

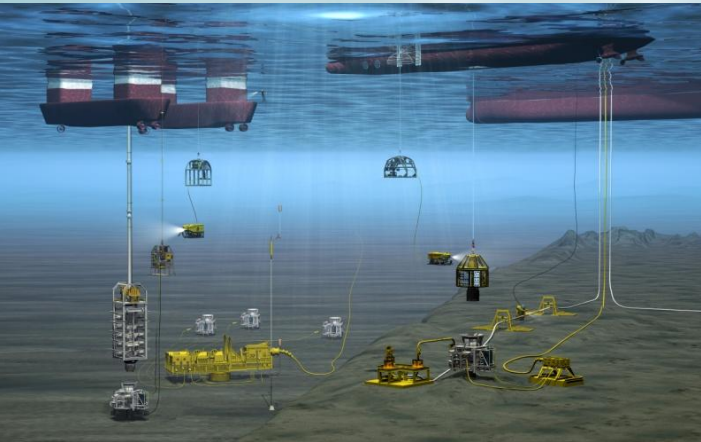


# SubSea Valves



OMB Offshore Applications Ltd is the OMB group operation based in Dundee, UK which specializes in the subsea business.

At OMB plant in Cenate we have introduced new equipments and technologies to be able to service this critical sector with innovative and state-of-the-art equipment .



We founded the company in 2009 to oversee the sales and technical development of the business and in the past years we have been able to move from the traditional shallow water service to critical applications achieving a growing list of references and approvals.

The following presentation shows OMB main reference in the subsea market.



OMB offers a wide range of products for Subsea applications:

### **Ball Valves**

- Trunnion, Side Entry
- Trunnion, Top Entry
- Trunnion, Welded Body
- Floating, Metal Seated

### **Gate**

- Slab gate
- Expanding gate

### **Check**

- Swing, Top Entry
- Swing, Side entry
- Dual Plates

### **Pressure Classes**

- ASME classes from 150 to 2500
- API6A from 3000 to 15,000

### **Operators**

- Subsea gear
- ROV
- Standard or Compact Actuators

### **Materials**

OMB supply as standard forged materials exclusively from Italian forging masters



**ROV operated valves**

**ConocoPhillips**

Customer: Conoco Phillips

Project:

Country: Norway

Year: 2000

Valve type: Ball Trunion

Depth: Shallow

Size: 6"

Class: cl 150

Material:

Operator: ROV operated





## Gear operated valves



Customer: Qatar Petroleum

Project: n/a

Country: Qatar

Year: 2002

Valve type: Ball Trunnion

Depth: Shallow

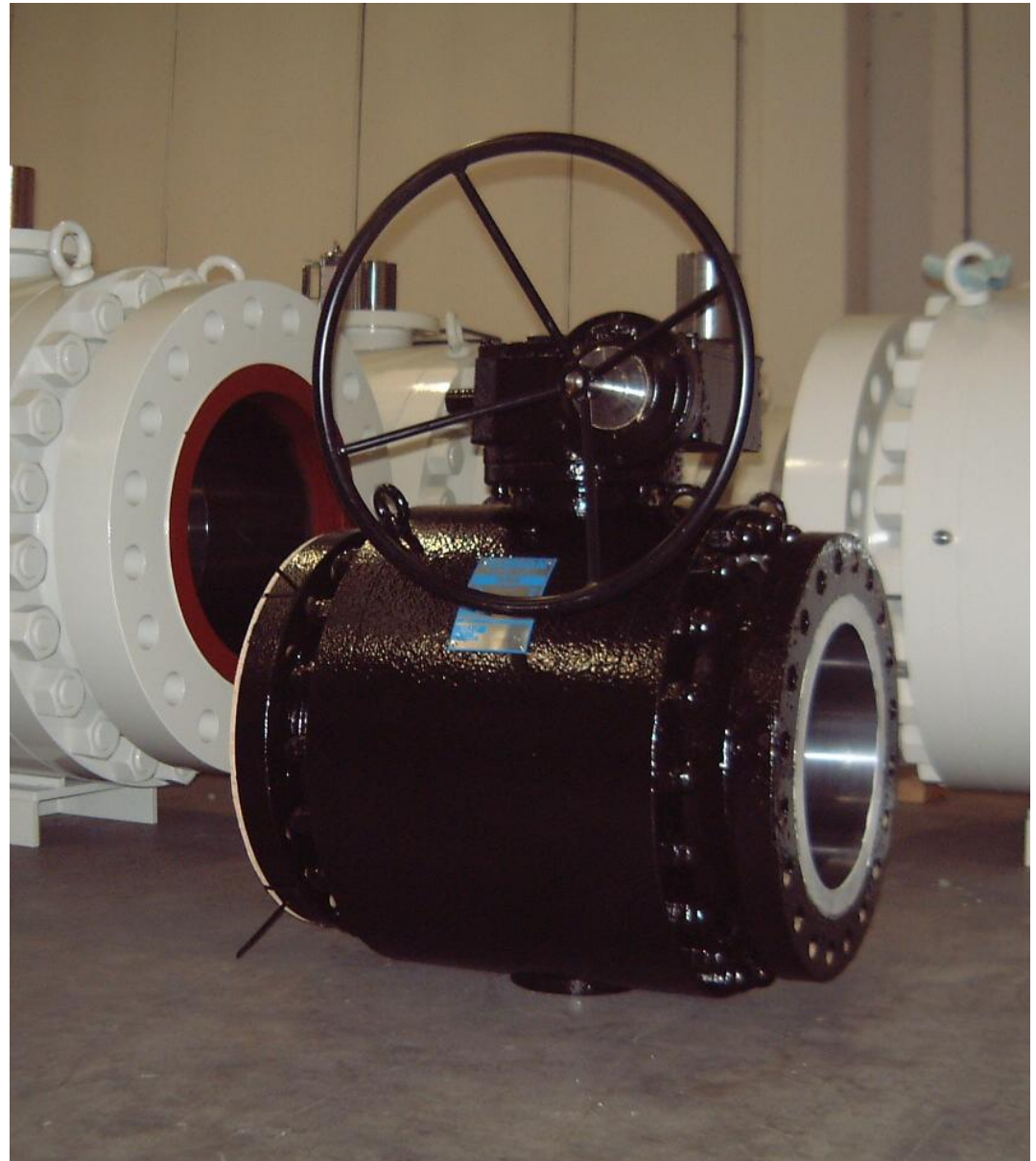
Size: 16"

Class: cl 600

Material: CS

Operator: gear

Feature: Special coating





## Gear operated valves



Customer: Shell Sarawak

Project: shallow water

Country: Malaysia

Year: 2000

Valve type: Ball Trunnion

Depth: Shallow

Size: 24"

Class: cl 150

Material: CS

Operator: gear

Feature: special coating





## Gear operated valves



Customer: Shell Sarawak

Project: n/a

Country: Malaysia

Year: 2000

Valve type: Ball Trunnion

Depth: Shallow

Size: 12" - 24"

