ProMinent® Chemical Resistance List

Resistance of Materials Used in Liquid Ends to the Chemicals Most Frequently Used

Figures are given for norm conditions (20° C, 1013 mbar).

s	=	Saturated aqueous solution
+	=	Resistant
+/o	=	Practically resistant
o	=	Resistant in certain conditions
-	=	Non resistant
n	=	Resistance not known
=>	=	refer to...
*	=	For composite compounds, bond resistance (e.g. Tangite) must be considered Use of materials rated 'o' is not recommended
**	=	Does not apply to glass fibre reinforced material

Concentration data is given in percentage of weight for aqueous solution. If resistance rate is given with a percentage, this applies to concentrations not exceeding that percentage only.

PLEASE NOTE: The resistance of **CSM (Hypalon®)** and **IIR (Butyl rubber)** used in our pulsation dampeners is similar to EPDM. PTFE is resistant to all the chemicals in this list. **Black** (carbon-filled). **PTFE,** however, may be corroded by strong oxidizers like bromine (dry) or concentrated acids (e.g. Nitric-, Sulfuric-, Chromic-acid).

Explanation of abbreviations used as column headings:

Acrylic:	Acrylic resistance
PVC:	PVC, rigid, (PVC-U) resistance
PP:	Polypropylene resistance
PVDF:	PVDF resistance
1.4404:	Stainless steel 1.4404 & 1.4571 resistance
FPM:	Fluorine Rubber (e.g. Viton® A & B) resistance
EPDM:	Ethylene-Propylene-Dien-rubber resistance
Tygon:	Tygon® R-3603 resistance
Pharmed:	Pharmed® resistance
PE:	Polyethylene resistance
2.4819:	Hastelloy C-276 resistance

Viton® is a registered trademark of DuPont Dow Elastomers.

The data has been taken from relevant manufacturer´s documentation and our own tests. Resistance of materials is also dependant on other factors, e.g. operating conditions, conditions of surfaces etc., and so this list must be treated as an initial guide only. It cannot claim to offer any guarantees. It should be taken into consideration in particular that usual dosing media are compounds for the most part, and their corrosiveness cannot be deducted simply by adding the corrosiveness of each single component. In such cases the chemical producers' data of the material compatibility are to be considered as a matter of prime importance for the material choice. A safety data sheet does not give these data and therefore cannot take the place of the technical documentation on the application.

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Chemical	Formula	Conc	Acryl	PVC	PP	PVDF	1.4404	FPM	EPDM	Tygon	Pharmed	PE	2.4819
Acetaldehyde	CH_3CHO	100%	-	-	o	-	+	-	+/o	-	-	+	+
Acetamide	CH_3CONH_2	s	+	+	+	+	+	o	+	-	+/o	+	+
Acetic Acid	CH_3COOH	100%	-	50%	+	+	+	-	o	60%	60%	70%	+
Acetic Anhydride	$(CH_3CO)_2O$	100%	-	-	o	-	+	-	+/o	-	+	o	+
Acetic Ether	=> Ethyl Acetate												
Acetone	CH_3COCH_3	100%	-	-	+	-	+	-	+	-	-	+	+
Acetophenone	$C_6H_5COCH_3$	100%	-	n	+	-	+	-	+	n	n	+	+
Acetyl Chloride	CH_3COCl	100%	-	+	n	-	o	+	-	-	o	n	+
Acetylacetone	$CH_3COCH_2COCH_3$	100%	-	-	+	-	+	-	+	n	n	+	+
Acetylene Dichloride	=> Dichloro Ethylene												
Acetylene Tetrachloride	=> Tetrachloro Ethane												
Acrylonitril	CH_2=CH-CN	100%	-	-	+	+	+	-	-	-	-	+	+
Adipic Acid	$HOOC(CH_2)_4COOH$	s	+	+	+	+	+	+	+	-	+/o	+	+
Allyl Alcohol	CH_2CHCH_2OH	96%	-	o	+	+	+	-	+	-	o	+	+/o
Aluminium Acetate	$Al(CH_3COO)_3$	s	+	+	+	+	+	+	+	+	+	+	+/o
Aluminium Bromide	$AlBr_3$	s	+	+	+	+	n	+	+	+	+	+	+
Aluminium Chloride	$AlCl_3$	s	+	+	+	+	-	+	+	+	+	+	+
Aluminium Fluoride	AlF_3	10%	+	+	+	+	-	+	+	+	+	+	+/o
Aluminium Hydroxide	$Al(OH)_3$	s	+	+	+	+	+	+	+	+	+	+	+
Aluminium Nitrate	$Al(NO_3)_3$	s	+	+	+	+	+	+	+	+	+	+	+
Aluminium Phosphate	$AlPO_4$	s	+	+	+	+	+	+	+	+	+	+	+
Aluminium Sulphate	$Al_2(SO_4)_3$	s	+	+	+	+	+	+	+	+	+	+	+
Ammonium Acetate	CH_3COONH_4	s	+	+/o	+	+	+	+	+	+	+	+	+
Ammonium Bicarbonate	NH_4HCO_3	s	+	+	+	+	+	+	+	+	+	+	+
Ammonium Carbonate	$(NH_4)_2CO_3$	40%	+	+	+	+	+	+	+	+	+	+	+
Ammonium Chloride	NH_4Cl	s	+	+	+	+	-	+	+	+	+	+	+/o
Ammonium Fluoride	NH_4F	s	+	o	+	+	o	+	+	+	+	+	+
Ammonium Hydroxide	"NH_4OH"	s	+	+	+	+	+	-	+	+	+	+	+
Ammonium Nitrate	NH_4NO_3	s	+	+	+	+	+	+	+	+	+	+	+
Ammonium Oxalate	$(COONH_4)_2 * H_2O$	s	+	+	+	+	+	+	+	+	+	+	+
Ammonium Perchlorate	NH_4ClO_4	10%	+	+	+	+	+	+	+	+	+	+	+
Ammonium Peroxodisulphate	$(NH_4)_2S_2O_8$	s	+	+	+	+	5%	+	+	+	+	+	5%
Ammonium Phosphate	$(NH_4)_3PO_4$	s	+	+	+	+	10%	+	+	+	+	+	10%
Ammonium Sulphate	$(NH_4)_2SO_4$	s	+	+	+	+	10%	+	+	+	+	+	10%
Ammonium Sulphide	$(NH_4)_2S$	s	+	+	+	+	n	+	+	n	n	+	n
Ammoniumaluminium Sulphate	$NH_4Al(SO_4)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Amyl Alcohol	$C_5H_{11}OH$	100%	+	+	+	+	+	-	+	-	-	+	+
Aniline	$C_6H_5NH_2$	100%	-	-	+	+	+	-	+/o	-	o	+	+
Aniline Hydrochloride	$C_6H_5NH_2.HCl$	s	n	+	+	+	-	+/o	+/o	-	o	+	+
Antimony Trichloride	$SbCl_3$	s	+	+	+	+	-	+	+	+	+	+	n
Aqua Regia	$3\ HCl + HNO_3$	100%	-	+	-	+	-	-	o	-	-	-	-
Arsenic Acid	H_3AsO_4	s	+	+	+	+	+	+	+	20%	o	+	+
Barium Carbonate	$BaCO_3$	s	+	+	+	+	+	+	+	+	+	+	+
Barium Chloride	$BaCl_2$	s	+	+	+	+	-	+	+	+	+	+	+
Barium Hydroxide	$Ba(OH)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Barium Nitrate	$Ba(NO_3)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Barium Sulphate	$BaSO_4$	s	+	+	+	+	+	+	+	+	+	+	+
Barium Sulphide	BaS	s	+	+	+	+	+	+	+	+	+	+	+
Benzaldehyde	C_6H_5CHO	100%	-	-	+	+	+	+	+	-	-	o	+

