CPI 307

High duty air compressor piston ring and packing material

materialsdata

CPI 307 is a special self-lubricating material, which can be used to provide reliable operating lives in non-lubricated, atmospheric air compressors.

CPI 307 has been formulated to give a useful combination of properties including toughness, resistance to elevated temperature and good wear resistance in atmospheric (moist) air.

These properties make CPI 307 an ideal choice for packings and for air-cooled air compressor rings. Its flexibility allows the use of stretched-on (solid) rider rings where these are required.

CPI 307 should not be selected for bone-dry air compressors - other CPI grades are available for this service.

CPI should be consulted for the proper design and application of its specialized products and materials. For further advice and technical support please contact CPI directly.

Typical properties	Metric	Imperial
Tensile strength at 20°C	15 MPa	2100 psi
Elongation at 20°C (%)	120	120
Coefficient of thermal expansion	70-90 x 10^{-6} /°C	3.9-5.0 x 10^{-5} /°F
Hardness (Shore 'D')	65-70	65-70
Specific gravity	3.8	3.8
Suggested mean temperature limit (Ts +Td)/2 (non-lube air compressors)	130 °C	270 °F