

## Key Benefits

- **ISO13628-6 tested, approved for use by all major equipment manufacturers**
- **Specified for high-pressure & high-temperature wells with downhole temperatures up to 180°C / 356°F**
- **Excellent corrosion protection (liquid & vapor phase) and lubrication properties**
- **Outstanding stability with high levels of seawater ingress**
- **Resistant to microbial infection**
- **Fluorescent dye for leak detection**
- **Fully compatible with Oceanic HW500 Series, HW500P Series, HW500E Series, HW443 Series & XT900**
- **Manufactured to NAS 1638/AS 4059 Class 6/6b-f or better cleanliness**
- **Meets stringent global environmental acceptability regulations**
- **Free Fluid Monitoring programme ensures long service life**

## Description

High-performance, high-temperature water-based hydraulic fluids with an operational temperature range from -25°C to 180°C (-13°F to 356°F). Oceanic HW700 fluids are used in modern open and closed loop Subsea Production control systems.

Oceanic HW700 series are compatible with each other and offer the same excellent technical performance. Fluids differ only in glycol content, which ensures optimal response times in all geographical regions.

## Approvals

Oceanic HW700 series fluids are approved for use by all major equipment, umbilical, DCV & DHSV manufactures. Oceanic HW700 series fluids are for high-pressure, high-temperature applications tested to and meeting the acceptance criteria within ISO13628-6.



## Typical Physical Properties

	Oceanic HW720R	Oceanic HW740R
Appearance	Clear Red/Pink Fluorescent Fluid	Clear Red/Pink Fluorescent Fluid
pH	9.0	9.0
Specific Gravity @15.6°C	1.037	1.07
Kinematic Viscosity (cSt)		
-20°C (-4°F)	Solid	25
0°C (32°F)	4.4	9.2
40°C (104°F)	1.4	2.5
Pour Point	<-6°C (21°F)	<-31°C (-24°F)

For further recommendations, technical information, Health & Safety data sheets, OEM or environmental approvals, email [wigansales@macdermid.com](mailto:wigansales@macdermid.com)

THE CONTROL FLUID TECHNOLOGY LEADER

Oceanic HW700 Series | Issue No. 10 Date: Aug 2011 | [www.macdermid.com/offshore](http://www.macdermid.com/offshore)



OCEANIC HW700 SERIES

## Environmental Information

MacDermid maintains worldwide environmental approvals and can offer Oceanic Subsea Production control fluids suitable for use in every exploration and production region around the world. The current environmental status of Oceanic HW700 fluids in your area can be obtained from our environmental specialists.

## Storage

Oceanic HW700 fluids should be stored in dry conditions, ideally out of direct sunlight. Normal storage temperature range is 5 to 40°C.

## Material Compatibility

Oceanic HW700 fluids contain performance additives which ensure high levels of compatibility with materials typically used in subsea production control equipment. Extensive material compatibility tests have been performed with Oceanic HW700 fluids.

Ferrous metals (cast iron, carbon steel, ..... low & high alloy steels, stainless steels...)	Compatible
Non-ferrous metals (copper, brass, bronze and other metals and alloys*)	Compatible with alloys typically used in subsea production control equipment. Avoid Zn, Cd, Pb and Mg metals. Aluminum should be hard anodized.
Coatings and ceramic materials	Avoid porous coatings. Compatible with most ceramic parts. Check ceramic coatings
Packaging & sealing materials (elastomers and thermoplastics*)	Compatible with standard NBR, HNBR, FFKM, VMQ/FMVQ, CR, TFE/PTFE, PEEK. Some FKM & AU/EU/PU have proven to be incompatible
Umbilical hose liner thermoplastics	Compatible with Nylon 11, PE and Polyether ester copolymers
Absorbent gasket materials	Avoid cork, leather, cotton impregnated materials
Paints	Avoid painting internal surfaces Cured epoxy, phenolic and nylon based paints are satisfactory. Avoid less resistant paints as they soften. Wash spillages immediately with water
Filter elements	Polypropylene and glass fiber filter elements recommended over paper filters

\* As material compatibility varies from compound to compound and supplier to supplier, consult supplier for recommendations or request specific compatibility tests.

### MacDermid Offshore Solutions A Subsidiary of MacDermid Group

#### Manufacturing Locations

##### United Kingdom

MacDermid Offshore Solutions UK  
 Cale Lane, New Springs  
 Wigan  
 WN2 1JR  
 Tel: +44 (0)1942 501000  
 Fax: +44 (0)1942 501110  
 E-mail: wigansales@macdermid.com

##### USA

MacDermid Offshore Solutions Ltd  
 223 N Brockman  
 Pasadena, TX 77506  
 USA Tel: (US) 800 521 2589  
 Outside US: +1 713 472 5081  
 Fax: 713 472 2440  
 E-mail: offshoreorders@macdermid.com

##### Brazil

MacDermid Anion  
 Rua Eli Walter Cesar, 110  
 Jd Alvorada  
 Jandira, São Paulo  
 Cep.: 06612-130  
 Tel: +55 11 4789 8585  
 E-mail: offshoreorders@macdermid.com

##### Australia

MacDermid Offshore Solutions  
 29 Dennis Street  
 Campbellfield, Melbourne  
 Victoria 3061  
 Tel: +61 3 9303 5150  
 Fax: +61 3 9303 5166  
 E-mail: wigansales@macdermid.com

For further recommendations, technical information, Health & Safety data sheets, OEM or environmental approvals, email [wigansales@macdermid.com](mailto:wigansales@macdermid.com)

THE CONTROL FLUID TECHNOLOGY LEADER

Oceanic HW700 Series | Issue No. 10 Date: Aug 2011 | [www.macdermid.com/offshore](http://www.macdermid.com/offshore)



Oceanic HW700 Series