Braycote Vacuum Greases

Gas solubility data for the base fluid





Technical Report

Perfluoropolyether Lubricants Chemical Resistance

CLASS OF PRODUCT	CHEMICAL PRODUCT	TEMPERATURE AT WHICH FLUORINATED FLUIDS RESIST ON CONTACT (°C)
Organic solvents	All products in this class	300 ⁽¹⁾
Organic acids	All products in this class	300 ⁽¹⁾
Organic bases ⁽²⁾	Tributylamine Quinoline ⁽⁵⁾	200 200
Inorganic bases ⁽³⁾	Potassium hydroxide ⁽⁵⁾ Sodium hydroxide Sodium carbonate	200 200 200
Inorganic salts ⁽³⁾	Potassium chloride	250
Inorganic oxidizing agents (3)	Fluorine Chlorine Bromine Potassium permanganate Potassium dichromate ⁽⁵⁾	250 250 250 200 200
Inorganic acids ⁽³⁾	Hydrochloric acid Hydrofluoric acid Orthophosphoric acid Sulfuric acid ⁽⁵⁾ Nitric acid	250 250 200 200 200
Lewis acids ⁽⁴⁾	Ferric chloride FeCl ₃ ⁽⁵⁾ Zinc chloride Boron trifluoride	200 200 200
Other	Silicon tetrachloride Trichlorosilane Phosphorous tribromide Phosphorous pentachloride	150 150 150 150

- (1) Fluorinated fluids are soluble in highly fluorinated products.
- (2) The table lists some products of this class which have been laboratory tested and gives the results obtained; for other products, differing from those listed, compatibility tests should be performed under the expected contact conditions.
- (3) Fluorinated fluids are completely inert with regard to chemical products belonging to this class.
- (4) Some members of this class are reactive with regard to fluorinated fluids since they catalyze their decomposition but only at relatively high temperatures.
- (5) In the tests performed with these substances, no marked alterations were recorded at the temperature indicated in the tables and even for longer times (up to 1 month).