Class: cl 150

Material: F51 Duplex –  
Metal to Metal

Operator: gear

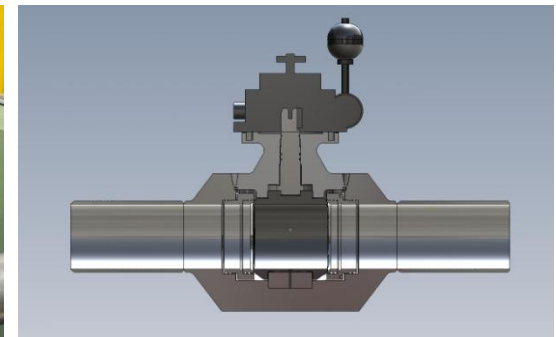
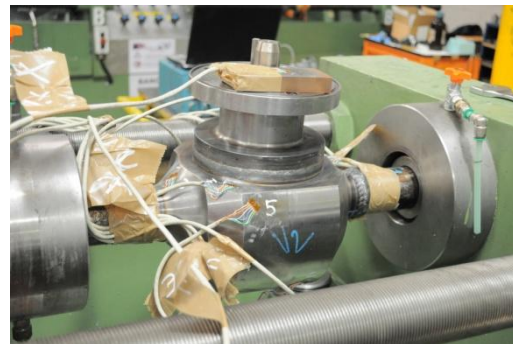




## Fully Welded valves



Customer: Total – Nippon Steel  
Project: Bonkot  
Country: Indonesia  
Year: 2009  
Valve type: Ball Trunnion  
Depth: Shallow  
Size: 8"-16"  
Class: cl 1500  
Material: F65– Metal to Metal  
Operator: Rotork Subsea gear  
Feature: Bending test



Bending test





## Fully Welded valves



Customer: Total – Nippon Steel

Project: Bonkot





## Actuated valves



Customer: Hess  
Wood Group

Project: Triton

Country: UK

Year: 2011

Valve type: Ball Trunnion

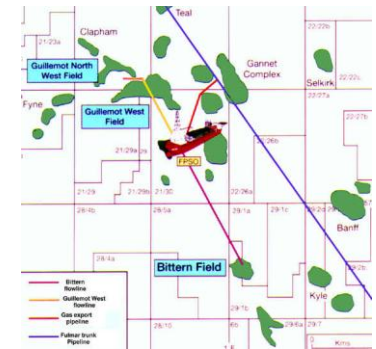
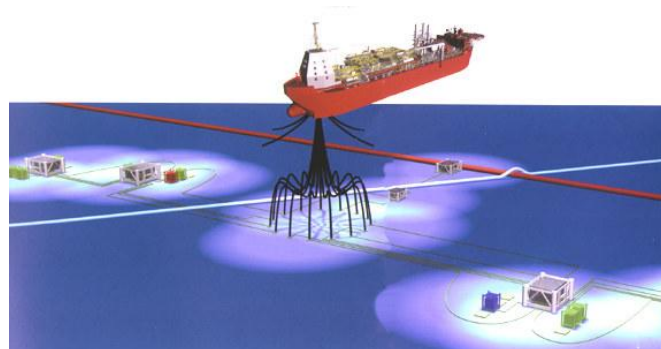
Depth: 1417m/4,676ft

Size: 10"

Class: cl 1500

Material: CS

Operator: ATC compact actuator





## API6A Swing check valves



Customer: Helix

LTS

Project: Noonan/Danny Deve

Country: USA-Gulf of Mexico

Year: 2010

Valve type: Swing Check

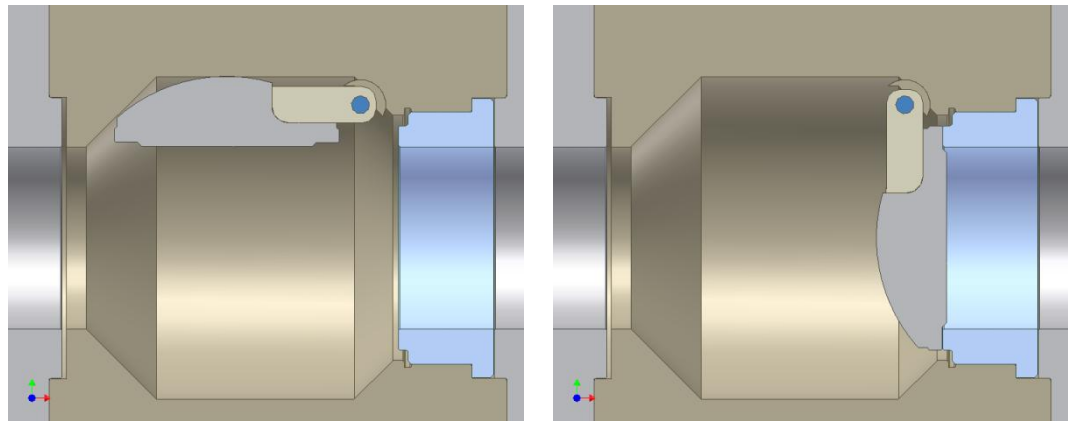
Depth: 822 m (2700 ft)

Size: 4 1./16"

Class: 10000

Material: HYCS

Feature: In line Swing





## Actuated valves



Customer: Premier Oil  
Drydock Dubai

Project: Solan Subsea

Country: UK

Year: 2012

Valve type: Ball Trunnion

Depth: 135mt

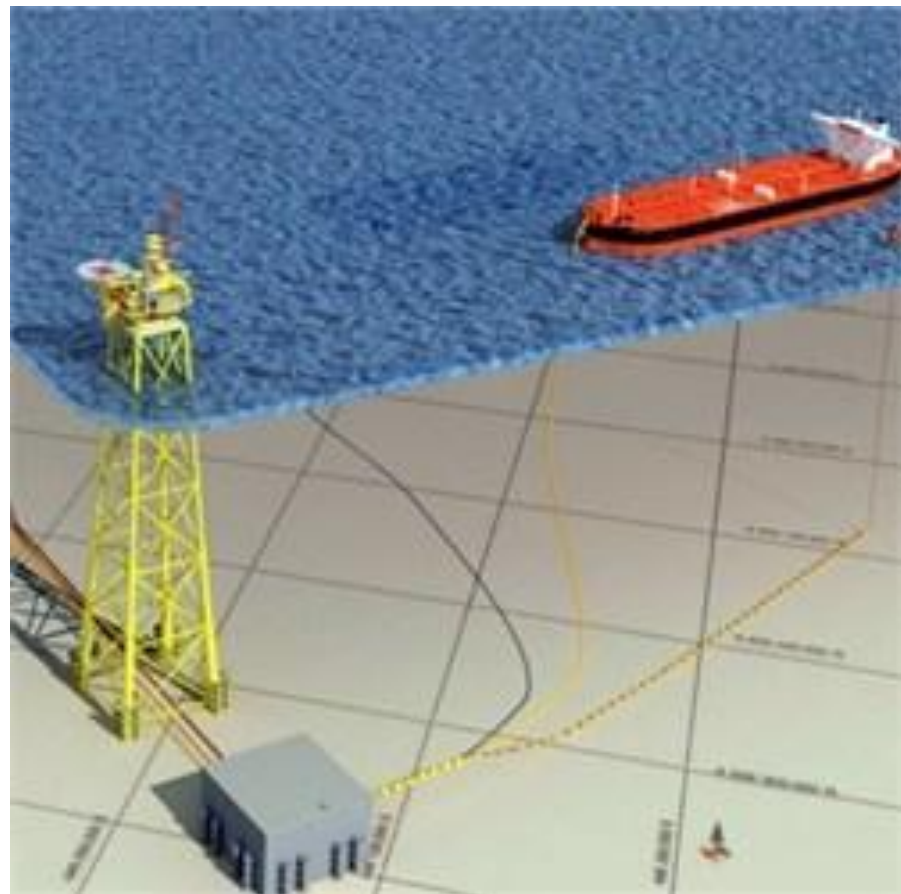
Size: 3"-24"

