



180 SERIES GASKETS

Elliptical, Obround, Round and Special Cut

Topog-E 180 Series Gaskets

The steam boiler market makes extreme demands on gaskets; Topog-E® molded rubber gaskets are specifically formulated to meet and exceed these demands and to deliver industry standard performance. The Topog-E® Series 180 gaskets have been refined through a series of over 600 research formulation tests to ensure that they are able to meet the exacting performance standards of the steam boiler industry.

SPECIFICALLY THEY:

- **Conform** to the topography of the mating surfaces
- **Withstand** a boiler's full, continuous and cycling operating pressures
- **Withstand** continuous exposure to water treatment chemicals
- **Withstand** continuous exposure to ion and oxygen attack in hot air
- **Prevent** all leakage
- **Replace** easily, without chiseling or buffing

DISCLAIMER

All information in this data sheet is based on data believed to be reliable, however we make no guarantee or warranty of performance of Topog-E® Series 180 gaskets. Because there are many application-specific factors that can affect service life it is always advisable to first test Topog-E® Series 180 gaskets in a particular application to determine their ultimate suitability.

SERVICE SUMMARY

Steam boilers:

Up to 180 psi (12 bar) and 380° F. (193° C)
Water, condensate, etc.

Vessels: 200+ psi (14 bar) and less than 300°F. (150°C)

MATERIAL DESCRIPTION

Special, Proprietary Rubber Composition, Black,
80-85 Durometer.



Manufacturing of 2000 Series Gaskets done by Topog-E Gasket Company

APPLICATIONS

When used on steam pressure vessels Topog-E® Series 180 gaskets are typically used at operating pressures of up to 180 PSI (12 bar) and saturated steam temperatures up to 380° F. (193° C) for an average service life of one year. When used in other applications (e.g. condensate, water, and air vessels) Topog-E® Series 180 gaskets are sometimes used at pressures above 200 PSI (14 bar) where temperatures are typically more moderate (e.g. below 250° F./121° C.). When operating under less severe conditions (e.g. water applications at ambient temperatures) Topog-E® Series 180 gaskets can provide very long service lives.

Topog-E® Series 180 gaskets have been used successfully around the world for over forty years. In general, any type of industrial pressure vessel or tank that has inspection openings is a potential application where Topog-E® Series 180 gaskets can be used as a cost effective sealing device. In addition to using them in steam pressure vessels, customers also use Topog-E® molded gaskets and sheet material with great success in many other applications, including:

- *Water softeners*
- *Hot water heaters*
- *Steam humidifiers and cookers*
- *Water purifiers and demineralizers*
- *Refrigeration units*
- *Liquid treatment vessels*
- *Carbon absorption and filtering vessels*
- *Dryer cans in paper mills*
- *Water hydrants*
- *Mixing tanks*
- *Compressed air tanks*
- *Various types of dryers*
- *Air starters and receivers*
- *Deaerators*
- *Hatch covers*
- *Water towers and columns*
- *PVC reactor vessels*

INSTALLATION ENVIRONMENT & SUITABILITY

Water treatment chemicals, when used in accordance with supplier's guidelines, should not have a significant effect on the service life of properly installed Topog-E® Series 180 gaskets. Topog-E® Series 180 gaskets are not recommended for use in applications where they see direct exposure to high concentrations of aromatic hydrocarbons, chlorinated solvents, or petroleum based oils, fuels, and lubricants.

Topog-E® Series 180 gaskets are specifically formulated to have excellent resistance to steam and hot and cold water. They also have good resistance to:

- *Alcohols*
- *Ketones*
- *Phosphate esters*
- *Silicone oils & greases*
- *Dilute acids*
- *Bases*
- *Animal & vegetable fats*
- *Selected refrigerants*
- *Salts*
- *Ammonia*
- *Glycols*

TOPOG-E 180 SERIES

Elliptical Style
Gaskets

Specialty Gaskets distributes a wide range of sizes for Topog-E Elliptical style gaskets. For more information on our products and pricing, telephone our head office at (905)-564-0807 or email us at sales@specialtygaskets.com. For a list of the all of the products we offer, visit our website at www.specialtygaskets.com.

