

# Peroxide Formers

These chemicals present a risk of formation of peroxides and should be handled carefully. Peroxides are susceptible to explosion due to heat, friction, shock, or even intense light. Due to the risk of peroxide formation, these chemicals have short shelf lives and should not be stored for long periods of time.

**Category I Materials:** Recommended shelf life of 3 months whether it is inhibited or uninhibited.

Chemical	Synonyms
Diethyl Ketone	2-Ethyl-1-butene-1-one
Divinyl Ether	Vinyl Ether, Divinyl Oxide
Divinylacetylene	DVA
Isopropyl Ether	Diisopropyl Ether, Diisopropyl Oxide
Potassium Amide	
Potassium Metal	Potassium
Sodium Amide	Sodamide
Sodium Ethoxyacetylde	
Vinylidene Chloride	1,1-Dichloroethylene, 1,1-Dichloroethane

**Category II Materials:** Recommended shelf life of 12 months if inhibited and 3 months if uninhibited.

Chemical	Synonyms
1,4-Dioxane	p-Dioxane, Diethylene Dioxide
Acetal	1,1-Diethoxyethane, Diethyl Acetal
Acetaldehyde	Ethanal, Ethyl Aldehyde
Acetaldehyde Diethyl Acetyl	
Cumene	Isopropyl Benzene
Cyclohexene	1,2,3,4-Tetrahydrobenzene
Cyclopentene	
Decahydronaphthylene	Decalin
Diacetylene	Beacetylene, Butadiene
Dicyclopentadiene	
Diethylene Glycol Dimethyl Ether	Diglyme
Ethyl Ether	Ether, Diethyl Ether, Ethoxyethane
Ethylene Glycol Dimethyl Ether	1,2-Dimethoxy Ethane, Glyme, Monoglyme
Ethylene Glycol Ether Acetate	
Ethylene Glycol Monoethers	Cellusolves
Furan	Divinylene Oxide
Methyl Acetylene	Allylene, Propyne
Methyl Cyclopentane	
Methyl Isobutyl Ketone	
Tetrahydrofuran	THF, Butylene Oxide, Diethylene Oxide
Tetrahydronaphthalene	Tetraline
Vinyl Ethers	Ethyl Vinyl Ether, Methyl Vinyl Ether
Other Unlisted Ethers	

**Category III Materials:** Risk of rapid polymerization due to internally formed peroxides. Recommended shelf life of 12 months if inhibited or 3 months if uninhibited.

Chemical	Synonyms
Chlorobutadiene	Chloroprene
Styrene	
Tetrafluoroethylene	TFE
Vinyl Acetate	
Vinyl Acetylene	Buten-3-yne
Vinyl Chloride	Chloroethylene, Ethylene Monochloride
Vinyl Pyridine	