Product	Benefits	Specifications and approvals (Full details of approvals for all products can be obtained from your Shell representative.)
Gearboxes and manual transmissions		
Shell **Spirax S6** *GXME*	■ Exceptional performance ■ Energy efficient ■ Maintenance saving	Exceeds requirements of API GL-4 and MT-1; meets requirements of ZF TE-ML-02D Approved by MAN 341 Type E4; and Volvo 97307
Shell **Spirax S2** *G*	■ Proven performance	Meets requirements of API GL-4
Axles		
Shel **Spirax S6** *AXME*	■ Exceptional performance ■ Energy efficient ■ Maintenance saving	Meets requirements of API GL-5 and MT-1; MIL-PRF-2105E; and SAE J2360 Approved by AGMA Standard 250.03; ArvinMeritor O76-N, O76-E, O76-M, O76-Q and O76-R; DAF; Dana SAES-256 Rev. C; GE D50E9C; International TMS 6816; Mack GL-J and GO-J Plus; MAN 342 Type S1; Scania STO 1.0; US Steel 224; Volvo 97312; ZF TE-ML 05B, 07A, 12B, 16F, 17B, 19C and 21B
Shell **Spirax S3** *AX*	■ Proven performance ■ Key OEM specifications	Exceeds requirements of API GL-5 and MT-1; meets requirements of MIL-L-2105D; MAN 342 Type M2; and ZF-TE-ML
Shell **Spirax S2** *A*	■ Proven performance	Meets requirements of API GL-5
Automatic transmissions		
Shell **Spirax S4** *ATF HDX*	■ Proven performance ■ Versatile application	Meets requirements of Ford Mercon®; General Motors Dexron® IIIG; Allison C4; Mercedes-Benz 236.9; 339 Type Z2 and 339 Type V2; Voith 55.6336 (ex, G1363); and ZF TE-ML 04D, 09, 14B, 16L and 17C
Shell **Spirax S2** *ATF D2*	■ Proven performance	Meets requirements of General Motors Dexron® II and Allison C4

FULL PRODUCT AND SERVICE PORTFOLIO

Shell Lubricants is named the number one lubricants supplier [Kline & Company, 2009] and has a 60-year history of innovation. It constantly invests to develop better lubrication solutions, including advanced synthetic technologies such as

- Shell Rimula R5 LME synthetic heavy-duty engine oil
- Shell Spirax S6 AXME synthetic axle oil.