TOPOG-E 180 SERIES

**Obround Style
Gaskets**

Specialty Gaskets distributes a wide range of sizes for Topog-E Obround style gaskets. For more information on our products and pricing, telephone our head office at (905)-564-0807 or email us at sales@specialtygaskets.com. For a list of the all of the products we offer, visit our website at www.specialtygaskets.com.

TOPOG-E 180 SERIES

**Round Style
Gaskets**

Specialty Gaskets distributes a wide range of sizes for Topog-E Round style gaskets. For more information on our products and pricing, telephone our head office at (905)-564-0807 or email us at sales@specialtygaskets.com. For a list of the all of the products we offer, visit our website at www.specialtygaskets.com.

TOPOG-E 180 SERIES

**Special Cut Style
Gaskets**

Specialty Gaskets distributes a wide range of sizes for Topog-E Special Cut style gaskets. For more information on our products and pricing, telephone our head office at (905)-564-0807 or email us at sales@specialtygaskets.com. For a full list of the all of the products we offer, visit our website at www.specialtygaskets.com.



2000 SERIES GASKETS

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Topog-E 2000 Series Gaskets

The steam boiler market makes extreme demands on gaskets; Topog-E® Series 2000 gaskets are specifically designed and fabricated to provide the superior performance users of Topog-E® gaskets have come to expect – but at higher operating pressures and temperatures. These branded, engineered gaskets provide a cost-effective, reliable, and easy to use alternative to tacky-cloth, spiral wound and expanded PTFE gaskets.

SERVICE

Temperature:

- Up to 636° F (+336° C) in steam boilers
- Up to 850° F (+454° C) in atmosphere

Pressure (typical):

- 250 – 2,000 psi (17 – 138 bar)

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SERVICE SUMMARY

Steam boilers:
Up to 2,000 psi (138 bar)
and 636° F (336° C)

MATERIAL DESCRIPTION

Reinforced Exfoliated
Graphite Foil



Manufacturing of 2000 Series Gaskets done by Topog-E Gasket Company

APPLICATIONS

Topog-E® Series 2000 gaskets can be used as a cost-effective sealing alternative in most types of higher pressure industrial vessels and tanks that have inspection openings. The proprietary graphite used to manufacture these gaskets gives them exceptional thermal stability combined with chemical inertness, ensuring superior service capability under simultaneous conditions of saturated and superheated steam. They provide boiler manufacturers, users and service companies handhole and manhole gaskets with unprecedented characteristics.

ADVANTAGES

Compared to spiral wound gaskets, Topog-E® Series 2000 gaskets are compressible enough to conform to the topography of the mating surfaces – even on old worn and pitted flanges – with less torque. Their recovery characteristics are also superior to spiral wound gaskets and they are significantly lighter than spiral wound products. Topog-E® Series 2000 gaskets are easy to remove and replace with no chiseling or buffing required. Sizes are clearly marked on each gasket for easier identification.

TORQUE SPECS

M Factor = 2 (*smooth sealing surface*)

Y Stress = 900 psi (6 MPa) (*smooth sealing surface*)

Max Gasket Load = 24,000 psi (165 MPa)

MATERIAL

Made from multiple layers of exfoliated graphite foil and reinforced with 316 stainless steel foil for added stability. Standard gasket thickness is 0.25" (6 mm).

TOPOG-E 2000 SERIES

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Gaskets***

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TOPOG-E 2000 SERIES

**Obround Style
Gaskets**

Specialty Gaskets distributes a wide range of sizes for Topog-E Obround style gaskets. For more information on our products and pricing, telephone our head office at (905)-564-0807 or email us at sales@specialtygaskets.com. For a list of the all of the products we offer, visit our website at www.specialtygaskets.com.

TOPOG-E 2000 SERIES

**Round Style
Gaskets**

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TOPOG-E 2000 SERIES

**Special Cut Style
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