

MATERIAL SELECTION GUIDE

Flem-TEF® Reference	Grade	Properties	Applications
FT 100	Virgin PTFE	Excellent electrical properties with a low coefficient of friction. Good chemical properties. High operating temperature.	Gaskets, seals, rings, vee chevrons, valve seats, skived tapes used in the production of insulating components, wire and cable insulation, and high-frequency circuit boards, pipe linings, temperature and chemical probes.
FT 200	Modified PTFE	High-density copolymerized material. It has low gas permeation and reduces cold flow due to denser structure. Improved stress recovery at higher temperatures.	Pumps & valve components, Bellows, electronic and temperature probes, diaphragms, and electronic insulators.
FT300	Glass filled PTFE	Increased wear resistance and better cold flow and creep resistance to virgin PTFE. Glass filler offers more dimensional stability. Cost effective filled grade.	Used in gaskets due to excellent creep resistance. Valve seats and back up rings due to excellent wear and stability properties. Used on heavy duty slide bearings. Chemical processing equipment both as a lining and machined components.
FT400	15% Glass 5%mos PTFE	Designed for use with hydrogen and natural gas compressors due to its excellent wear resistance in dry environments and almost universal chemical resistance.	Compressor & pump components and bearings, wear rings, insulators, rotating & linier bearing applications, and sealing applications.
FT 500	Carbon filled PTFE	Offers improved wear. Enhanced thermal conductivity when heat dissipation is a consideration. Electrical conductivity suitable when static dissipation is required. Increased load bearing over virgin material. Excellent dimensional stability. Suitable for wet environments. Lower coefficient of friction compared to many offers filled grades.	Bearing & bushing where low friction and good wear characteristics are critical. Valve seats and seals, pumps parts, shaft seals, electrical / electronic applications and rotating equipment bearings.
FT600	Bronze filled PTFE	Designed for the heaviest of applications. Excellent dimensional stability. Machines like metal with much tighter tolerances than virgin PTFE. Self-lubricating low friction. Improved wear resistance for a longer life. High load bearing. Excellent electrical insulator.	Linear and rotating bearings, machine tool slide bearings, pump band bearing tape, pump wear wings, compressor parts, thrust washers with axial loads, aerospace bearings and bushes, marine applications in contact with salt water, and pharmaceutical applications when corrosion is an issue.
FT700	Polyimide filled PTFE	The lowest coefficient of friction in dry applications. Contact with soft materials such as aluminium, copper alloys, stainless steel, brass, etc. Very good wear resistance, compression resistance, high flexibility and tensile strength. Excellent insulating properties. It can be used in contact with food products.	Suitable for the machining of bearings and other sliding parts for the food industry. Ideal shaft friendly applications such as pumps mixing equipment. Suitable for stop start applications.
FT Blu	Metal detectable	Developed for the food & drink industries. FDA & EU10/2011 approved material. To avoid critical food contamination this material is detectable both by x ray and metal detection equipment.	Can be used in a wide range of food production line equipment and as scrapers and wear parts on the lines themselves.
FT DL20		Homopolymer acetal with 20% PTFE filler. Excellent PV values with superb wear resistance.	Any component with low wear low friction against steel or other plastics. Due to its make-up, unlike regular PTFE, this material can be machine or injection moulded so is the ideal choice for complex shapes.

Please contact our technical department with your requirements for a more detailed material analysis.