Class: 300

Material: LTCS- SDX

Operator: MOV- ROV

Feature:

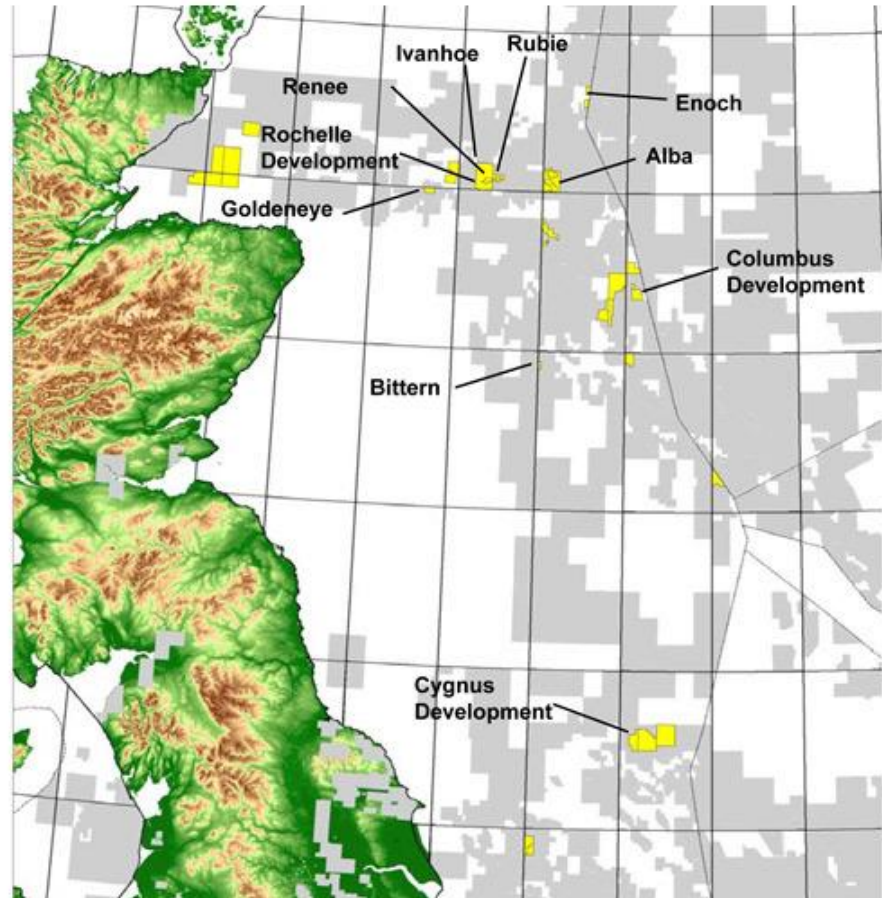




## Actuated valves

GDF SUEZ

Customer: GDF  
Project: Cygnus Field Dev.  
Country: UK  
Year: 2012  
Valve type: Ball Trunnion  
Depth: 23mt  
Size: 6"-24"  
Class: 1500  
Material: LTCS  
Operator: ROV  
  
Feature:



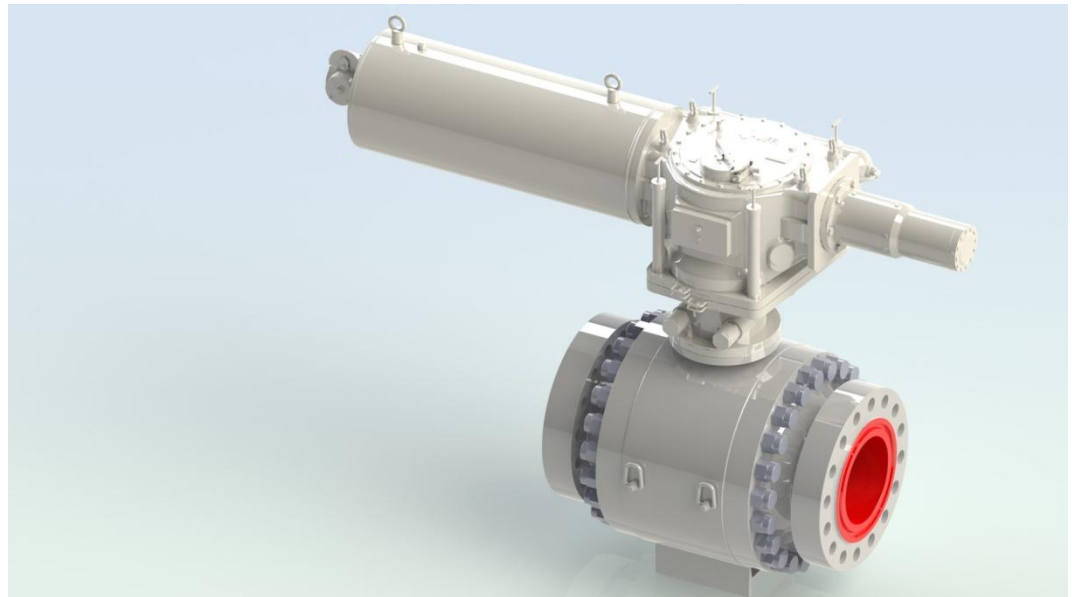
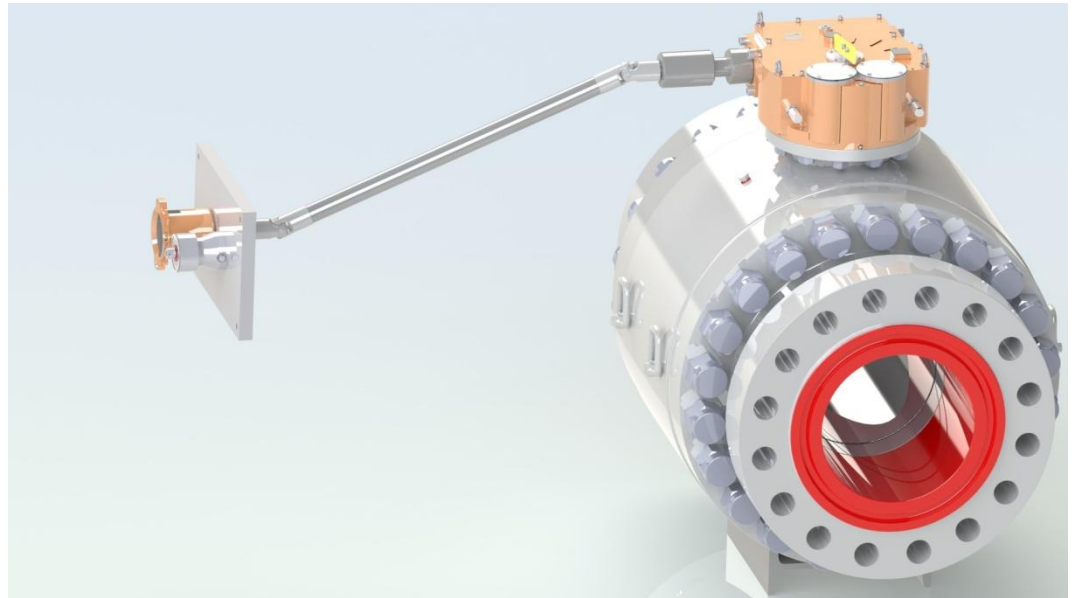