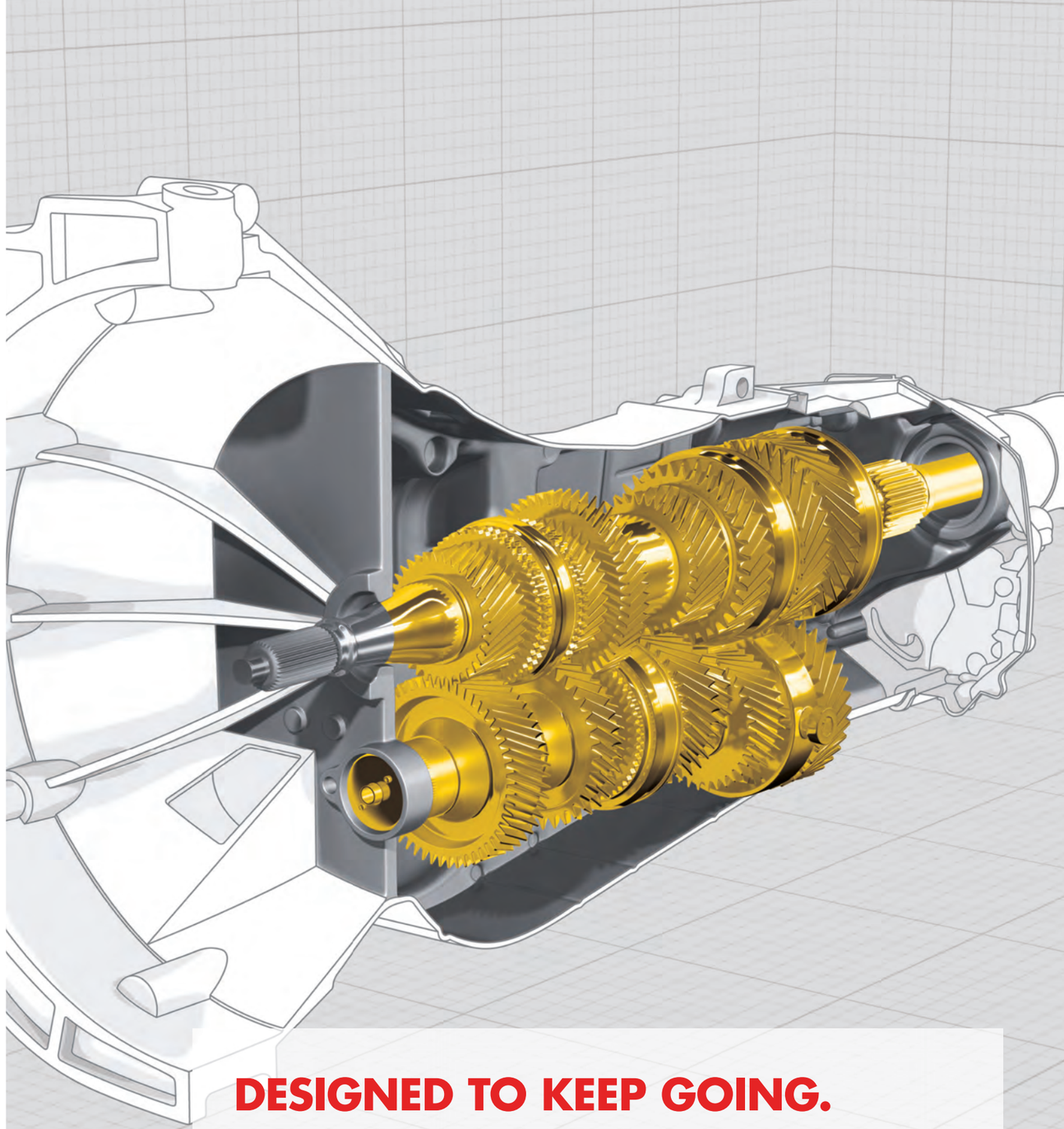
In addition, Shell provides the excellent Shell LubeAnalyst oil condition monitoring service, which is designed to help improve your business performance.

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

shell.com/lubricants

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



DESIGNED TO KEEP GOING.

JUST LIKE OUR AXLE, GEAR AND TRANSMISSION OILS – SHELL SPIRAX.

DESIGNED TO MEET CHALLENGES

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

The Shell Spirax range of axle, gear and automatic transmission fluids has been developed to enable drivers, fleet owners and owner operators to select the oil that will deliver optimum value to their operations through enhanced wear protection, long oil life and efficiency.

PERFORMANCE YOU CAN COUNT ON

The benefits of Shell Spirax S6 GXME and Shell Spirax S6 AXME have been demonstrated through extensive laboratory tests and over 20 million kilometres of field trials. Shell's axle and gear oils are developed in close co-operation with customers and equipment manufacturers. The Shell Spirax range is approved by many vehicle and automotive component manufacturers.

PRODUCT-NAME SUFFIX KEY

A	=	Axle	**M**	=	(Low) maintenance
ATF	=	Automatic transmission fluid	**M**	=	Mercon®/MAN
D	=	Daimler/Dexron®	**U**	=	Allison
E	=	Energy efficiency	**V**	=	Voith
G	=	Gear	**X**	=	Multi-vehicle/multi-OEM
HD	=	Heavy duty	**Z**	=	ZF
LS	=	Limited slip			

APPLICATION ICON KEY

Heavy truck · Truck · Heavy truck cabover · Tractor · Passenger car · Motorbike · Excavator · SUV · Bus/coach · Pickup

PROVEN WEAR PROTECTION

Protecting axles and gears from wear can help to reduce maintenance costs, extend vehicle life and maximise your return on investment.

The Shell Spirax range of axle and gear oils offers proven protection, including the latest synthetic oils that deliver exceptional wear, pitting, bearing-failure and corrosion protection for heavy-duty axles, transmissions and gears operating under highly stressed conditions. This can help to reduce your costs.