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Benzene	C_6H_6	100%	-	-	o	+	+	o	-	-	-	o	+
Benzene Sulphonic Acid	$C_6H_5SO_3H$	10%	n	n	+	+	+	+	-	-	-	n	+
Benzoic Acid	C_6H_5COOH	s	+	+	+	+	+	+	+	-	+/o	+	+
Benzoyl Chloride	C_6H_5COCl	100%	-	n	o	n	o	+	+	n	n	o	+
Benzyl Alcohol	$C_6H_5CH_2OH$	100%	-	-	+	+	+	+	-	-	+	+	+
Benzyl Benzoate	$C_6H_5COOC_7H_7$	100%	-	-	+	o	+	+	-	-	-	+	+
Benzyl Chloride	$C_6H_5CH_2Cl$	90%	-	n	o	+	+	+	-	-	-	o	+
Bitter Salt	=> Magnesium Sulphate												
Bleach	=> Sodium Hypochlorite												
Blue Vitriol	=> Copper Sulphate												
Borax	=> Sodium Tetraborate												
Boric Acid	H_3BO_3	s	+	+	+	+	+	+	+	+	+	+	+
Brine		s	+	+/o	+	+	+/o	+	+	+	+	+	+
Bromine (dry)	Br_2	100%	-	-	-	+	-	-	-	-	-	-	+
Bromine Water	$Br_2 + H_2O$	s	-	+	-	+	-	-	-	n	n	-	n
Bromo Benzene	C_6H_5Br	100%	n	n	o	+	+	o	-	-	-	o	+
Bromochloro Methane	CH_2BrCl	100%	-	-	-	+	+	n	+/o	-	-	o	+
Bromochlorotrifluoro Ethane	$HCClBrCF_3$	100%	-	-	o	+	+	+	-	+	+	o	+
Butanediol	HOC_4H_8OH	10%	n	+	+	+	+	o	+	+	+	+	+
Butanetriol	$C_4H_{10}O_3$	s	+	+	+	+	+	o	+	+	+	+	+
Butanol	C_4H_9OH	100%	-	+	+	+	+	o	+/o	-	-	+	+
Butyl Acetate	$C_7H_{13}O_2$	100%	-	-	+	+	+	-	-	-	+/o	+	+
Butyl Acetate	$CH_3COOC_4H_9$	100%	-	-	o	+	+	-	+/o	-	+/o	-	+
Butyl Alcohol	=> Butanol												
Butyl Amine	$C_4H_9NH_2$	100%	n	n	n	-	+	-	-	n	n	+	+
Butyl Benzoate	$C_6H_5COOC_4H_9$	100%	-	-	o	n	+	+	+	-	-	o	+
Butyl Mercaptane	C_4H_9SH	100%	n	n	n	+	n	+	-	n	n	n	n
Butyl Oleate	$C_{22}H_{42}O_2$	100%	n	n	n	+	+	+	+/o	n	n	n	+
Butyl Stearate	$C_{22}H_{44}O_2$	100%	o	n	n	+	+	+	-	n	n	n	+
Butyraldehyde	C_3H_7CHO	100%	-	n	+	n	+	-	+/o	-	-	+	+
Butyric Acid	C_3H_7COOH	100%	5%	20%	+	+	+	+	+	-	+/o	+	+
Calcium Acetate	$(CH_3COO)_2Ca$	s	+	+	+		+	+	+	+	+	+	+
Calcium Bisulphite	$Ca(HSO_3)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Calcium Carbonate	$CaCO_3$	s	+	+	+	+	+	+	+	+	+	+	+
Calcium Chloride	$CaCl_2$	s	+	+	+	+	-	+	+	+	+	+	+
Calcium Cyanide	$Ca(CN)_2$	s	+	+	+	+	n	+	+	+	+	+	n
Calcium Hydroxide	$Ca(OH)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Calcium Hypochlorite	$Ca(OCl)_2$	s	+	+	o	+	-	o	+	+	+	+	+
Calcium Nitrate	$Ca(NO_3)_2$	s	+	50%	50%	+	+	+	+	+	+	+	+
Calcium Phosphate	$Ca_3(PO_4)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Calcium Sulphate	$CaSO_4$	s	+	+	+	+	+	+	+	+	+	+	+
Calcium Sulphide	CaS	s	+	+	+	+	n	+	+	+	+	+	+
Calcium Sulphite	$CaSO_3$	s	+	+	+	+	+	+	+	+	+	+	+
Calcium Thiosulphate	CaS_2O_3	s	+	+	+	+	-	+	+	+	+	+	+
Carbolic Acid	=> Phenole												
Carbon Disulphide	CS_2	100%	-	-	o	+	+	+	-	-	-	o	+
Carbon Tetrachloride	CCl_4	100%	-	-	-	+	+	+	-	-	-	o	+
Carbonic Acid	"H_2CO_3"	s	+	+	+	+	+	+	+	+	+	+	+
Caustic Potash	=> Potassium Hydroxide												

