Product	Benefits	Technology	ISO viscosity grades	Specifications and approvals (Full details of approvals for all products can be obtained from your Shell representative; approvals and claims will vary by viscosity grade.)
Shell Tellus S4 ME	<ul><li>Extra long life</li><li>Energy saving</li></ul>	Synthetic, ashless	HM/22, 32, 46, 68	Approved by Denison Hydraulics, Cincinnati Machine, Eaton (Vickers), Bosch Rexroth and many other equipment manufacturers Industry standards: ASTM D6158, ISO 11158, DIN 51524-2
Shell Tellus 53 M	<ul><li>Long life and improved protection</li><li>Industrial applications</li></ul>	Mineral, ashless	HM/22, 32, 46, 68, 100	Approved by Denison Hydraulics, Eaton (Vickers), Cincinnati Machine and many other equipment manufacturers Industry standards: ISO 11158, DIN 51524-3, ASTM D6158
Shell Tellus 52 V	<ul><li>Extra protection</li><li>Versatile application</li></ul>	Mineral, zinc-based	HV/15, 22, 32, 46, 68, 100	Approved by Denison Hydraulics, Cincinnati Machine, Eaton (Vickers) and many other equipment manufacturers Industry standards: ISO 11158, ASTM D6158-05, DIN 51524-3
Shell Tellus S2 M	<ul><li>Extra protection</li><li>Industrial applications</li></ul>	Mineral, zinc-based	HM/22, 32, 46, 68, 100	Approved by Denison Hydraulics, Cincinnati Machine, Eaton (Vickers), Bosch Rexroth and many other equipment manufacturers Industry standards: ISO 11158, ASTM D6158-05, DIN 51524-2
Shell  Hydraulic 51 M	<ul><li>Reliable protection</li><li>Industrial applications</li></ul>	Mineral, zinc-based	HM/32, 46, 68	ISO 11158
Speciality grades				
Shell Tellus <i>54 VX</i>	■ Ultra-low temperature ■ Versatile application	Special base oils, ashless	HV/32	Approved by Komatsu Mining, Komatsu and DIETZ automation (servo valve and proportional valve test equipment)
Shell Tellus S2 VA	<ul><li>Extra protection</li><li>Water tolerant</li></ul>	Mineral, zinc-based, detergent	L·HV/46	Industry standards: DIN 51502, ISO 6743/4, ISO 11158, ASTM 6158-05
Shell Irus	A full range of fire-resistant and less flammable fluids for special applications			Contact your Shell representative for details
Shell Naturelle	A full range of environmentally considerate hydraulic oils			Contact your Shell representative for details

# **FULL PRODUCT AND SERVICE PORTFOLIO**

Shell Lubricants is named a global leader in lubricants (Kline & Company 2009) and has a 60-year history of innovation. It is constantly investing to develop better lubrication solutions, including advanced synthetic technologies such as

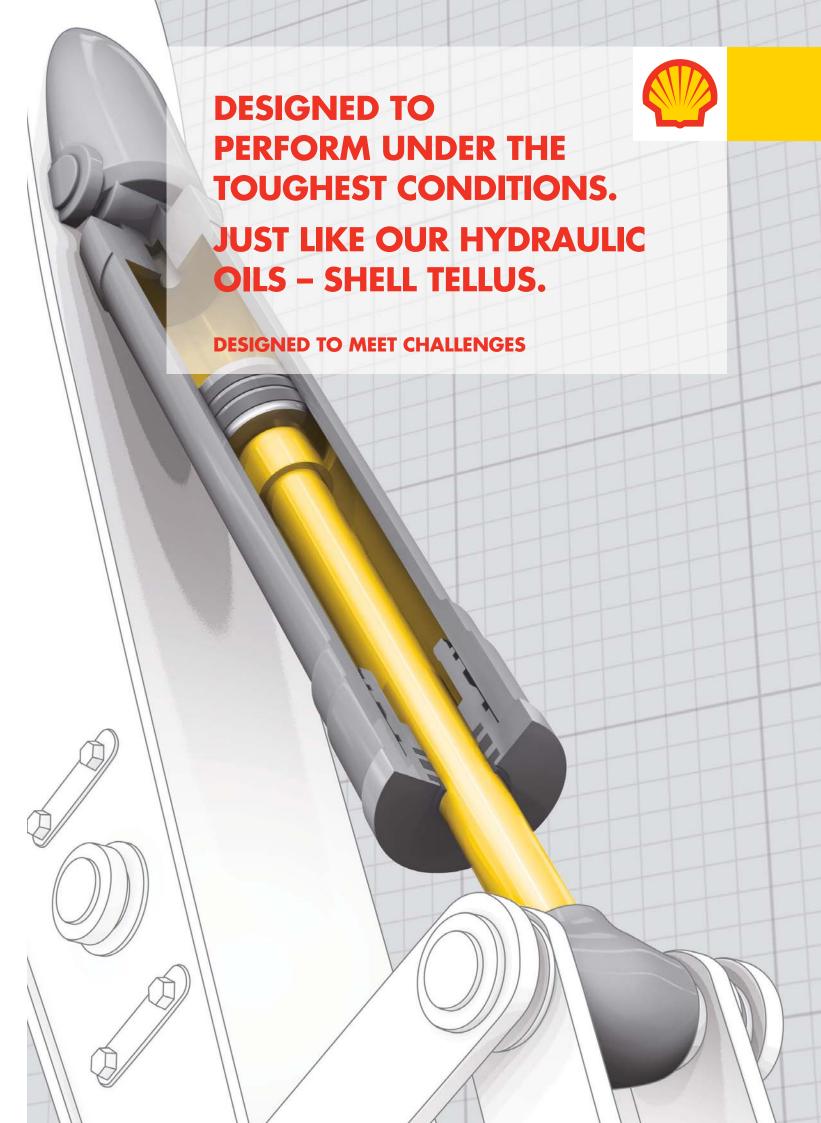
- Shell Omala S4 GX synthetic gear oil for long life in demanding environments
- Shell Corena S4 R air compressor oil for up to 12,000 hours of protection.