LONGER OIL AND COMPONENT LIFE

The longer an oil goes on protecting its components, the less maintenance your vehicle requires, so it can continue to operate with less interruption, which can reduce your maintenance costs. The Shell Spirax range contains oils that are designed to offer you value through exceptional oil life and protection that enable oil-drain intervals and component life to be extended. For example, in industry-standard oxidation tests, Shell Spirax S6 AXME axle oil remains in specification after four times the normal duration of the test, which means that it can go on protecting your vehicle components for longer.

EFFICIENCY

Shell Spirax oils are designed to help keep your transmission components protected so that they can go on working efficiently. For instance, Shell Spirax S6 AXME and Shell Spirax S6 GXME have special frictional properties and high fluidity that reduce power loss, lower the operating temperature and offer higher mechanical efficiency. These properties can help to deliver fuel efficiency and savings.

INCREASINGLY EFFICIENT PROTECTION

	GEARBOXES AND MANUAL TRANSMISSIONS	AXLES	AUTOMATIC TRANSMISSIONS
ADVANCED TIER 6\5	Shell **Spirax** ***S6*** *GXME* **SYNTHETIC** ■ Exceptional performance ■ Energy efficient ■ Maintenance saving	Shell **Spirax** ***S6*** *AXME* **SYNTHETIC** ■ Exceptional performance ■ Energy efficient ■ Maintenance saving	
PREMIUM TIER 4\3		Shell **Spirax** ***S3*** *AX* ■ Proven performance ■ Designed for OEMs/MAN/Daimler	Shell **Spirax** ***S4*** *ATF HDX* ■ Proven performance ■ Versatile application
MAIN LINE TIER 2	Shell **Spirax** ***S2*** *G* ■ Proven performance	Shell **Spirax** ***S2*** *A* ■ Proven performance	Shell **Spirax** ***S2*** *ATF D2* ■ Proven performance ■ Dexron® IID

Greater fuel efficiency and lower maintenance

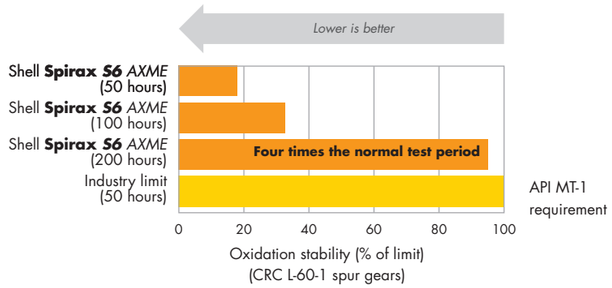
Contact your Shell representative to find out about the full range of Shell Spirax axle, gear and automatic transmission fluids, including products specifically designed for the construction and agriculture industries

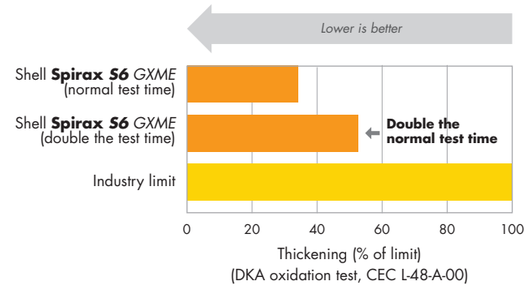
THE BENEFITS OF USING DEDICATED AXLE AND GEAR OILS

Many gearboxes and axles use different materials and operate under different conditions. A single oil used for both applications may lead to a compromise in either or both the axle and gearbox wear protection and efficiency. Shell Spirax oils have been specifically designed to meet the challenges and requirements of many industry-leading automatic transmission, axle and gear manufacturers.

The oils are formulated by Shell's scientists to help deliver the specific oxidation, shear stability and performance characteristics needed to best provide protection, power and efficiency for each application.

Shell Spirax S6 GXME and Shell Spirax S6 AXME – For the longest oil life in the Shell range





Previous Name: **Shell Spirax A 80W-90**

Shell **Spirax** *S2 A 80W-90*

High quality, GL-5 axle oil

Spirax S2 A 80W-90 is blended for use in a wide variety of automotive axle units subjected to heavy duty conditions.

DESIGNED TO MEET CHALLENGES

Performance, Features & Benefits

- **Comprehensive components**

  Specially selected additives impart good anti-wear, anti-rust characteristics and oxidation stability.