## Actuated valves

GDF SVEZ

Customer: GDF  
Project: Cygnus Field Dev.  
Country: UK  
Year: 2012  
Valve type: Ball Trunnion  
Depth: 23mt  
Size: 6"-24"  
Class: 1500  
Material: LTCS  
Operator: ROV

Feature:



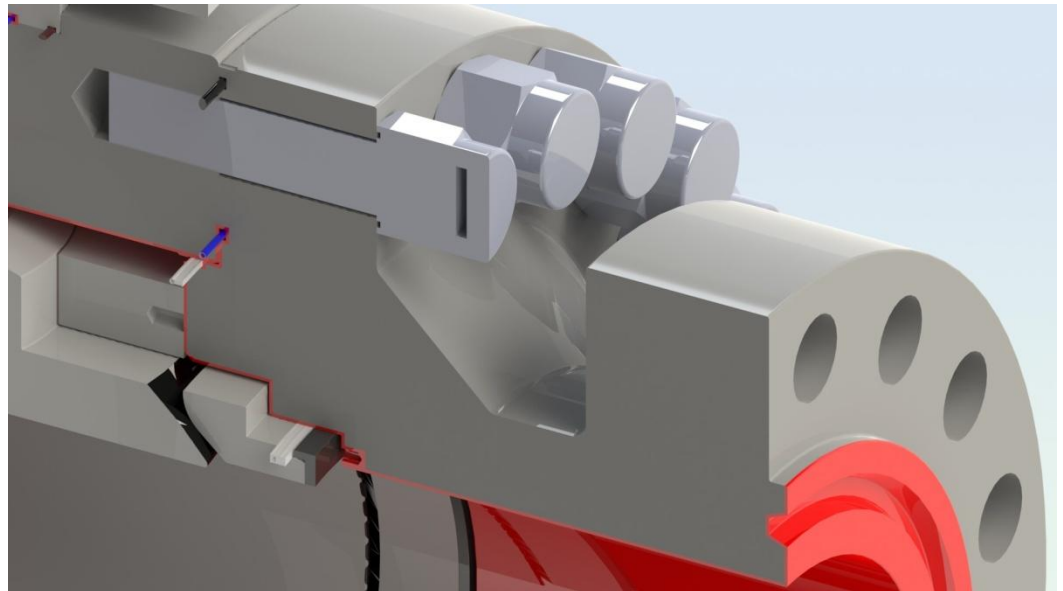
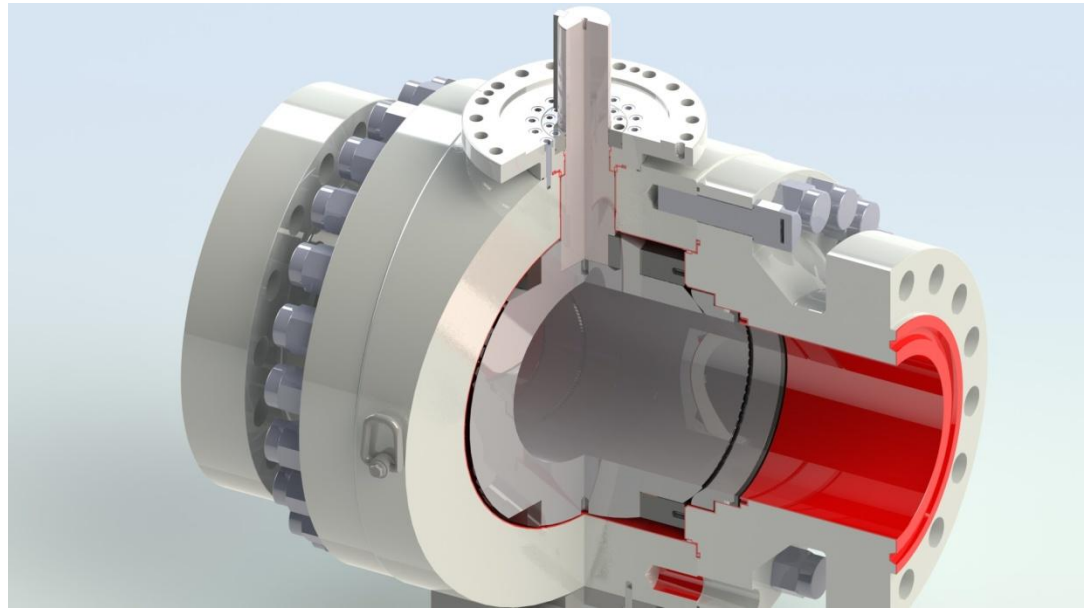


## Actuated valves

GDF SVEZ

Customer: GDF  
Project: Cygnus Field Dev.  
Country: UK  
Year: 2012  
Valve type: Ball Trunnion  
Depth: 23mt  
Size: 6"-24"  
Class: 1500  
Material: LTCS  
Operator: ROV

Feature:





## API10000 valves



Customer: Anadarko  
Beta Intl.

Project: E-Lucious Gas Lift

Country: US A– Gulf of Mexico

Year: 2012

Valve type: Ball Trunnion

Depth: 2,172 m / 7,168 ft

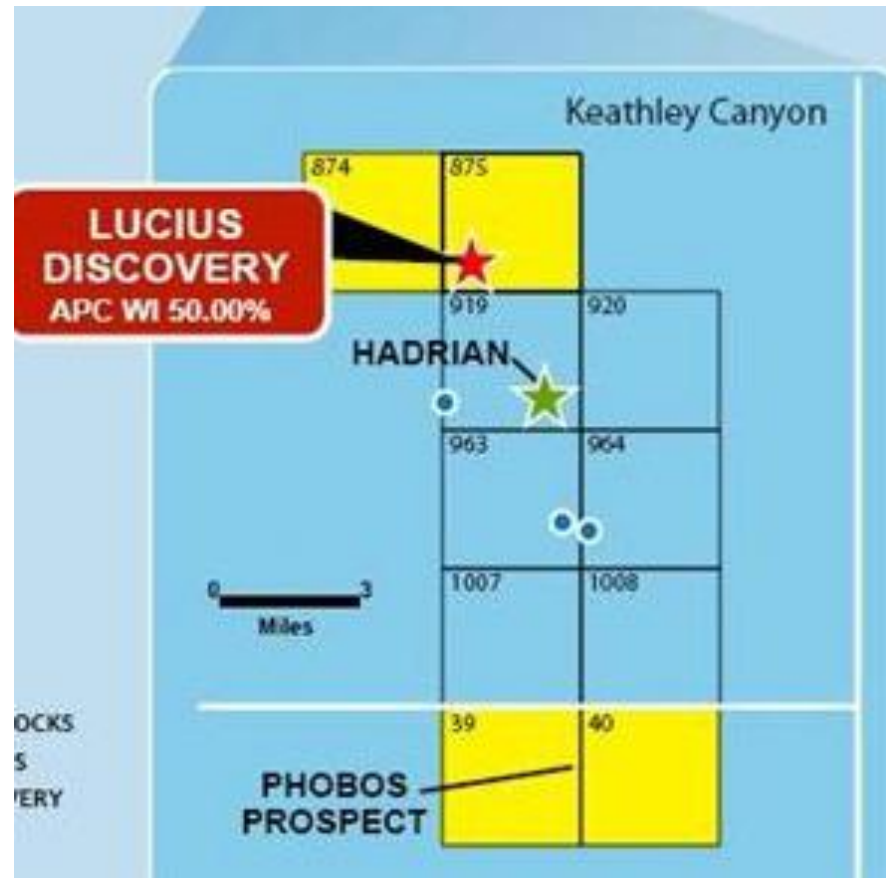
Size: 2”