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Caustic Soda	=> Sodium Hydroxide												
Chloric Acid	$HClO_3$	20%	+	+	-	+	-	o	o	+	+	10%	+
Chlorinated Lime	=> Calcium Hypochlorite												
Chlorine Dioxide Solution	$ClO_2 + H_2O$	0.5%	o	+	o	+	-	o	-	o	-	o	+
Chlorine Water	$Cl_2 + H_2O$	s	o	+	o	+	-	+	+	o	-	o	+
Chloro Benzene	C_6H_5Cl	100%	-	-	+	+	+	+	-	-	-	o	+
Chloro Ethanol	$ClCH_2CH_2OH$	100%	-	-	+	o	+	-	o	-	+	+	+
Chloro Ethylbenzene	$C_6H_4ClC_2H_5$	100%	-	-	o	n	+	o	-	-	-	o	+
Chloro Phenole	C_6H_4OHCl	100%	-	n	+	+	+	n	-	-	-	+	+
Chloro Toluene	C_7H_8Cl	100%	-	-	n	+	+	+	-	-	-	n	+
Chloroacetone	$ClCH_2COCH_3$	100%	-	-	n	n	+	-	+	-	-	n	+
Chlorobutadiene	C_4H_5Cl	100%	-	-	n	n	+	+	-	-	-	n	+
Chloroform	$CHCl_3$	100%	-	-	o	+	+	+	-	-	o	-	+
Chlorohydrin	C_3H_5OCl	100%	-	n	+	-	+	+	o	-	+	+	+
Chloroprene	=> Chlorobutadiene												
Chlorosulphonic Acid	$SO_2(OH)Cl$	100%	-	o	-	+	-	-	-	-	-	-	o
Chrome-alum	=> Potassium Chrome Sulphate												
Chromic Acid	H_2CrO_4	50%	-	+	o	+	10%	+	-	o	o	+	10%
Chromic-Sulphuric Acid	$K_2CrO_4 + H_2SO_4$	s	-	+	-	+	n	n	n	-	-	-	n
Chromium Sulphate	$Cr_2(SO_4)_3$	s	+	+	+	+	+	+	+	+	+	+	+
Citric Acid	$C_6H_8O_7$	s	+	+	+	+	+	+	+	+	+	+	+
Cobalt Chloride	$CoCl_2$	s	+	+	+	+	-	+	+	+	+	+	+
Copper-II-Acetate	$Cu(CH_3COO)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Copper-II-Arsenite	$Cu_3(AsO_3)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Copper-II-Carbonate	$CuCO_3$	s	+	+	+	+	+	+	+	+	+	+	+
Copper-II-Chloride	$CuCl_2$	s	+	+	+	+	1%	+	+	+	+	+	+
Copper-II-Cyanide	$Cu(CN)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Copper-II-Fluoride	CuF_2	s	+	+	+	+	+	+	+	+	+	+	+
Copper-II-Nitrate	$Cu(NO_3)_2$	s	+	+	+	+	+	+	+	+	+	+	+/o
Copper-II-Sulphate	$CuSO_4$	s	+	+	+	+	+	+	+	+	+	+	+
Cresols	$C_6H_4CH_3OH$	100%	o	o	+	+	+	+	-	-	-	+	+
Crotonaldehyde	$CH_3C_2H_2CHO$	100%	n	-	+	+	+	-	+	-	-	+	+
Cubic Nitre	=> Sodium Nitrate												
Cumene	=> Isopropyl Benzene												
Cyclo Hexane	C_6H_{12}	100%	+	-	+	+	+	+	-	-	-	+	o
Cyclohexanole	$C_6H_{11}OH$	100%	o	+/o	+	+	+	+	-	-	-	+	+
Cyclohexanone	$C_6H_{10}O$	100%	-	-	+	-	+	-	+/o	-	-	+	+
Cyclohexyl Alcohol	=> Cyclohexanol												
Cyclohexylamine	$C_6H_{11}NH_2$	100%	n	n	n	n	+	-	n	n	n	n	+
Decahydronaphthaline	$C_{10}H_{18}$	100%	-	+/o	o	+	n	o	-	-	-	o	+
Decaline	=> Decahydronaphthalene												
Dextrose	=> Glucose												
Diacetonalcohol	$C_6H_{12}O_2$	100%	-	-	+	o	+	-	+	-	-	+	+
Dibromoethane	$C_2H_4Br_2$	100%	-	-	n	+	+	+	-	-	-	-	+
Dibutyl Ether	$C_4H_9OC_4H_9$	100%	-	-	+	+	+	-	o	-	-	+	+
Dibutyl Phthalate	$C_{16}H_{22}O_4$	100%	-	-	+	+	+	+	+/o	o	+	o	+
Dibutylamine	$(C_4H_9)_2NH$	100%	n	n	+	+	+	-	-	n	n	+	+
Dichloro Acetic Acid	$Cl_2CHCOOH$	100%	-	+	+	+	+	-	+	-	o	+	+
Dichloro Benzene	$C_6H_4Cl_2$	100%	-	-	o	+	+	+	-	-	-	o	+