- **High quality base oils**

  Maintains low temperature flow in the designed temperature range, resists oxidation, and maintains oil film between gears.

Main Applications

- Automotive transmissions, differentials
- Moderate to heavily loaded gear sets in stationary and ancillary equipment
- Hypoid gear axles
- Motorcycle gear units separate from the engine
- Other automotive transmission units operating under high speed/shock load, high speed/low torque and low speed/high torque conditions.

Specifications, Approvals & Recommendations

- API Service Classification GL-5

  For a full listing of equipment approvals and recommendations, please consult your local Shell Technical Helpdesk.

Typical Physical Characteristics

Properties			Method	Shell Spirax S2 A 80W-90
SAE Viscosity Grade			SAE J 306	80W-90
Kinematic Viscosity	@40°C	mm^2/s	ISO 3104	146
Kinematic Viscosity	@100°C	mm^2/s	ISO 3104	14.7
Viscosity Index			ISO 2909	100
Density	@15°C	kg/m^3	ISO 12185	904
Flash Point (COC)		°C	ISO 2592	175
Pour Point		°C	ISO 3016	-27

These characteristics are typical of current production. Whilst future production will conform to Shell's specification, variations in these characteristics may occur.

Health, Safety & Environment

- **Health and Safety**

  Shell Spirax S2 A 80W-90 is unlikely to present any significant health or safety hazard when properly used in the recommended application and good standards of personal hygiene are maintained.

  Avoid contact with skin. Use impervious gloves with used oil. After skin contact, wash immediately with soap and water.

  Guidance on Health and Safety is available on the appropriate Material Safety Data Sheet, which can be obtained from http://www.epc.shell.com/

- **Protect the Environment**

  Take used oil to an authorised collection point. Do not discharge into drains, soil or water.

Additional Information

- **Advice**

  Advice on applications not covered here may be obtained from your Shell representative.

Technical Data Sheet

Previous Name: **Shell Spirax A 85W-140**

Shell **Spirax** *S2 A 85W-140*

High quality, GL-5 axle oil

Shell Spirax S2 A 85W-140 is blended for use in a wide variety of automotive axle units subjected to heavy duty conditions.

DESIGNED TO MEET CHALLENGES

Performance, Features & Benefits

- **Comprehensive components**
  Specially selected additives impart good anti-wear, anti-rust characteristics and oxidation stability.
- **High quality base oils**
  Maintains low temperature flow in the designed temperature range, resists oxidation, and maintains oil film between gears.

Main Applications

- Automotive transmissions, differentials.
- Moderate to heavily loaded gear sets in stationary and ancillary equipment.
- Hypoid gear axles.
- Motorcycle gear units separate from the engine.
- Other automotive transmission units operating under high speed/shock load, high speed/low torque and low speed/high torque conditions.

Specifications, Approvals & Recommendations

- API Service Classification GL-5

For a full listing of equipment approvals and recommendations, please consult your local Shell Technical Helpdesk, or the OEM Approvals website.

Typical Physical Characteristics

Properties			Method	Shell Spirax S2 A 85W-140
SAE Viscosity Grade			SAE J 306	85W-140
SAE Viscosity Grade			SAE J 306	85W-140
Kinematic Viscosity	@40°C	mm^2/s	ISO 3104	358
Kinematic Viscosity	@40°C	mm^2/s	ISO 3104	358
Kinematic Viscosity	@100°C	mm^2/s	ISO 3104	25.6
Kinematic Viscosity	@100°C	mm^2/s	ISO 3104	25.6
Viscosity Index			ISO 2909	94
Viscosity Index			ISO 2909	94
Density	@15°C	kg/m^3	ISO 12185	908
Density	@15°C	kg/m^3	ISO 12185	908
Flash Point (COC)		°C	ISO 2592	215
Flash Point (COC)		°C	ISO 2592	215
Pour Point		°C	ISO 3016	-15
Pour Point		°C	ISO 3016	-15

These characteristics are typical of current production. Whilst future production will conform to Shell's specification, variations in these characteristics may occur.

Health, Safety & Environment

- **Health and Safety**

  Shell Spirax S2 A 85W-140 is unlikely to present any significant health or safety hazard when properly used in the recommended application and good standards of personal hygiene are maintained.