Class: API6A cl10000

Material: DSX

Operator: Manual

Feature: API6AV1 endurance test  
Sand Service





## API6A 15000 valves



Customer: Chevron - Cameron

Project: Tahiti

Country: USA- Gulf of Mexico

Year: 2012

Valve type: Ball Trunnion

Depth: 1,339 m / 4,419 ft

Size: 2"

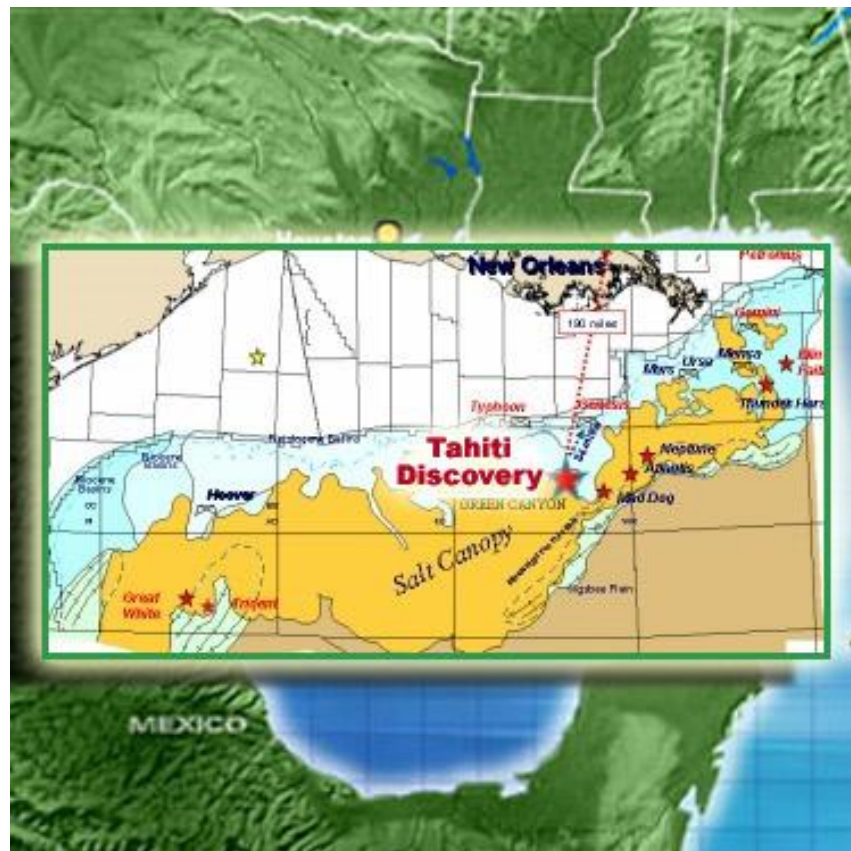
Class: API6A cl 15000

Material: SDX

Trim: Metal to Metal

Operator:

Feature: PR2 test







**API6A 15000 valves**

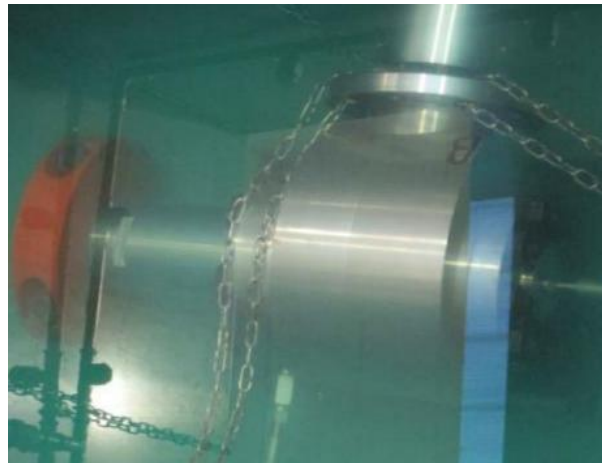


Customer: Chevron - Cameron

Project: Tahiti



Hydro Test



PSL4  
GasTest under water



High Temperature test

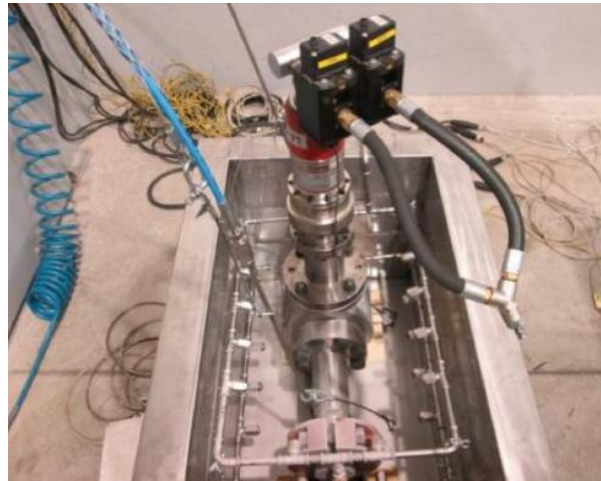


**API6A 15000 valves**

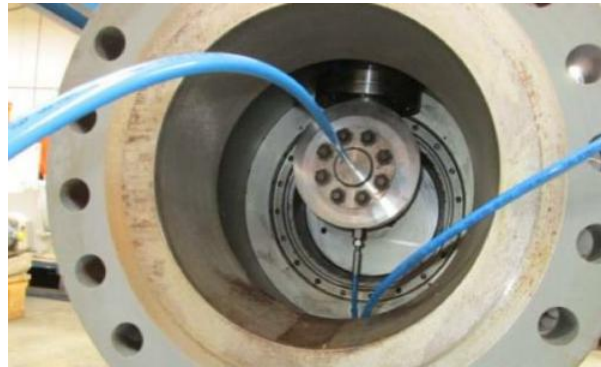


Customer: Chevron - Cameron

Project: Tahiti



Low Temp Test



Hyperbaric chamber test



Endurance test



Statoil

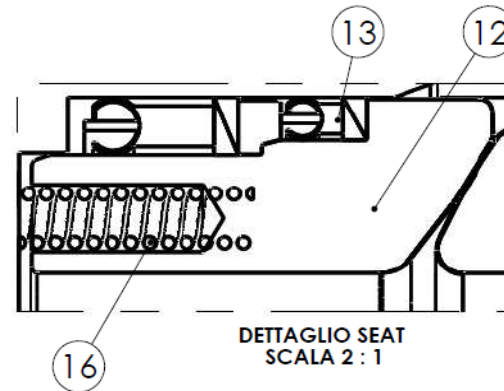
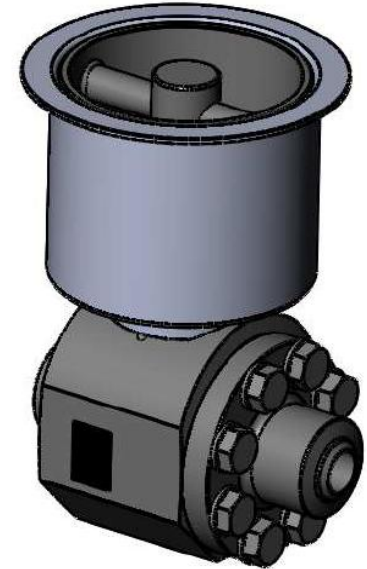
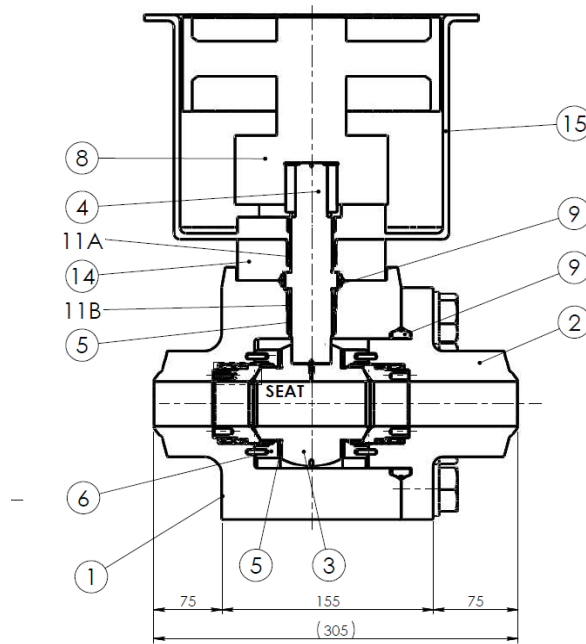
Customer: Statoil  
Project: Polarled  
Country: Norway  
Year: 2014  
Valve type: Ball and Modular  
Depth: 1300 Mt  
Size: 3/4" - 3/4"  
Class: 1500 - 5000  
Material: F55  
Operator: ROV  
Feature: Modular Needle+Check  
PR2 test





Statoil

Customer: Statoil  
Project: Polarled  
Country: Norway  
Year: 2014  
Valve type: Ball 1500 class  
Depth: 1300 Mt  
Size: 3/4" - 3/4"  
Class: 1500 - 5000  
Material: F55  
Operator: ROV  
Feature: MTM – Double Lip Seal

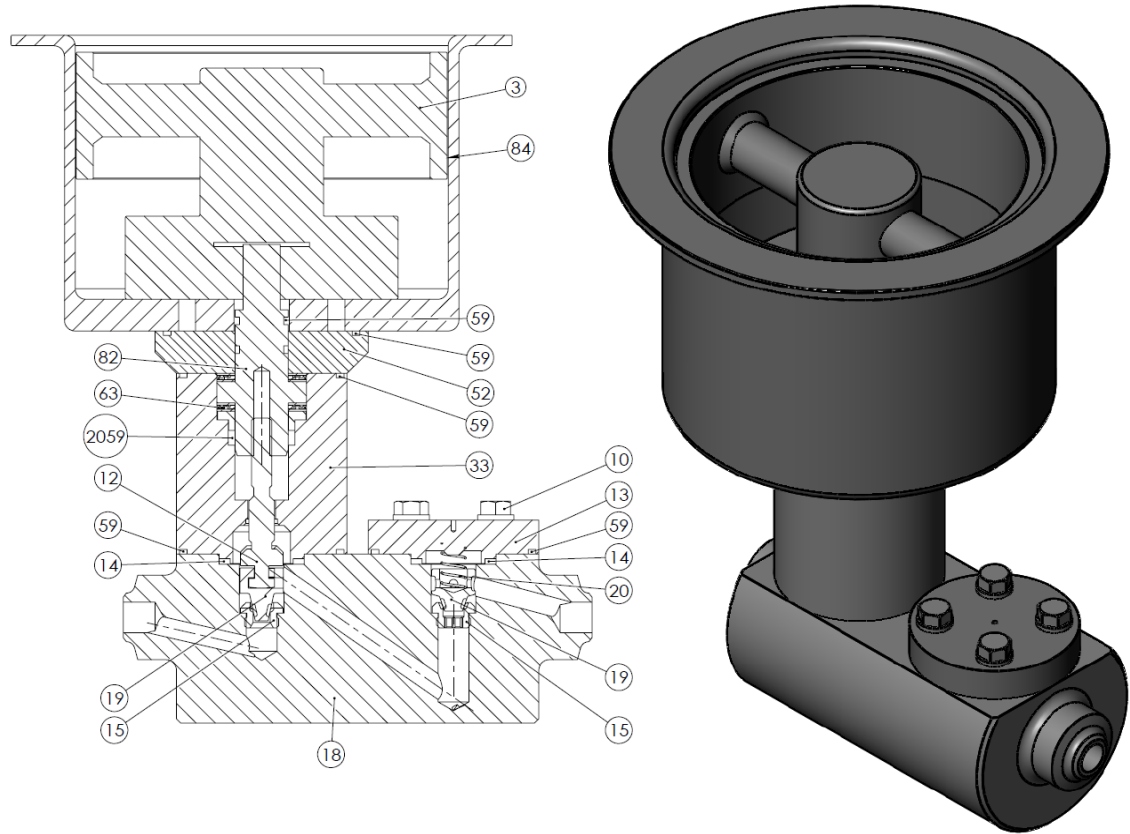




Statoil

Customer: Statoil  
Project: Polarled  
Country: Norway  
Year: 2014  
Valve type: Ball 1500 class  
Depth: 1300 Mt  
Size: 3/4"  
Class: 5000  
Material: F55  
Operator: ROV