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Dichloro Butan	$C_4H_8Cl_2$	100%	-	-	o	+	+	+	-	-	-	o	+
Dichloro Butene	$C_4H_6Cl_2$	100%	-	-	o	+	+	o	-	-	-	o	+
Dichloro Ethane	$C_2H_4Cl_2$	100%	-	-	o	+	+	+	-	-	o	-	+
Dichloro Ethylene	$C_2H_2Cl_2$	100%	-	-	o	+	+	o	-	-	o	-	+
Dichloro Methane	CH_2Cl_2	100%	-	-	o	o	o	+	-	-	o	-	+
Dichloroisopropyl Ether	$(C_3H_6Cl)_2O$	100%	-	-	o	n	+	o	o	-	-	o	+
Dicyclohexylamine	$(C_6H_{12})_2NH$	100%	-	-	o	n	+	-	-	-	-	o	+
Diethyleneglycol	$C_4H_{10}O_3$	s	+	+	+	+	+	+	+	+	+	+	+
Diethyleneglycolethyl Ether	$C_8H_{18}O_3$	100%	n	n	+	+	+	n	+/o	-	o	+	+
Diethylether	$C_2H_5OC_2H_5$	100%	-	-	o	+	+	-	-	-	o	o	+
Diglycolic Acid	$C_4H_6O_5$	30%	+	+	+	+	+	+	n	+	+/o	+	+
Dihexyl Phthalate	$C_{20}H_{26}O_4$	100%	-	-	+	+	+	-	n	o	+	+	+
Diisobutylketone	$C_9H_{18}O$	100%	-	-	+	+	+	-	+	-	-	+	+
Di-iso-nonyl Phthalate	$C_{26}H_{42}O_4$	100%	-	-	+	+	+	n	n	o	+	+	+
Diisopropylketone	$C_7H_{14}O$	100%	-	-	+	+	+	-	+	-	-	+	+
Dimethyl Carbonate	$(CH_3O)_2CO$	100%	n	n	+	+	+	+	-	n	n	+	+
Dimethyl Ketone	=> Acetone												
Dimethyl Phthalate	$C_{10}H_{10}O_4$	100%	-	-	+	+	+	-	+/o	o	+	+	+
Dimethylformamide	$HCON(CH_3)_2$	100%	-	-	+	-	+	-	+	-	+/o	+	+
Dimethylhydrazine	$H_2NN(CH_3)_2$	100%	n	n	+	n	+	-	+	n	n	+	+
Dioctyl Phthalate	$C_4H_4(COOC_8H_{17})_2$	100%	-	-	+	+	+	-	+/o	o	+	+	+
Dioxane	$C_4H_8O_2$	100%	-	-	o	-	+	-	+/o	-	-	+	+
Disodium Hydrogenphosphate	Na_2HPO_4	s	+	+	+	+	+	+	+	+	+	+	+
Disulphur Dichloride	S_2Cl_2	100%	n	n	n	+	n	+	-	-	-	n	n
Disulfuric Acid	=> Oleum												
DMF	=> Dimethylformamide												
Engine Oils		100%	n	+/o	+	+	+	+	-	-	-	+	+
Epsom salts	=> Magnesium Sulphate												
Ethanol	C_2H_5OH	100%	-	+	+	+	+	-	+	-	+	+	+
Ethanol Amine	$HOC_2H_4NH_2$	100%	o	n	+	-	+	-	+/o	-	o	+	+
Ethyl Acetate	$CH_3COOC_2H_5$	100%	-	-	35%	+	+	-	+/o	-	+/o	+	+
Ethyl Acrylate	$C_2H_3COOC_2H_5$	100%	-	-	+	o	+	-	+/o	-	-	+	+
Ethyl Benzene	C_6H_5-C_2H_5	100%	-	-	o	+	+	o	-	-	-	o	+
Ethyl Benzoate	$C_6H_5COOC_2H_5$	100%	n	-	+	o	+	+	-	-	-	+	+
Ethyl Bromide	C_2H_5Br	100%	-	n	+	+	n	+	-	-	o	+	+
Ethyl Chloroacetate	$ClCH_2COOC_2H_5$	100%	-	o	+	+	+	+	-	-	-	+	+
Ethyl Chlorocarbonate	$ClCO_2C_2H_5$	100%	n	n	n	n	n	+	-	n	n	n	n
Ethyl Cyclopentane	$C_5H_4C_2H_5$	100%	+	+	+	+	+	+	-	-	-	+	+
Ethylacetoacetate	$C_6H_{10}O_3$	100%	n	-	+	+	+	-	+/o	-	+/o	+	+
Ethylacrylic Acid	C_4H_7COOH	100%	n	n	+	+	+	n	+/o	n	n	+	+
Ethylene Diamine	$(CH_2NH_2)_2$	100%	o	o	+	-	o	-	+	n	n	+	o
Ethylene Dibromide	=> Dibromoethane												
Ethylene Dichloride	=> Dichloro Ethane												
Ethylene Glycol	=> Glycol												
Ethylenglycol Ethylether	$HOC_2H_4OC_2H_5$	100%	n	n	+	+	+	n	+/o	-	o	+	+
Ethylhexanol	$C_8H_{16}O$	100%	n	+/o	+	+	+	+	+	-	-	+	+
Fatty Acids	R-COOH	100%	+	+	+	+	+	+	o	-	o	+	+
Ferric Chloride	$FeCl_3$	s	+	+	+	+	-	+	+	+	+	+	n