  Avoid contact with skin. Use impervious gloves with used oil. After skin contact, wash immediately with soap and water.

Guidance on Health and Safety is available on the appropriate Material Safety Data Sheet, which can be obtained from http://www.epc.shell.com/

- **Protect the Environment**

  Take used oil to an authorised collection point. Do not discharge into drains, soil or water.

Additional Information

- **Advice**

  Advice on applications not covered here may be obtained from your Shell representative.

Technical Data Sheet

Previous Name: **Shell Spirax A 90**

Shell **Spirax** *S2 A 90*

High quality, GL-5axle oil

Shell Spirax S2 A 90 is blended for use in a wide variety of automotive axle units subjected to heavy duty conditions.

DESIGNED TO MEET CHALLENGES

Performance, Features & Benefits

- **Comprehensive components**
  Specially selected additives impart good anti-wear, anti-rust characteristics and oxidation stability.
- **High quality base oils**
  Maintains low temperature flow in the designed temperature range, resists oxidation, and maintains oil film between gears.

Main Applications

- Automotive transmissions, differentials.
- Moderate to heavily loaded gear sets in stationary and ancillary equipment.
- Hypoid gear axles.
- Motorcycle gear units separate from the engine.
- Other automotive transmission units operating under high speed/shock load, high speed/low torque and low speed/high torque conditions.

Specifications, Approvals & Recommendations

- API Service Classification GL-5
- For a full listing of equipment approvals and recommendations, please consult your local Shell Technical Helpdesk.

Typical Physical Characteristics

Properties			Method	Shell Spirax S2 A 90
SAE Viscosity Grade			SAE J 306	90
Kinematic Viscosity	@40°C	mm^2/s	ISO 3104	145
Kinematic Viscosity	@100°C	mm^2/s	ISO 3104	14.3
Viscosity Index			ISO 2909	96
Density	@15°C	kg/m^3	ISO 12185	909
Flash Point (COC)		°C	ISO 2592	180
Pour Point		°C	ISO 3016	-18

These characteristics are typical of current production. Whilst future production will conform to Shell's specification, variations in these characteristics may occur.

Health, Safety & Environment

- **Health and Safety**
  Shell Spirax S2 A 90 is unlikely to present any significant health or safety hazard when properly used in the recommended application and good standards of personal hygiene are maintained.

  Avoid contact with skin. Use impervious gloves with used oil. After skin contact, wash immediately with soap and water.

Guidance on Health and Safety is available on the appropriate Material Safety Data Sheet, which can be obtained from http://www.epc.shell.com/

- **Protect the Environment**

  Take used oil to an authorised collection point. Do not discharge into drains, soil or water.

Additional Information

- **Advice**

  Advice on applications not covered here may be obtained from your Shell representative.

Technical Data Sheet

Previous Name: **Shell Spirax A 140**

Shell Spirax *S2 A 140*

High quality, GL-5 axle oil

Shell Spirax S2 A 140 is blended for use in a wide variety of automotive axle units subjected to heavy duty conditions.

DESIGNED TO MEET CHALLENGES

Performance, Features & Benefits

- **Comprehensive components**
  Specially selected additives impart good anti-wear, anti-rust characteristics and oxidation stability.
- **High quality base oils**
  Maintains low temperature flow in the designed temperature range, resists oxidation, and maintains oil film between gears.

Main Applications

- Automotive transmissions, differentials.
- Moderate to heavily loaded gear sets in stationary and ancillary equipment.
- Hypoid gear axles.
- Motorcycle gear units separate from the engine.
- Other automotive transmission units operating under high speed/shock load, high speed/low torque and low speed/high torque conditions.

Specifications, Approvals & Recommendations

- API Service Classification GL-5

  For a full listing of equipment approvals and recommendations, please consult your local Shell Technical Helpdesk.

Typical Physical Characteristics

Properties			Method	Shell Spirax S2 A 140
SAE Viscosity Grade			SAE J 306	140
Kinematic Viscosity	@40°C	mm^2/s	ISO 3104	340
Kinematic Viscosity	@100°C	mm^2/s	ISO 3104	25.1
Viscosity Index			ISO 2909	96
Density	@15°C	kg/m^3	ISO 12185	918
Flash Point (COC)		°C	ISO 2592	199
Pour Point		°C	ISO 3016	-9

These characteristics are typical of current production. Whilst future production will conform to Shell's specification, variations in these characteristics may occur.

