

### Chemical Mixing Compatibility Chart

Modified from: EPA's Chemical Compatibility Chart, April, 1980, A Method for Determining the Compatibility of Chemical Mixtures, EPA-600/2-80-076.

**X** = Mixing may result in generation of: Innocuous, non-flammable gas,  
Toxic gas,  
Flammable gas,  
Heat,  
Fire,  
Explosion,  
Violent polymerization,  
Solubilization of toxic substances,  
Or may be hazardous but unknown.

Chemical Group																																										
1	Acids, Mineral, Non-oxidizing	1																																								
2	Acids, Mineral, Oxidizing		2																																							
3	Acids, Organic		X	3																																						
4	Alcohols and Glycols	X	X	X	4																																					
5	Aldehydes	X	X	X		5																																				
6	Amides	X	X				6																																			
7	Amines, Aliphatic and Aromatic	X	X	X		X		7																																		
8	Azo Compounds, Diazo Compounds and Hydrazines	X	X	X	X	X			8																																	
9	Carbamates	X	X					X		9																																
10	Caustics	X	X	X		X				X		10																														
11	Cyanides	X	X	X					X				11																													
12	Dithiocarbamates	X	X	X		X		X	X					12																												
13	Esters	X	X						X		X				13																											
14	Ethers	X	X												14																											
15	Fluorides, Inorganic	X	X	X											15																											
16	Hydrocarbons, Aromatic		X													16																										
17	Halogenated Organics	X	X					X	X		X	X				17																										
18	Isocyanates	X	X	X	X			X	X		X	X	X			18																										
19	Ketones	X	X					X		X	X					19																										
20	Mercaptans and Other Organic Sulfides	X	X					X							X	X	X	20																								
21	Metals, Alkali and Alkaline Earth, Elemental	X	X	X	X	X	X	X	X	X	X	X	X			X	X	X	X	21																						
22	Metals, Other Elemental & Alloys as Powders, Vapors, or Sponges	X	X	X					X	X	X					X	X	X		22																						
23	Metals, Other Elemental & Alloys as Sheets, Rods, Drops, etc.	X	X						X							X				23																						
24	Metals and Metal Compounds, Toxic	X	X	X			X	X		X										24																						
25	Nitrides	X	X	X	X	X		X	X	X	X	X	X			X	X	X	X	X	25																					
26	Nitriles	X	X	X						X								X		X	X	26																				
27	Nitro Compounds, Organic		X			X				X								X			X	27																				
28	Hydrocarbons, Aliphatic, Unsaturated	X	X			X											X					28																				
29	Hydrocarbons, Aliphatic, Saturated		X																			29																				
30	Peroxides and Hydroperoxides, Organic	X	X		X	X		X	X	X		X	X			X	X	X	X	X	X	X	X	X	X	X	30															
31	Phenols and Cresols	X	X					X								X		X		X						X	X	31														
32	Organophosphates, Phosphothioates, Phosphodithioates	X	X					X	X							X										X		32														
33	Sulfides, Inorganic	X	X	X		X		X								X										X		33														
34	Epoxides	X	X	X	X	X		X	X		X	X	X				X	X	X		X	X			X	X	X	X	34													
35	Combustible and Flammable Materials, Miscellaneous	X	X														X		X						X				35													
36	Explosives	X	X	X				X	X		X						X	X	X	X	X				X	X	X	X	X	36												
37	Polymerizable Compounds	X	X	X				X	X	X	X						X	X	X	X	X				X	X	X	X	X	37												
38	Oxidizing Agents, Strong	X		X	X	X	X	X	X		X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	38											
39	Reducing Agents, Strong	X	X	X	X	X	X			X	X				X	X	X	X	X				X	X		X	X	X	X	X	39											
40	Water and Aqueous Mixtures	X	X					X								X		X	X	X	X								X		40											
41	Water Reactive Substances	←←←← Extremely Reactive! - Do Not Mix With Any Chemical! - Extremely Reactive! →→→→																																						41		
		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41