RTI'S 100 CHEMICALS RESISTANCE & BARRIER CHART

This general chemical resistance and barrier chart is intended as general guide for the glove user. This chart provides a general information on the permeation, breakthrough time and rate as well as degradation factors in respect to the type of glove and its reaction to the common chemicals used. This chart is only a simple guideline for use of gloves in general where incidental splash exposures to various types chemicals may occur during the use of gloves.

Due to fact that the conditions of the ultimate use of gloves are beyond our control and also that full permeation tests cannot be conducted in all possible work environments and across all combinations of chemicals and solutions, this guideline is advisory in nature only. The suitability of the glove for any specific job must be tested by the glove user as variability in glove material thickness, chemical and solution concentration, temperature and length of chemical exposure are factors affecting performance.

The compatibility of the glove film in relation to each type of chemical is coded as follows:

Р
F
G

POOR Chemical	
FAIR Chemical	Resistance
GOOD Chemical	Resistance

CHEMICAL NAME	LATEX	VINYL	NITRILE
ACETALDEHYDE	G	Р	Р
ACETIC ACID	G	G	G
AMMONIUM FLOURIDE 30-70%	G	G	G
ACETONE	Р	Р	Р
ACETONITRILE	F	P	F
ACRYLIC ACID	G	P	G
AMMONIUM HYDROXIDE < 30%	G	G	G
AMYL ALCOHOL	G	G	G
ANILINE	G	F	F
AQUA REGIA	P	G	P
BENZALDEHYDE	F	P	P
BENZENE	Р	P	F
BROMOPROPIONIC ACID	G	G	F
BUTYL ACETATE	Р	Р	Р
BUTYL ALCOHOL	G	G	G
BUTYL CARBITOL	G	G	G
BUTYL CELLOSOLVE	G	Р	Р
CARBON DISULFIDE	Р	P	G
CARBON TETRACHLORIDE	Р	F	Р
CHLOROBENZENE	Р	Р	Р
CHLOROFORM	Р	Р	Р
CHLORONAPTHALENE	G	P	Р
CHROMIC ACID	Р	G	F
CITRIC ACID 10%	G	G	G
CYCLOHEXANE	Р	G	G
CYCLOHEXANOL	G	G	G
CYCLOHEXANONE	Р	Р	Р
DIACETONE ALCOHOL	F	Р	G
DIBUTYL PHTHALATE	G	P	G
DIETHYLAMINE	F	Р	G
DI-ISOBUTYL KETONE (DIBK)	Р	Р	G
DIMETHYL ACETAMIDE (DMAC)	Р	Р	F
DIMETHYL FORMAMIDE (DMF)	Р	Р	Р
DIMETHYL SULFOXIDE (DMSO)	G	Р	G
1,3 DIOAXANE	F	Р	Р
EIPCHLOROHYDRIN	F	Р	Р

ELECTROLESS CORRER			
ELECTROLESS COPPER	G	G	G
ETHYL ACETATE	F	Р	Р
ETHYL ALCOHOL	G	G	G
ETHYL ETHER	G	Р	G
ETHYLENE DICHLORIDE	Р	Р	Р
ETHYLENE GLYCOL	G	G	G
FORMALDEHYDE 30-70%	G	G	G
FORMIC ACID	G	G	G
FUFURAL	G	P	P
GASOLINE <50% AROMATICS	P	P	G
GLUTARALDEHYDE <5%	G	G	G
HEXAMETHYLDISILAZANE	F	Р	G
HEXANE	Р	Р	G
HYDRAZINE <70%	G	G	G
HYDROBROMIC ACID	G	G	G
HYDROCHLORIC ACID <30%	G	G	G
HYDROCHLORIC ACID 30-70%	G	G	G
HYDROGEN PEROXIDE <30%	G	G	G
ISOBUTYL ALCOHOL	G	F	G
ISO-OCTANE	P	P	G
ISOPROPYL ALCOHOL	G	G	G
KEROSENE	P	F	G
	-	_	G
LACTIC ACID >70%	G	G F	
LAURIC ACID <40%	G	-	G
MALEIC ACID	G	G	G
METHYL ETHYL KETONE (MEK)	Р	Р	Р
METHYL GLYCOL ETHER	G	Р	F
METHYL IODIDE	Р	Р	Р
METHYL ISOBUTYL KETONE	Р	Р	Р
METHYLAMINE	G	G	G
METHYL METHACRYLATE	Р	Р	Р
MONOETHANOLAMINE	G	G	G
MORPHOLINE	G	P	P
N-METHYL-2-PYRROLIDONE	G	Р	Р
NAPHTHA	Р	F	G
NITRIC ACID <10%	G	G	G
NITRIC ACID >70%	Р	F	Р
NITROBENZENE	F	Р	F
NITROMETHANE	F	Р	F
1-NITROPROPANE	G	Р	Р
OCTYL ALCOHOL	G	F	G
OLEIC ACID	G	F	G
OXALIC ACID	G	G	G
PALMICTIC ACID	F	G	G
PENTANE	P	P	G
PERCHLORIC ACID 30-70%	F	G	G
PHENOL >70%	G	G	G
PENTACHLOROPHENOL <10%	P	F	G
PERCLOROETHYLENE	P	P	G
	-	_	G
PHOSPHORIC ACID >70%	G	G	
POTASSIUM HYDROXIDE	G	G	G
PROPYL ACETATE	G	P	F
PYRIDINE	Р	Р	P
SILICON ETCH	Р	F	Р
			G
SODIUM HYDROXIDE 30-70%	G	G	
STYRENE	Р	Р	Р
STYRENE SULFURIC ACID <50%	P	P	P
STYRENE	Р	Р	Р

TOLUENE	Р	Р	F
TRICRESYL PHOSPHATE (TCP)	G	F	G
TRIETHANOLAMINE	G	G	G
TURPENTINE	Р	P	G
VETREL MCA	G	G	G
XYLENE	Р	Р	F