Health, Safety & Environment

- **Health and Safety**
  Shell Spirax S2 A 140 is unlikely to present any significant health or safety hazard when properly used in the recommended application and good standards of personal hygiene are maintained.

  Avoid contact with skin. Use impervious gloves with used oil. After skin contact, wash immediately with soap and water.

  Guidance on Health and Safety is available on the appropriate Material Safety Data Sheet, which can be obtained from http://www.epc.shell.com/
- **Protect the Environment**
  Take used oil to an authorised collection point. Do not discharge into drains, soil or water.

Additional Information

- **Advice**

  Advice on applications not covered here may be obtained from your Shell representative.

Technical Data Sheet

Previous Name: **Shell Spirax G 90**

Shell **Spirax** *S2 G 90*

High Quality API GL-4 Oil for Manual Transmissions and Gear Sets

Shell Spirax S2 G 90 is an automotive gear lubricant containing multi-functional additives required for mild extreme pressure conditions.

DESIGNED TO MEET CHALLENGES

Performance, Features & Benefits

- **Comprehensive components**

  Specially selected additives impart good anti-wear, anti-rust characteristics and oxidation stability.

Main Applications

- **Manual gearboxes**

  Shell Spirax S2 G 90 provides excellent lubrication of manual gearboxes of motorcycles, passenger cars and commercial vehicles (on and off road) operating under high speed/low torque and low speed/high torque conditions. Suitable for gearboxes fitted with synchromesh.

- **Rear axles**

  Suitable for applications presenting conditions of medium severity, such as some light duty commercial vehicles, passenger cars and motorcycles. Not suitable for heavy duty hypoid axles.

- **Gear sets**

  Suitable for applications presenting conditions of medium severity, such as lightly loaded gear sets of ancillary equipment in commercial vehicles.

Specifications, Approvals & Recommendations

- API Service Classification : GL-4

  For a full listing of equipment approvals and recommendations, please consult your local Shell Technical Helpdesk, or the OEM Approvals website.

Typical Physical Characteristics

Properties			Method	Shell Spirax S2 G 90
SAE Viscosity Grade			SAE J 306	90
Kinematic Viscosity	@40°C	mm^2/s	ISO 3104	145
Kinematic Viscosity	@100°C	mm^2/s	ISO 3104	14.3
Viscosity Index			ISO 2909	96
Density	@15°C	kg/m^3	ISO 12185	904
Flash Point (COC)		°C	ISO 2592	191
Pour Point		°C	ISO 3016	-18

These characteristics are typical of current production. Whilst future production will conform to Shell's specification, variations in these characteristics may occur.

Health, Safety & Environment

- **Health and Safety**

  Shell Spirax S2 G 90 is unlikely to present any significant health or safety hazard when properly used in the recommended application and good standards of personal hygiene are maintained.

  Avoid contact with skin. Use impervious gloves with used oil. After skin contact, wash immediately with soap and water.

  Guidance on Health and Safety is available on the appropriate Material Safety Data Sheet, which can be obtained from http://www.epc.shell.com/

- **Protect the Environment**

  Take used oil to an authorised collection point. Do not discharge into drains, soil or water.

Additional Information

- **Advice**

  Advice on applications not covered here may be obtained from your Shell representative.

Technical Data Sheet

Previous Name: **Shell ATF III**

Shell **Spirax** *S3 ATF MD3*

High Performance Automatic Transmission Fluid in Many Applications

Shell Spirax S3 ATF MD3 is a premium quality automatic transmission fluid based on high viscosity index mineral oils and carefully selected additives. It is blended to meet the stringent requirements of leading automotive transmission manufacturers.

DESIGNED TO MEET CHALLENGES

Performance, Features & Benefits

- **Friction modified**
  Provides consistent, reliable, smooth and trouble free operation of automotive transmission systems.
- **Exceptionally high oxidation resistance**
  Resistant to oil degradation and keeps automatic transmissions clean.
- **Excellent shear-stability**
  A special 'VI' improver minimises the changes in viscosity with operating temperature.
- **Dependable anti-wear and gear protection**
  Long component life.
- **Low temperature performance**
  Excellent oil fluidity at low temperatures.