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Chemical	Formula	Conc	Acryl	PVC	PP	PVDF	1.4404	FPM	EPDM	Tygon	Pharmed	PE	2.4819
Ferric Nitrate	$Fe(NO_3)_3$	s	+	+	+	+	+	+	+	+	+	+	+
Ferric Phosphate	$FePO_4$	s	+	+	+	+	+	+	+	+	+	+	+
Ferric Sulphate	$Fe_2(SO_4)_3$	s	+	+	+	+	o	+	+	+	+	+	+
Ferrous Chloride	$FeCl_2$	s	+	+	+	+	-	+	+	+	+	+	+/o
Ferrous Sulphate	$FeSO_4$	s	+	+	+	+	+	+	+	+	+	+	+
Fixing Salt	=> Sodium Thiosulphate												
Fluoro Benzene	C_6H_5F	100%	-	-	+	+	+	o	-	-	-	o	+
Fluoroboric Acid	HBF_4	35%	+	+	+	+	o	+	+	+	-	+	+
Fluorosilicic Acid	H_2SiF_6	100%	+	30%	30%	+	o	+	+	25%	o	40%	+/o
Formaldehyde	CH_2O	40%	+	+	+	+	+	-	+/o	-	-	+	+
Formalin	=> Formaldehyde												
Formamide	$HCONH_2$	100%	+	-	+	+	+	+	+	n	n	+	+
Formic Acid	HCOOH	s	-	+/o	+	+	+	-	-	+/o	+/o	+	+
Furane	C_4H_4O	100%	-	-	+	-	+	-	n	-	-	+	+
Furane Aldehyde	$C_5H_5O_2$	100%	n	n	n	o	+	-	+/o	-	-	n	n
Furfuryl Alcohol	$OC_4H_3CH_2OH$	100%	-	-	+	o	+	n	+/o	-	-	+	+
Gallic Acid	$C_6H_2(OH)_3COOH$	5%	+	+	+	+	+	+	+/o	+	+	+	+
Gasoline		100%	-	-	+	+	+	+	-	-	-	+	+
Glauber´s Salt	=> Sodium Sulphate												
Glucose	$C_6H_{12}O_6$	s	+	+	+	+	+	+	+	+	+	+	+
Glycerol	$C_3H_5(OH)_3$	100%	+	+	+	+	+	+	+	+	+	+	+
Glycerol Triacetate	$C_3H_5(CH_3COO)_3$	100%	n	n	+	+	+	-	+	n	n	+	+
Glycine	NH_2CH_2COOH	10%	+	+	+	+	+	+	+	+	+	+	+
Glycol	$C_2H_4(OH)_2$	100%	+	+	+	+	+	+	+	+	+	+	+
Glycolic Acid	$CH_2OHCOOH$	70%	+	37%	+	+	+	+	+	+	+/o	+	+
Gypsum	=> Calcium Sulphate												
Heptane	C_7H_{16}	100%	+	+	+	+	+	+	-	-	-	+	+
Hexacloroplatinic Acid	H_2PtCl_6	s	n	+	+	+	-	n	+	n	n	+	-
Hexanal	$C_5H_{11}CHO$	100%	n	n	+	+	+	-	+/o	-	-	+	+
Hexane	C_6H_{14}	100%	+	+	+	+	+	+	-	-	-	+	+
Hexanol	$C_6H_{13}OH$	100%	-	-	+	+	+	n	+	-	o	+	+
Hexantriol	$C_6H_9(OH)_3$	100%	n	n	+	+	+	+	+	n	n	+	+
Hexene	C_6H_{12}	100%	n	+	+	+	+	+	-	-	-	+	+
Hydrazine Hydrate	$N_2H_4 * H_2O$	s	+	+	+	+	+	n	+	-	o	+	+
Hydrobromic Acid	HBr	50%	+	+	+	+	-	-	+	+	-	+	o
Hydrochloric Acid	HCl	38%	32%	+ *	+	+	-	o	+	+	o	+	o
Hydrofluoric Acid	HF	80%	-	40%*	40%**	+	-	+	o	40%	-	40%	+/o
Hydrogen Cyanide	HCN	s	+	+	+	+	+	+	+	+	+	+	+
Hydrogen Peroxide	H_2O_2	90%	40%	40%	30%	+	+	30%	30%	30%	+	+	+
Hydroiodic Acid	HI	s	+	+	+	+	-	-	n	+	-	+	n
Hydroquinone	$C_6H_4(OH)_2$	s	o	+	+	+	+	+	-	+	+/o	+	+
Hydroxylamine Sulphate	$(NH_2OH)_2 * H_2SO_4$	10%	+	+	+	+	+	+	+	+	+	+	+
Hypochlorous Acid	HOCl	s	+	+	o	+	-	+	+/o	+	+	o	+
Iodine	I_2	s	o	-	+	+	-	+	+/o	+	+	o	+/o
Iron Vitriol	=> Ferrous Sulphate												
Isobutanol	=> Isobutyl Alcohol												
Isobutyl Alcohol	$C_2H_5CH(OH)CH_3$	100%	-	+	+	+	+	+	+	-	o	+	+

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Isopropanol	=> Isopropyl Alcohol												
Isopropyl Acetate	$CH_3COOCH(CH_3)_2$	100%	-	-	+	+	+	-	+/o	-	+/o	+	+
Isopropyl Alcohol	$(CH_3)_2CHOH$	100%	-	+/o	+	+	+	+	+	-	o	+	+
Isopropyl Benzene	$C_6H_5CH(CH_3)_2$	100%	-	-	o	+	+	+	-	-	-	o	+
Isopropyl Chloride	$CH_3CHClCH_3$	80%	-	-	o	+	+	+	-	-	o	o	+/o
Isopropyl Ether	$C_6H_{14}O$	100%	-	-	o	+	+	-	-	-	o	o	+
Kitchen Salt	=> Sodium Chloride												
Lactic Acid	$C_3H_6O_3$	100%	-	+	+	+	+/o	+	10%	-	+/o	+	+
Lead Acetate	$Pb(CH_3COO)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Lead Nitrate	$Pb(NO_3)_2$	50%	+	+	+	+	+	+	+	+	+	+	+
Lead Sugar	=> Lead Acetate												
Lead Sulphate	$PbSO_4$	s	+	+	+	+	+	+	+	+	+	+	+
Lead Tetraethyl	$Pb(C_2H_5)_4$	100%	+	+	+	+	+	+	-	n	n	+	+
Lime Milk	=> Calcium Hydroxide												
Liquid Ammonia	=> Ammonium Hydroxide												
Lithium Bromide	LiBr	s	+	+	+	+	+	+	+	+	+	+	+
Lithium Chloride	LiCl	s	+	+	+	+	-	+	+	+	+	+	n
Lunar Caustic	=> Silver Nitrate												
Magnesium Carbonate	$MgCO_3$	s	+	+	+	+	+	+	+	+	+	+	+/o
Magnesium Chloride	$MgCl_2$	s	+	+	+	+	o	+	+	+	+	+	+
Magnesium Hydroxide	$Mg(OH)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Magnesium Nitrate	$Mg(NO_3)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Magnesium Sulphate	$MgSO_4$	s	+	+	+	+	+	+	+	+	+	+	+/o
Maleic Acid	$C_4H_4O_4$	s	+	+	+	+	+	+	+	-	o	+	+
Malic Acid	$C_4H_6O_5$	s	+	+	+	+	+	+	+	+	+	+	+
Manganese-II-Chloride	$MnCl_2$	s	+	+	+	+	-	+	+	+	+	+	+
Manganese-II-Sulphate	$MnSO_4$	s	+	+	+	+	+	+	+	+	+	+	+
MEK	=> Methyl Ethyl Ketone												
Mercury	Hg	100%	+	+	+	+	+	+	+	+	+	+	+
Mercury-II-Chloride	$HgCl_2$	s	+	+	+	+	-	+	+	+	+	+	+
Mercury-II-Cyanide	$Hg(CN)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Mercury-II-Nitrate	$Hg(NO_3)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Mesityl Oxide	$C_6H_{10}O$	100%	-	-	n	n	+	-	+/o	-	-	n	+
Methacrylic Acid	C_3H_5COOH	100%	n	n	+	+	+	o	+/o	-	+/o	+	+
Methanol	CH_3OH	100%	-	+	+	+	+	o	+	-	+/o	+	+
Methoxybutanol	$CH_3O(CH_2)_4OH$	100%	-	-	+	+	+	+	o	-	o	+	+
Methyl Acetate	CH_3COOCH_3	60%	-	-	+	+	+	-	+/o	-	+/o	+	+
Methyl Acrylate	$C_2H_3COOCH_3$	100%	-	-	+	+	+	-	+/o	-	o	+	+
Methyl Benzoate	$C_6H_5COOCH_3$	100%	-	-	+	o	+	+	-	-	-	+	+
Methyl Catechol	$C_6H_3(OH)_2CH_3$	s	+	+	+	+	+	+	-	+	+o	+	+
Methyl Cellulose		s	+	+	+	+	+	+	+	+	+	+	+
Methyl Chloroacetate	$ClCH_2COOCH_3$	100%	-	o	+	+	+	o	-	-	-	+	+
Methyl Cyclopentane	$C_5H_9CH_3$	100%	+	+	+	+	+	+	-	-	-	+	+
Methyl Dichloroacetate	$Cl_2CHCOOCH_3$	100%	-	-	+	n	+	-	n	-	-	+	+
Methyl Ethyl Ketone	$CH_3COC_2H_5$	100%	-	-	+	-	+	-	+	-	-	+	+
Methyl Glycol	$C_3H_8O_2$	100%	+	+	+	+	+	-	+/o	+	+	+	+
Methyl Isobutyl Ketone	$CH_3COC_4H_9$	100%	-	-	+	-	+	-	o	-	-	+	+

