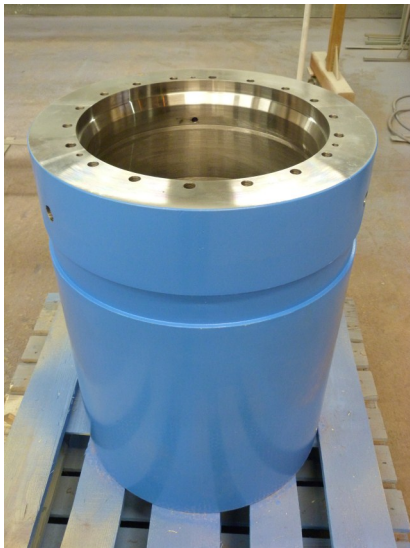
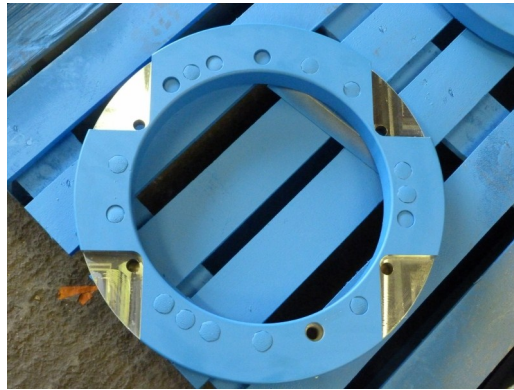
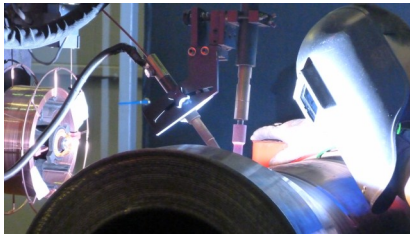
**RENOWN**  
GROUP

The following case study outlines a project requiring multiple stages of engineering solutions for the delivery of oil and gas deep-sea hardware.

The purpose of the project was to support a major oil and gas pipeline solutions firm in wider oil and gas exploration activities.

Renown Group was able to deliver the project as a result of possessing the required engineering capabilities and skills across its three sites.

This enabled the customer to place a product requiring several processes with one supplier, without any further need to subcontract.



## Project Summary:

- **Location:** UK, North Sea
- **Customer:** Major oil and gas pipeline operator
- **Project deliverable:** Deep sea hardware
- **Customer requirements:** Machining, weld overlay cladding, butt welding, painting and coating, quality inspection, project management

# DELIVERY OF THE PROJECT: THE GROUP APPROACH



## Stage 1.

### Renown Oil & Gas Ltd, Washington



Material preparation | Pre-machining | Weld overlay cladding | Butt welding | NDT inspection

1. **Pre-Machining** The process started as parts for the product were machined to the required dimensions
2. **Weld overlay cladding** was applied for surface protection, allowing the substrate material to provide strength requirements to meet the specified codes and standards of the customer
3. **Butt welding** to join the machined pieces with a high-strength weld
4. **In-house NDT** inspection was undertaken to ensure the welding had met the specified welding parameters



## Stage 2.

### PJ Engineering Products Ltd, South Shields



Horizontal boring

5. **Horizontal Boring** As a result of the hardware having been hard-faced from the weld overlay, horizontal turning and boring took place at PJ Engineering Products.



As the hardware had a variety of components requiring seven different stages of engineering, Renown Group project managed the schedule of work across its three sites.

This ensured a seamless transition from one site to the next, and capacity from one engineering process to the next.



## Stage 3.

### Renown Engineering Ltd, Cramlington



Final machining | NORSOK M501 painting, coating and approval

6. **Final machining** the products were finished with final machining to ensure all dimensions matched and the realign any disturbances during previous stages
7. **Painting and coating** was applied to NORSKOK M501 standards as per the customer's specification



www.renown-group.co.uk  
info@renown-engineering.co.uk  
+44(0)191 250 0113