Main Applications

- Passenger car automatic transmissions
- Heavy duty automatic transmissions
- Power steering units
- Certain hydraulic applications calling for oils meeting ISO VG 32-46-68 viscosity requirements

Specifications, Approvals & Recommendations

- Suitable for use in all vehicles where GM Dexron® III, Ford Mercon® or Allison C-4 fluids are required. Do not use where GM Dexron® VI or Ford Mercon® V/Mercon® SP/Mercon® LV fluids are specified.
- Dexron ® is a trademark in many countries belonging to General Motors Company. Mercon ® is a trademark in many countries belonging to Ford Motor Company.

  For a full listing of equipment approvals and recommendations, please consult your local Shell Technical Helpdesk.

Typical Physical Characteristics

Properties			Method	Shell Spirax S3 ATF MD3
Kinematic Viscosity	@40°C	mm^2/s	ISO 3104	33.8
Kinematic Viscosity	@100°C	mm^2/s	ISO 3104	7.3
Viscosity Index			ISO 2909	175
Density	@15°C	kg/m^3	ISO 12185	864
Flash Point (COC)		°C	ISO 2592	180
Pour Point		°C	ISO 3016	-48

These characteristics are typical of current production. Whilst future production will conform to Shell's specification, variations in these characteristics may occur.

Health, Safety & Environment

- **Health and Safety**

  Shell Spirax S3 ATF MD3 is unlikely to present any significant health or safety hazard when properly used in the recommended application and good standards of personal hygiene are maintained.

  Avoid contact with skin. Use impervious gloves with used oil. After skin contact, wash immediately with soap and water.

  Guidance on Health and Safety is available on the appropriate Material Safety Data Sheet, which can be obtained from http://www.epc.shell.com/

- **Protect the Environment**

  Take used oil to an authorised collection point. Do not discharge into drains, soil or water.

Additional Information

- **Colour**

  Shell Spirax S3 ATF MD3 is dyed red for identification purposes.

- **Advice**

  Advice on applications not covered here may be obtained from your Shell representative.

Technical Data Sheet

Previous Name: **Shell Donax TC 30**

Shell **Spirax** *S4 CX 30*

High Performance Off-Highway Transmission and Hydraulic Oil for Many Applications

Shell Spirax S4 CX 30 is designed to provide operators with trouble free operation and maximum reliability for the lifetime of the equipment. Spirax S4 CX meets the demanding requirements of modern transmission, final drive, oil immersed brake and hydraulic systems fitted to heavy-duty off-highway.

DESIGNED TO MEET CHALLENGES

Performance, Features & Benefits

- **Frictional performance and material compatibility**
  Highly consistent and reliable friction performance when used with the advanced metallic and non-metallic materials found in modern systems. Minimal clutch slippage, smooth and quiet brake operation, and trouble-free transmission operation.
- **Anti-wear protection**
  The shear-stable SAE 30 viscosity grade is free from viscosity index (VI) improvers and thickeners and give the best protection of heavily loaded components.
- **Low temperature characteristics**
  Formulated to meet low temperature viscosity and fluidity requirements, providing superior protection during start-up and low operating temperature conditions.
- **Optimum mechanical performance and long oil life**
  Wide-ranging protection for critical components, such as bronze friction discs in powershift transmissions and gears in final drives and differential units.
- **Vickers 35V25 hydraulic pump test**
  Excellent performance in this demanding test.
- **Oxidation stability**
  Contains inhibitors to control oxidation and deposit formation. Protects both ferrous and non-ferrous metals from corrosion. Suppresses foaming with improved flow properties at low temperatures enhances efficiency.

Main Applications


- Shell Spirax S4 CX 30 is recommended for use in heavy duty off-highway equipment produced by the world's leading manufaturers including; Caterpillar, Komatsu, Komatsu-Dresser and in transmissions manufactured by Eaton, Eaton Fuller, ZF, Dana, Rockwell amongst other:
- Powershift Transmissions
- Final drives
- Oil immersed brakes
- Hydraulic systems

Specifications, Approvals & Recommendations

- Caterpillar Tractor TO-4
- ZF TE-ML 03C, 07F
- Suitable for use in applications where Allison C-4 type fluids are required.
- Shell Spirax S4 CX 30 oil is suitable for use in many powershift or manual transmissions, wet brake systems, and some hydraulic systems including Komatsu.