In addition, Shell provides the excellent Shell LubeAnalyst oil condition monitoring service, which is designed to help improve your business performance.

Whatever your needs or application, Shell can provide a full range of oils and greases, including synthetic, high-performance products and additional services.



For more information, please contact



**EVERY PART OF YOUR MACHINE OR PROCESS HAS** BEEN METICULOUSLY ENGINEERED, SO YOU WANT TO BE SURE THAT YOU CHOOSE A LUBRICANT THAT HAS BEEN DESIGNED TO ENSURE THAT YOUR EQUIPMENT IS WELL PROTECTED AND WORKS EFFICIENTLY.

The Shell Tellus range of hydraulic fluids has been developed to enable equipment operators to select the oil that can help deliver optimum value to their operations through enhanced wear protection, long oil life and high system efficiency.

## **WEAR PROTECTION**

The hydraulic pump is the heart of your hydraulic system. Any wear can reduce efficiency and system service life. The Shell Tellus range of hydraulic fluids offers a range of options, including the latest synthetic, ashless technology that are designed to help extend pump life, even under the most severe conditions, through to proven, cost-effective, zinc-based additive technology for general use

### **OIL LIFE**

The longer the oil life, the less fluid maintenance is required to help your equipment operate for longer without interruption. The Shell Tellus range of hydraulic fluids enables you to match the oil life of the fluid to your operational needs. It includes extra-long-life synthetic technologies capable of up to four times standard life<sup>1</sup>, through to cost-effective, reliable products for less-demanding applications.

# **SYSTEM EFFICIENCY**

To help your equipment perform to its design standards, the hydraulic fluid needs to protect, lubricate and help transmit power in the most effective way possible. Shell Tellus hydraulic fluids are designed to help maintain or even improve the efficiency of hydraulic systems. From Shell Tellus S4 ME, which can improve the energy efficiency of many hydraulic systems, to Shell's highquality mainstream products that provide reliable air release, filterability and cleanliness, there is a choice that can help to optimise your system's efficiency and costs of operation.

# A RANGE OF HYDRAULIC FLUIDS DESIGNED TO MEET YOUR NEEDS

To meet the challenges of a wide range of hydraulic equipment and applications, Shell has designed a portfolio of fluids that enables you to choose a product to best match your needs.

### **PRODUCT-NAME SUFFIX KEY**

- Water tolerant
- **E** = Energy saving, high efficiency
- Manufacturing/machine: factory applications
- Versatile applications
- = Extra/extreme performance

### **APPLICATION ICON KEY**

Factory/machine applications

(24/7) Long life

High load

Ultra-low temperature

Mobile equipment/exterior use Wet conditions

# THE SHELL TELLUS "M" RANGE

Industrial, manufacturing and machine use

# THE SHELL TELLUS **"V" RANGE**

Shell **Tellus 54** VX

■ Ultra-low temperature

■ Versatile applications

Lower wear and better

efficiency

Extended temperature operation for manufacturing and mobile machine use

# THE SHELL TELLUS **SPECIALITY RANGE**

Detergent-based fluids for use where water contamination is possible

# ADVANCED TIER N **^** NCREASINGLY EFFICIENT PROTECTION

PREMIUM **TIER** 

MAIN LINE Tier



Shell **Tellus** ■ Extra protection ■ Industrial applications

Better wear protection and longer oil life

Industrial applications

Shell **Hydraulic** ■ Reliable protection

Better wear protection and system efficiency

Shell **Tellus** ■ Extra protection **1** Versatile applications

Shell **Tellus** 

- Water tolerant
- Versatile applications







### **IMPROVED CLEANLINESS**

All Shell Tellus products now meet the demanding cleanliness requirements of the DIN industry standard to help provide extra protection, improved filter performance and less maintenance.

- "Shell Lubricants" refers to the various Shell companies engaged in the lubricants business

  1 Compared with other oils in the Shell range
- <sup>2</sup> The actual savings depend on the application, the current oil, the maintenance procedures, the equipment condition, the operating conditions and the intensity of

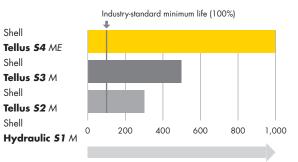
## **REAL-WORLD VALUE DELIVERY**

444

While many other companies design their fluids for the individual components of a hydraulic system such as the pump, Shell Lubricants looks at the system more broadly. For instance, Shell Tellus S4 ME has been designed to benefit the complete system. The result is a fluid that

- is statistically proven to help improve the energy efficiency of the system in which it is used. In a carefully controlled test cycle, one injection moulding equipment maker measured energy savings of up to 6.4% in the hydraulic systems in which Shell Tellus S4 ME was used.
- can help to increase oil life by up to four times compared with conventional oils in the Shell range
- can help to prolong equipment life through excellent hydraulic pump wear protection.

Shell Tellus S4 ME – For the longest oil life in the Shell range



Higher is better

Relative oil life, typical (%) (Industry-standard test ASTM D935)