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Methyl Isopropyl Ketone	$CH_3COC_3H_7$	100%	-	-	+	-	+	-	+/o	-	-	+	+
Methyl Methacrylate	$C_3H_5COOCH_3$	100%	-	-	+	+	+	-	-	-	-	+	+
Methyl Oleate	$C_{17}H_{33}COOCH_3$	100%	n	n	+	+	+	+	+/o	n	n	+	+
Methyl Salicylate	$HOC_6H_4COOCH_3$	100%	-	-	+	+	+	n	+/o	-	-	+	+
Methylacetyl Acetate	$C_5H_8O_3$	100%	-	-	+	+	+	-	+/o	-	o	+	+
Methylamine	CH_3NH_2	32%	+	o	+	o	+	-	+	+	+	+	+
Methylene Chloride	=> Dichloro Methane												
Mirabilit	=> Sodium Sulphate												
Morpholine	C_4H_9ON	100%	-	-	+	-	+	n	n	-	-	+	+
Muriatic Acid	=> Hydrochloric Acid												
Natron	=> Sodium Bicarbonate												
Nickel-II-Acetate	$(CH_3COO)_2Ni$	s	+	+	+	+	+	-	+	+	+	+	+
Nickel-II-Chloride	$NiCl_2$	s	+	+	+	+	-	+	+	+	+	+	+
Nickel-II-Nitrate	$Ni(NO_3)_2$	s	+	+	+	+	+	+	+	+	+	+	+/o
Nickel-II-Sulphate	$NiSO_4$	s	+	+	+	+	+	+	+	+	+	+	+/o
Nitrate of Lime	=> Calcium Nitrate												
Nitric Acid	HNO_3	99%	40%	50%*	50%	65%	90%	65%	40%	35%	35%	50%	65%
Nitro Methane	CH_3NO_2	100%	-	-	+	o	+	-	+/o	-	-	+	+
Nitro Propane	$(CH_3)_2CHNO_2$	100%	-	-	+	n	+	-	+/o	-	-	+	+
Nitro Toluene	$C_6H_4NO_2CH_3$	100%	-	-	+	+	+	o	-	-	-	+	+
Octane	C_8H_{18}	100%	o	+	+	+	+	+	-	-	-	+	+
Octanol	$C_8H_{17}OH$	100%	-	-	+	+	+	+	+	-	-	+	+
Octyl Cresol	$C_{15}H_{24}O$	100%	-	-	+	+	+	o	n	-	-	+	+
Oil	=> Engine Oils												
Oleum	$H_2SO_4 + SO_3$	s	n	-	-	-	+	+	-	+	+	-	+
Orthophosphoric Acid	=> Phosphoric Acid												
Oxalic Acid	$(COOH)_2$	s	+	+	+	+	10%	+	+	+/o	+/o	+	+/o
Pentane	C_5H_{12}	100%	+	+	+	+	+	+	-	-	-	+	+
Pentanol	=> Amyl Alcohol												
Perchloric Acid	$HClO_4$	70%	n	10%	10%	+	-	+	+/o	o	+	+	n
Perchloroethylene	=> Tetrachloro Ethylene												
Perhydrol	=> Hydrogen Peroxide												
Petroleum Ether	C_nH_{2n+2}	100%	+	+/o	+	+	+	+	-	-	-	+	+
Phenole	C_6H_5OH	100%	-	-	+	+	+	+	-	10%	+	+	+
Phenyl Ethyl Ether	$C_6H_5OC_2H_5$	100%	-	-	+	n	+	-	-	-	-	+	+
Phenyl Hydrazine	$C_6H_5NHNH_2$	100%	-	-	o	+	+	o	-	-	-	o	+
Phosphoric Acid	H_3PO_4	85%	50%	+	+	+	+	+	+	+	+	+	+
Phosphorous Oxychloride	$POCl_3$	100%	-	-	+	+	n	+	+	n	n	+	+
Phosphorous Trichloride	PCl_3	100%	-	-	+	+	+	o	+	+	+/o	+	+
Phthalic Acid	$C_6H_4(COOH)_2$	s	+	+	+	+	+	+	+	-	+	+	+
Picric Acid	$C_6H_2(NO_3)_3OH$	s	+	+	+	+	+	+	+	+	-	+	+
Piperidine	$C_5H_{11}N$	100%	-	-	n	n	+	-	-	-	-	n	+
Potash Alum	=> Potassium Aluminium Sulphate												
Potassium Acetate	CH_3COOK	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Aluminium Sulphate	$KAl(SO_4)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Bicarbonate	$KHCO_3$	40%	+	+	+	+	+	+	+	+	+	+	+/o
Potassium Bifluoride	KHF_2	s	n	+	+	+	+	+	+	+	+	+	+