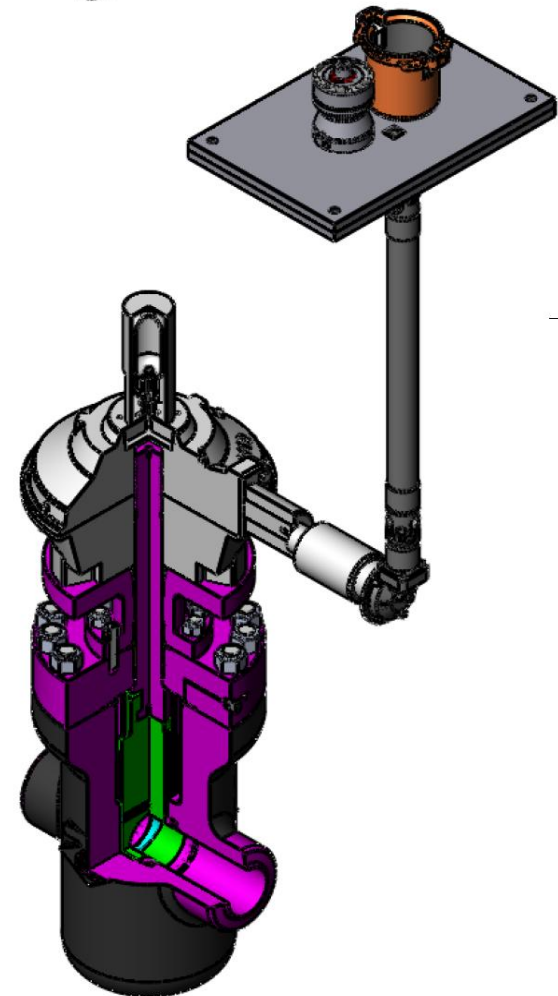
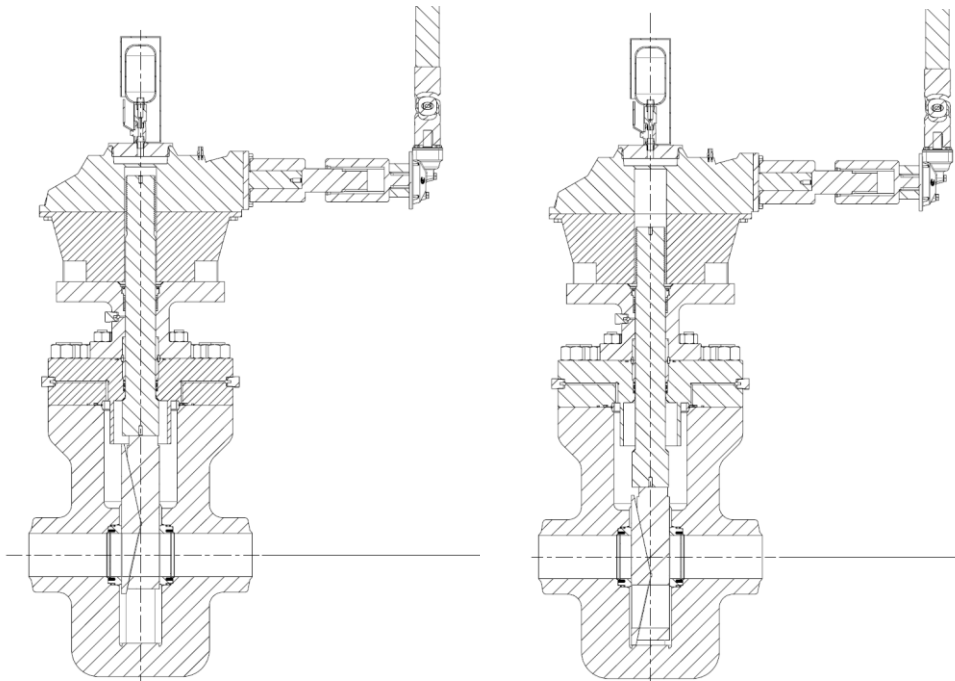
Feature: Needle + Lift Check  
PR2 Test





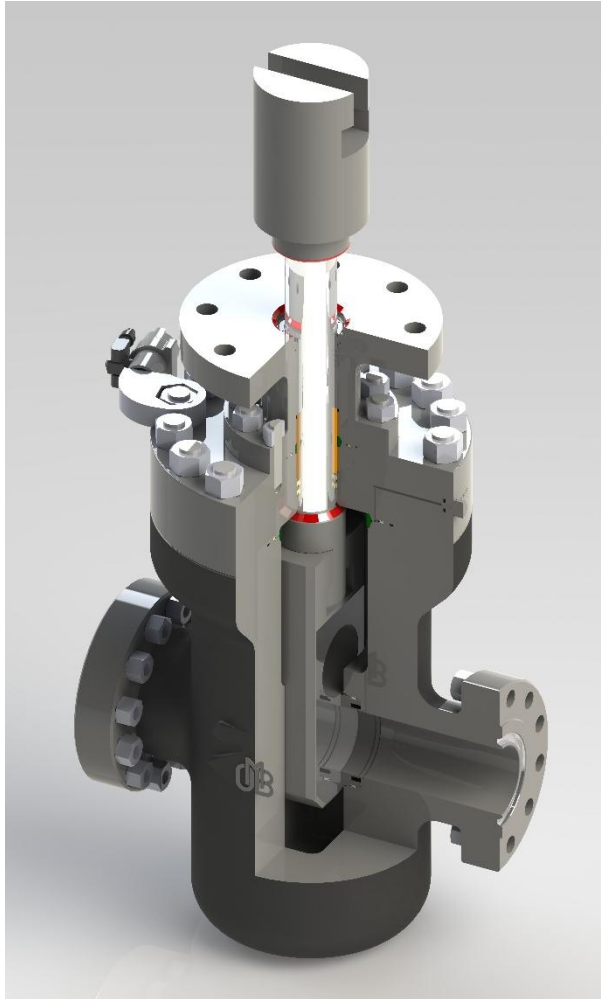
OMB is committed to expand its presence in the subsea market and has initiated development of new product lines in cooperation with Aker of Norway

OMB plan to complete development in the 3Q 2014 , inclusive of PR2 at 1300-1700mt of a 5» 10000 Double expanding Gate valve

