

Application Data

Chemical Compatibility Chart

These tables alphabetically list commonly used materials of various chemical composition. After each fluid listing you will find the basic hose tube and fitting materials rated according to their chemical resistance to each individual fluid. All ratings are at 70°F. The chart is intended to be used as a guide only. Consult Eaton Technical Support at 1-888-258-0222 for further information.

WARNING – Selection of Hose: Selection of the proper hose for the application is essential to the proper operation and safe use of the hose and related

equipment. Inadequate attention to selection of the hose for your application can result in serious bodily injury or property damage from spraying fluids or flying projectiles. In order to avoid serious bodily injury or property damage resulting from selection of the wrong hose, you should carefully review the information in this catalog.

WARNING – Proper Selection of Hose Fittings: Selection of the proper fittings for the hose and application is essential to the proper operation and safe use of the hose and

related equipment. Inadequate attention to the selection of the fittings for your application can result in serious bodily injury or property damage resulting from spraying fluids or flying projectiles. In order to avoid serious bodily injury or property damage resulting from selection of the wrong fitting, you should carefully review the information in this catalog.

WARNING – The following list of chemicals is offered as a guide to the chemical resistance properties of the tube material of the hoses shown. It should

be used as a guide only, as the degree of resistance of any elastomer to a particular fluid depends upon such variables as temperature, concentration, pressure conditions, velocity of flow, duration of exposure, aeration, stability of the fluid, etc.

Therefore, when in doubt, it is advisable not to use the hose. If this is not practical, tests should be devised that simulate actual service conditions as nearly as possible. Eaton offers additional technical assistance.

FLUID	HOSE MATERIAL															METALS		
	UHMW	XLPE	PVC	Nitrile	Vinyl Nitrile	Neo-prene	Teflon (PTFE)	Teflon (FEP)	Nylon 6/66	EPDM	Hypalon	Natural Rubber/SBR	Hytrel	Polyurethane	CPE	Brass	Steel	316 Stainless
Acetaldehyde	G	G	X	X	X	X	G	G	F	G	F	X	X	X	—	X	X	G
Acetic Acid (Concentrated)	G	G	X	X	X	X	G	G	X	G	X	X	X	X	G	X	X	G
Acetic Acid (Dilute)	G	G	F	X	X	F	G	G	X	G	F	X	G	X	G	X	X	G
Acetic Anhydride	G	G	X	G	G	X	G	G	X	G	F	X	X	X	G	X	F	F
Acetone	G	G	X	X	X	X	G	G	F	G	F	X	F	X	G	G	G	G
Acrylonitrile	G	G	G	X	X	X	G	G	—	X	X	X	—	X	G	—	G	G
Air	G	G	G	G	G	G	G	G	G	G	G	G	G	G	G	G	G	G
Alcohols:																		
Amyl Alc.	G	G	X	G	G	F	G	G	G	G	G	G	G	X	G	G	F	F
Butyl Alc., Butanol	G	G	X	G	G	G	G	G	G	G	G	—	X	G	G	G	G	G
Ethyl Alc., Ethanol	G	G	F	G	G	G	G	G	G	G	G	G	G	X	G	G	F	G
Isopropyl Alcohol, Isopropanol	G	G	G	G	G	G	G	G	G	G	G	G	G	X	G	G	G	G
Methyl Alcohol, Methanol	G	G	X	G	G	G	G	G	G	G	G	G	G	X	G	G	F	G
Aluminum Chloride	G	G	G	G	G	G	G	G	X	G	G	G	G	G	G	X	X	F
Aluminum Fluoride	G	G	G	G	G	F	G	G	X	G	G	G	—	G	X	X	X	X
Aluminum Hydroxide	G	G	G	G	G	G	G	G	G	G	G	G	—	G	G	X	F	G

G - Good F - Fair X - Not Recommended — - Insufficient Information