Shell Lubricants General Manufacturing



SHELL LUBEANALYST AND SHELL CORENA S4 R 68 EXTEND OIL-DRAIN INTERVALS AND REDUCE OIL CONSUMPTION BY 100%

TOTAL REPORTED ANNUAL CUSTOMER SAVING US\$12,185

COMPANY: Pilsa Plastic Products Inc. COUNTRY: Turkey APPLICATION: Compressors SAVING: US\$12,185 total reported annual customer saving KEY EDGE: Shell Corena S4 R 68, Shell LubeAnalyst



RBA 017

Pilsa Plastic Products Inc. of Turkey has been an industry leader in plastics technology and production capacity since 1971. The company was dissatisfied with the poor performance of its existing compressor lubricant. Oil analysis indicated the oil had poor thermal and oxidation stability, which resulted in the need for an oil drain every 5,000 hours. As a consequence, operational costs were high.

The Shell Lubricants technical team monitored and analysed the existing oil's performance using Shell LubeAnalyst and recommended that Pilsa Plastic Products should change to Shell Corena S4 R 68, which would suit its operation better. Technical training in handling and application were also recommended.

Changing to Shell Corena S4 R 68 reduced Pilsa Plastic Products operational costs by 50% and increased the oil-drain intervals from 5,000 to 10,000 hours. The cost savings resulted from lower oil consumption and labour costs, less oil waste for disposal and improved maintenance practices. The company reports saving US\$12,185 a year.





CHALLENGE

Pilsa Plastic Products was dissatisfied with the poor performance of its existing compressor lubricant. Oil analysis indicated that the poor thermal and oxidation stability of the oil were resulting in the need for an oil drain every 5000 hours. As a consequence, operational costs were high.



Shell Lubricants technical team monitored and analysed the existing oil's performance using Shell LubeAnalyst and recommended a change to Shell Corena S4 R 68. Technical training in handling and application were also recommended.

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OUTCOME

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VALUE

Pilsa Plastic Products has cut its operational costs and increased the oil-drain intervals for its compressors by changing to Shell Corena S4 R 68. The total reported annual cost saving is US\$12,215, which is a result of lower oil consumption and oil costs, less waste oil for disposal and improved maintenance practices.

The savings indicated are specific to the calculation date and mentioned site. These calculations may vary from site to site, depending on the application, the operating conditions, the current products being used, the condition of the equipment and the maintenance practices.

SHELL CORENA S4 R

ADVANCED SYNTHETIC ROTARY AIR COMPRESSOR OIL

Shell Corena S4 R is an advanced synthetic air compressor oil incorporating a unique highperformance additive system. It is designed to deliver the highest performance lubrication of rotary sliding vane and screw air compressors. Shell Corena S4 R uses an advanced additive system to provide excellent protection and performance for compressors running at pressures over 25 bar and in excess of 100°C



discharge temperatures with oil maintenance intervals of up to 12,000 hours.

Performance benefits

Long oil life - maintenance saving

Shell Corena S4 R is capable of providing oil maintenance intervals of up to 12,000 hours (where allowed by manufacturers) even when operating at maximum discharge temperatures in excess of 100°C. The advanced formulation of Shell Corena S4 R helps deliver exceptional oil life through

- exceptional resistance to thermal and chemical breakdown
- resistance to formation of deposits on rotating components in screw compressors and in sliding vane slots for continuous efficient operation
- exceptionally low levels of deposit formation to help maintain excellent internal surface cleanliness particularly in oil/air separator and coalescer systems.

The exact oil maintenance interval will depend on intake air quality, duty cycle and ambient conditions. For hot and humid type climates as found in the Asian and Pacific regions, a reduced oil-drain period is recommended (consult OEM recommendations).

Outstanding wear protection

Shell Corena S4 R helps provide exceptional protection and protection of internal metal surfaces from corrosion and wear. It contains an advanced ashless anti-wear system to help prolong the life of critical parts such as bearings and gears.

Maintains system efficiency

Shell Corena S4 R is designed to provide rapid air release without excessive foaming to give trouble-free operation even under cycling conditions, helping to ensure reliable start-up and continuous compressed air availability. It has low volatility and oil carryover to provide reduced oil top-up requirements in combination with increased air quality. In addition, Shell Corena S4 R has excellent water separation properties to help ensure continuous efficient operation of the compressor even in the presence of water.

Applications

- Rotary sliding vane and screw air compressors. Shell Corena S4 R is suitable for oil-flooded/oil-injected, single or two-stage compressors operating at pressures of in excess of 25 bar and with air discharge temperatures of over 100°C (including intermittent operation under these conditions).
- Severe service conditions. May also be used where exceptionally high ambient temperatures are found, when the oil temperature cannot be reduced to normal levels.
- ABB turbochargers. The product is recommended for use in ABB turbochargers fitted to low and medium speed diesel engines used in marine and power generation applications.

Specifications and approvals

Shell Corena S4 R meets the requirements of ISO 6743-3A-DAJ

Complementary products	
Equipment	Lubricants
Metalworking	Shell Fenella, Shell Adrana, Shell Sitala, Shell Dromus, Shell Garia, Shell Macron, Shell Metalina, Shell Ensis, Shell Voluta
Machine tool maintenance	Shell Tonna, Shell Tellus, Shell Gadus, Shell Tactic
Plastic moulding	Shell Tellus, Shell Gadus, Shell Corena, Shell Omala
Assembly	Shell Tellus, Shell Tonna, Shell Corena, Shell Omala, Shell Gadus