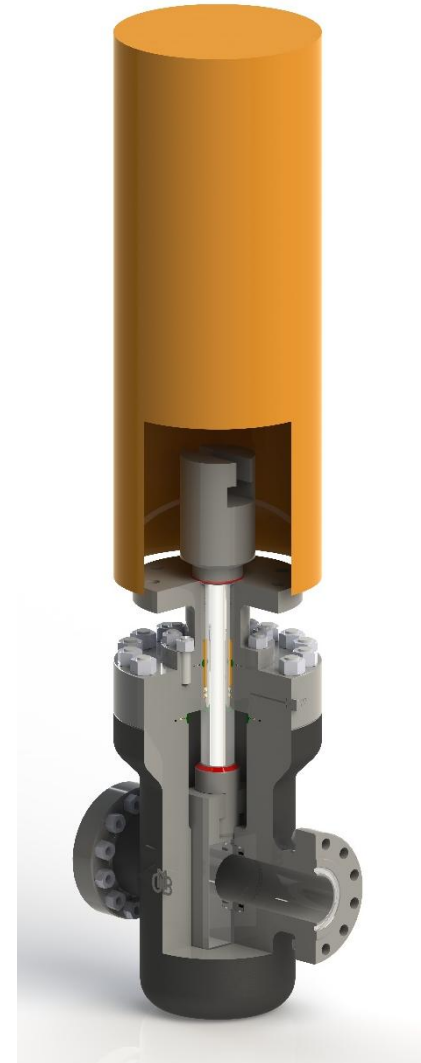




## Double Expanding Thru Conduit Gate 10K 5.1/8"



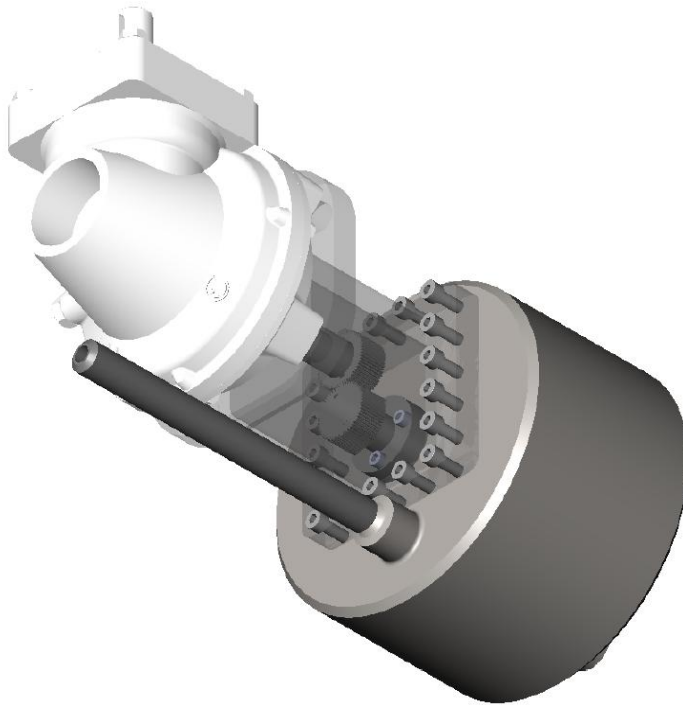
**Subsea  
Linear actuator  
Developed by  
OMB valves**



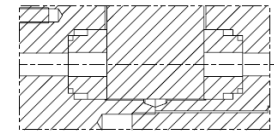
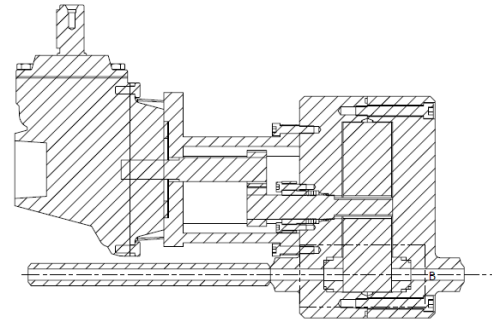


## Rotary Gate Valve 10K 1/2"

OMB is developing as well a line of ROTARY GATE VALVES , class 10000, size ½»

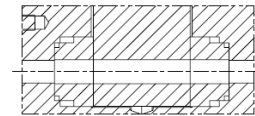
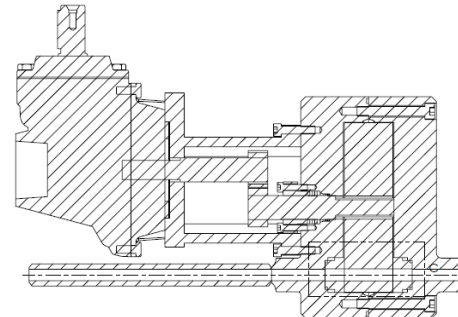


CLOSED VALVE



DETAGLIO B  
SCALA 2 : 3

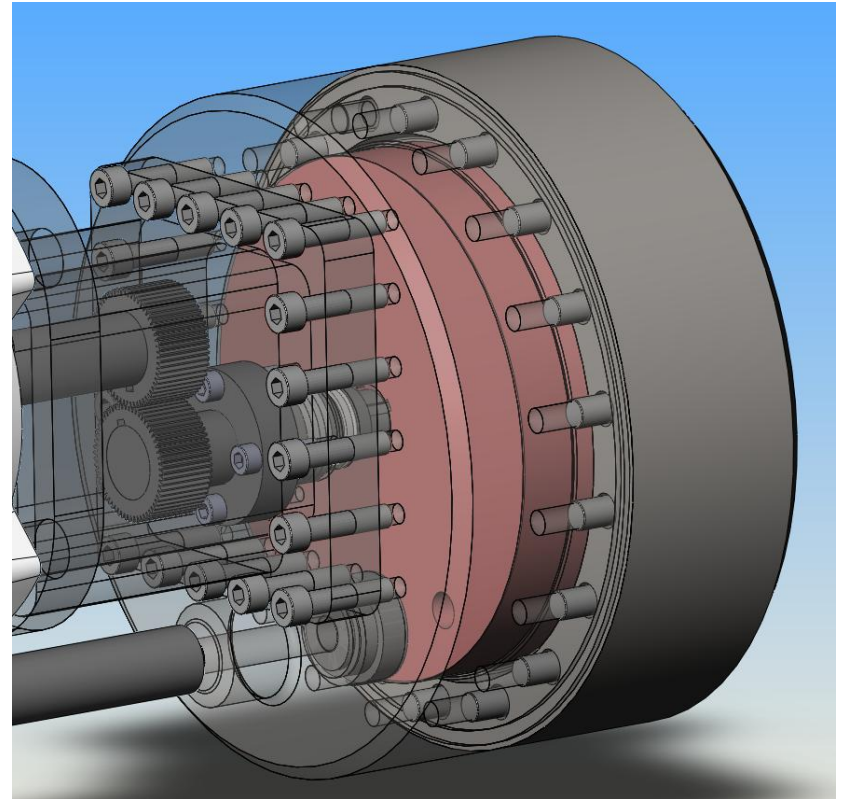
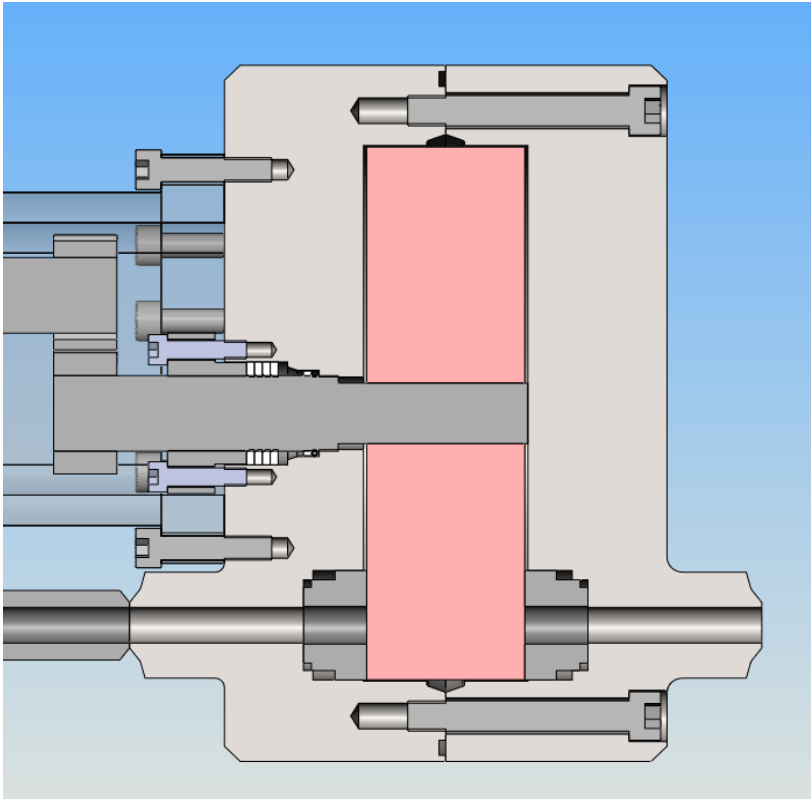
OPEN VALVE



DETAGLIO C  
SCALA 2 : 3



OMB is developing as well a line of ROTARY GATE VALVES , class 10000, size ½»



OMB Offshore Applications Ltd  
sales@omboffshore.com

# Thanks