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Potassium Bisulphate	$KHSO_4$	5%	+	+	+	+	+	+	+	+	+	+	+
Potassium Bitartrate	$KC_4H_5O_6$	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Borate	KBO_2	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Bromate	$KBrO_3$	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Bromide	KBr	s	+	+	+	+	10%	+	+	+	+	+	10%
Potassium Carbonate	K_2CO_3	s	+	+	+	+	+	+	+	55%	55%	+	+
Potassium Chlorate	$KClO_3$	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Chloride	KCl	s	+	+	+	+	-	+	+	+	+	+	+/o
Potassium Chromate	K_2CrO_4	10%	+	+	+	+	+	+	+	+	+	+	+
Potassium Chrome Sulphate	$KCr(SO_4)_2$	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Cyanate	KOCN	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Cyanide	KCN	s	+	+	+	+	5%	+	+	+	+	+	5%
Potassium Cyanoferrate II	$K_4Fe(CN)_6$	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Cyanoferrate III	$K_3Fe(CN)_6$	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Dichromate	$K_2Cr_2O_7$	s	+	+	+	+	25%	+	+	+	+	+	10%
Potassium Fluoride	KF	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Hydroxyde	KOH	50%	+	+	+	+	+	-	+	10%	10%	+	+
Potassium Iodide	KI	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Nitrate	KNO_3	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Perchlorate	$KClO_4$	s	+	+	+	+	n	+	+	+	+	+	+
Potassium Permanganate	$KMnO_4$	s	+	+	+	+	+	+	+	6%	6%	+	+
Potassium Persulphate	$K_2S_2O_8$	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Phosphate	KH_2PO_4	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Pyrochromate	=> Potassium Dichromate												
Potassium Sulphate	K_2SO_4	s	+	+	+	+	+	+	+	+	+	+	+
Potassium Sulphite	K_2SO_3	s	+	+	+	+	+	+	+	+	+	+	+
Propionic Acid	C_2H_5COOH	100%	o	+	+	+	+	+	+	-	+/o	+	+
Propionitrile	CH_3CH_2CN	100%	n	n	+	+	+	+	-	-	-	+	+
Propyl Acetate	$CH_3COOC_3H_7$	100%	-	-	+	+	+	-	+/o	-	-	+	+
Propylene Glycol	$CH_3CHOHCH_2OH$	100%	+	+	+	+	+	+	+	+	+	+	+
Prussic Acid	=> Hydrogen Cyanide												
Pyridine	C_5H_5N	100%	-	-	o	-	+	-	-	-	o	+	+
Pyrrole	C_4H_4N	100%	n	n	+	n	+	-	-	-	-	+	+
Roman Vitriol	=> Copper Sulphate												
Salicylic Acid	HOC_6H_4COOH	s	+	+	+	+	+	+	+	+	+	+	+/o
Salmiac	=> Ammonium Chloride												
Saltpeter	=> Potassium Nitrate												
Silic Acid	$SiO_2 * x H_2O$	s	+	+	+	+	+	+	+	+	+	+	+
Silver Bromide	AgBr	s	+	+	+	+	+/o	+	+	+	+	+	+
Silver Chloride	AgCl	s	+	+	+	+	-	+	+	+	+	+	+/o
Silver Nitrate	$AgNO_3$	s	+	+	+	+	+	+	+	+	+	+	+/o
Slaked Lime	=> Calcium Hydroxide												
Soda	=> Sodium Carbonate												
Sodium Acetate	$NaCH_3COO$	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Benzoate	C_6H_5COONa	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Bicarbonate	$NaHCO_3$	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Bisulphate	$NaHSO_4$	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Bisulphite	$NaHSO_3$	s	+	+	+	+	+	+	+	+	+	+	+