  For a full listing of equipment approvals and recommendations, please consult your local Shell Technical HelpdesK.

Typical Physical Characteristics

Properties			Method	Shell Spirax S4 CX 30
SAE Viscosity Grade			SAE J 300	30
Kinematic Viscosity	@40°C	mm^2/s	ISO 3104	93.9
Kinematic Viscosity	@100°C	mm^2/s	ISO 3104	10.9
Density	@15°C	kg/m^3	ISO 12185	899
Flash Point (COC)		°C	ISO 2592	205
Pour Point		°C	ISO 3016	-30

These characteristics are typical of current production. Whilst future production will conform to Shell's specification, variations in these characteristics may occur.

Health, Safety & Environment

- **Health and Safety**

  Shell Spirax S4 CX 30 is unlikely to present any significant health or safety hazard when properly used in the recommended application and good standards of personal hygiene are maintained.

  Avoid contact with skin. Use impervious gloves with used oil. After skin contact, wash immediately with soap and water.

  Guidance on Health and Safety is available on the appropriate Material Safety Data Sheet, which can be obtained from http://www.epc.shell.com/

- **Protect the Environment**

  Take used oil to an authorised collection point. Do not discharge into drains, soil or water.

Additional Information

- **Advice**

  Advice on applications not covered here may be obtained from your Shell representative.

Previous Name: **Shell Donax TX**

Shell **Spirax** *S4 ATF HDX*

Advanced Synthetic Technology Heavy Duty Automatic Transmission Fluid

Shell Spirax S4 ATF HDX is a superior quality automatic transmission fluid suitable for a wide range of heavy duty automotive transport and passenger car transmissions.
Based on synthetic technology base fluid, Spirax S4 ATF HDX is the ultimate performance automatic transmission fluid allowing extended drain intervals even under the most severe conditions.

DESIGNED TO MEET CHALLENGES

Performance, Features & Benefits

- Synthetic base oil technology
- Excellent shift feeling
- Extremely low temperature fluidity
- Shear stability
- Wear protection
- Maximum oil drain interval potential
- High temperature oxidation stability

Main Applications

- Automotive automatic transmissions
- Automotive hydraulic systems
- Power steering
- Certain manual transmissions

Specifications, Approvals & Recommendations

- Ford : MERCON
- General Motors Allison : C-4
- ZF TE-ML : 04D 09 14B 16L 17C
- Voith : 55.6336 (ex G 1363)
- MB : 236.9
- MAN : 339 Typ Z2, 339 Typ V2
- Fulfils GM former Dexron IIIG specification.
- Volvo 97341
- For a full listing of equipment approvals and recommendations, please consult your local Shell Technical Helpdesk.

Typical Physical Characteristics

Properties			Method	Shell Spirax S4 ATF HDX
Kinematic Viscosity	@40°C	mm^2/s	ISO 3104	33.2
Kinematic Viscosity	@100°C	mm^2/s	ISO 3104	7.2
Viscosity Index			ISO 2909	189
Density	@15°C	kg/m^3	ISO 12185	847
Flash Point (COC)		°C	ISO 2592	152
Pour Point		°C	ISO 3016	-48

These characteristics are typical of current production. Whilst future production will conform to Shell's specification, variations in these characteristics may occur.

Health, Safety & Environment

- **Health and Safety**

Shell Spirax S4 ATF HDX is unlikely to present any significant health or safety hazard when properly used in the recommended application and good standards of personal hygiene are maintained.

Avoid contact with skin. Use impervious gloves with used oil. After skin contact, wash immediately with soap and water.

Guidance on Health and Safety is available on the appropriate Material Safety Data Sheet, which can be obtained from http://www.epc.shell.com/

- **Protect the Environment**

  Take used oil to an authorised collection point. Do not discharge into drains, soil or water.

Additional Information

- **Advice**

  Advice on applications not covered here may be obtained from your Shell representative.