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Sodium Borate	$NaBO_2$	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Bromate	$NaBrO_3$	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Bromide	NaBr	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Carbonate	Na_2CO_3	s	+	+	+	+	+/o	+	+	+	+	+	+
Sodium Chlorate	$NaClO_3$	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Chloride	NaCl	s	+	+	+	+	-	+	+	+	+	+	+
Sodium Chlorite	$NaClO_2$	24%	+	+	+	+	10%	+	+	+	+	+	10%
Sodium Chromate	Na_2CrO_4	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Cyanide	NaCN	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Dichromate	$Na_2Cr_2O_7$	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Dithionite	$Na_2S_2O_4$	s	+	10%	10%	+	+	n	n	+	+	10%	+/o
Sodium Fluoride	NaF	s	+	+	+	+	10%	+	+	+	+	+	+
Sodium Hydrogen Sulphate	=> Sodium Bisulphate												
Sodium Hydroxide	NaOH	50%	+	+	+	+	+	-	+	10%	30%	+	+
Sodium Hypochlorite	NaOCl + NaCl	12%	+	+	o	+	-	+	+	+	+	o	o
Sodium Iodide	NaI	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Metaphosphate	$(NaPO_3)_n$	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Nitrate	$NaNO_3$	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Nitrite	$NaNO_2$	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Oxalate	$Na_2C_2O_4$	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Perborate	$NaBO_2*H_2O_2$	s	+	+/o	+	+	+	+	+	+	+	+	+/o
Sodium Perchlorate	$NaClO_4$	s	+	+	+	+	10%	+	+	+	+	+	10%
Sodium Peroxide	Na_2O_2	s	+	+	+	+	+	+	+	n	n	-	+
Sodium Persulphate	$Na_2S_2O_8$	s	n	+	+	+	+	+	+	+	+	+	+
Sodium Pyrosulphite	$Na_2S_2O_5$	s	+	+	+	+	+	n	n	+	+	+	+
Sodium Salicylate	$C_6H_4(OH)COONa$	s	+	+/o	+	+	+	+	+	+	+	+	+
Sodium Silicate	Na_2SiO_3	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Sulphate	Na_2SO_4	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Sulphide	Na_2S	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Sulphite	Na_2SO_3	s	+	+	+	+	50%	+	+	+	+	+	50%
Sodium Tetraborate	$Na_2B_4O_7 * 10H_2O$	s	+	+	+	+	+	+	+	+	+	+	+
Sodium Thiosulphate	$Na_2S_2O_3$	s	+	+	+	+	25%	+	+	+	+	+	25%
Sodium Tripolyphosphate	$Na_5P_3O_{10}$	s	+	+	+	+	+	+/o	+	+	+	+	+
Starch	$(C_6H_{10}O_5)_n$	s	+	+	+	+	+	+	n	+	+	+	+
Starch Gum		s	+	+	+	+	+	+	+	+	+	+	+
Styrene	$C_6H_5CHCH_2$	100%	-	-	o	+	+	o	-	-	-	o	+
Sublimate	=> Mercury-II-Chloride												
Succinic Acid	$C_4H_6O_4$	s	+	+	+	+	+	+	+	+	+	+	+
Sugar Syrup		s	+	+	+	+	+	+	+	+	+	+	+
Sulphur Chloride	=> Disulphur Dichloride												
Sulphuric Acid	H_2SO_4	98%	30%	50%	85%	+	20%	+	+	30%	30%	80%	+
Sulphuric Acid, fuming	=> Oleum												
Sulphurous Acid	H_2SO_3	s	+	+	+	+	10%	+	+	+	+	+	+
Sulphuryl Chloride	SO_2Cl_2	100%	-	-	-	o	n	+	o	-	-	-	n
Tannic Acid	$C_{76}H_{52}O_{46}$	50%	+	+	+	+	+	+	+	+	+	+	+
Tartaric Acid	$C_4H_6O_6$	s	50%	+	+	+	+	+	+/o	+	+	+	+
Tetrachloro Ethane	$C_2H_2Cl_4$	100%	-	-	o	+	+	o	-	-	o	o	+
Tetrachloro Ethylene	C_2Cl_4	100%	-	-	o	+	+	o	-	-	o	o	+
Tetrachloromethane	=> Carbon Tetrachloride												

ProMinent® Chemical Resistance List

Resistance of Materials Used in Liquid Ends to the Chemicals Most Frequently Used

Chemical	Formula	Conc	Acryl	PVC	PP	PVDF	1.4404	FPM	EPDM	Tygon	Pharmed	PE	2.4819
Tetrahydro Furane	C_4H_8O	100%	-	-	o	-	+	-	-	-	-	o	+
Tetrahydro Naphthalene	$C_{10}H_{12}$	100%	-	-	-	+	+	+	-	-	-	o	+
Tetralin	=> Tetrahydro Naphthalene												
THF	=> Tetrahydrofurane												
Thionyl Chloride	$SOCl_2$	100%	-	-	-	+	n	+	+	+	+	-	n
Thiophene	C_4H_4S	100%	n	-	o	n	+	-	-	-	-	o	+
Tin-II-Chloride	$SnCl_2$	s	+	o	+	+	-	+	+	+	+	+	+/o
Tin-II-Sulphate	$SnSO_4$	s	n	+	+	+	+	+	+	+	+	+	+/o
Tin-IV-Chloride	$SnCl_4$	s	n	+	+	+	-	+	+	+	+	+	+
Titanium Tetrachloride	$TiCl_4$	100%	n	n	n	+	n	o	-	n	n	n	n
Toluene	$C_6H_5CH_3$	100%	-	-	o	+	+	o	-	-	-	o	+
Toluene Diisocyanate	$C_7H_3(NCO)_2$	100%	n	n	+	+	+	-	+/o	n	n	+	+
Tributyl Phosphate	$(C_4H_9)_3PO_4$	100%	n	-	+	+	+	-	+	o	+	+	+
Trichloro Ethane	CCl_3CH_3	100%	-	-	o	+	+	+	-	-	o	o	+
Trichloro Ethylene	C_2HCl_3	100%	-	-	o	+	+/o	o	-	-	o	o	+
Trichloro Methane	=> Chloroform												
Trichloroacetaldehyde Hydrate	$CCl_3CH(OH)_2$	s	-	-	o	-	+	o	o	n	n	+	+
Trichloroacetic Acid	CCl_3COOH	50%	-	+	+	+	-	-	o	+	+/o	+	+
Tricresyl Phosphate	$(C_7H_7)_3PO_4$	90%	-	-	+	n	+	o	+	o	+	+	+
Triethanol Amine	$N(C_2H_4OH)_3$	100%	+	o	+	n	+	-	+/o	-	o	+	+
Trilene	=> Trichloro Ethane												
Trioctyl Phosphate	$(C_8H_{17})_3PO_4$	100%	n	-	+	+	+	o	+	o	+	+	+
Trisodium Phosphate	Na_3PO_4	s	+	+	+	+	+	+	+	+	+	+	+
Urea	$CO(NH_2)_2$	s	+	+/o	+	+	+	+	+	20%	20%	+	+
Vinyl Acetate	$CH_2=CHOOCCH_3$	100%	-	-	+	+	+	n	n	-	+/o	+	+
Water Glass	=> Sodium Silicate												
Xylene	$C_6H_4(CH_3)_2$	100%	-	-	-	+	+	o	-	-	-	o	+
Zinc Acetate	$(CH_3COO)_2Zn$	s	+	+	+	+	+	-	+	+	+	+	+
Zinc Chloride	$ZnCl_2$	s	+	+	+	+	-	+	+	+	+	+	n
Zinc Sulphate	$ZnSO_4$	s	+	+	+	+	+	+	+	+	+	+	+/o