

# Compatibility Guide

A=Excellent, B=Good, C=Fair to Poor, D=Not recommended

**Bold Headings = TPE** *Italic Headings = TS*

X or Brackets around a rating letter, no data is available, but the ratings are made on the basis of exposure test in similar chemical groups

\*All degrees are in Fahrenheit

| MATERIAL                               | Nitrile (TPE) | Santoprene | Teflon | Nitrile (TS) | Hytre | Neoprene | Urethane | EPR,EPDM | Viton | Polypropylene | Acetal | PVDF   | Aluminum | Cast Iron | Stainless | Hastelloy |
|--|---------------|------------|--------|--------------|-------|----------|----------|----------|-------|---------------|--------|--------|----------|-----------|-----------|-----------|
| Acetaldehyde (Ethanol)                 | D             | B          | A      | D            | B     | D        | D        | A        | D     | C             | A      | D      | B        | A         | A         | A         |
| Acetamide(Ethanamide)                  | A             | A          | A      | A            | D     | B        | D        | A        | A     | A/70°         | A      | A/75°  | A        | A         | A         | A         |
| Acetate Solvents                       | D             | B          | A      | D            | D     | D        | D        | A        | D     | B             | A/70°  | A/70°  | A        | D         | A         | A         |
| Acetic Acid                            | C             | B          | A      | C            | D     | C        | C        | A        | C     | B             | D      | A      | B        | D         | A         | A         |
| Acetic Anhydride                       | D             | A          | A      | D            | C(B)  | B        | D        | B        | D     | C             | D      | D      | B        | D         | A         | A         |
| Acetone                                | D             | B          | A      | D            | C     | D        | D        | A        | D     | D             | B      | D      | A        | A         | A         | A         |
| Acetonitrile (Methyl Cyanide)          | D             | A/70°      | A      | D            | X     | D        | B        | A        | D     | B/70°         | X      | A/120° | A        | A         | A         | B         |
| Acetophenone (Acetyl Benzene)          | D             | B          | A      | D            | X     | D        | X        | B        | D     | B/70°         | X      | A/70°  | B        | A         | A         | B         |
| Acetyl Acetone                         | D             | X          | A      | D            | X     | D        | D        | A        | D     | X             | X      | X      | D        | A         | A         | X         |
| Acetyl Chloride                        | D             | B/70°      | A      | D            | D     | D        | D        | D        | B     | D             | X      | A/120° | D        | A         | B         | A         |
| Acetylene                              | A             | X          | A      | A            | A     | B        | D        | A        | A     | D             | A      | A      | A        | A         | A         | A         |
| Acetyl Salicylic Acid (Aspirin)        | X             | C          | A      | A            | X     | B        | X        | B        | A     | X             | X      | X      | D        | B         | B         | X         |
| Acrolein (Acryalddehyde)               | X             | A          | A      | C            | D     | D        | D        | A        | B     | X             | X      | X      | B        | B         | B         | X         |
| Acrylonitrile (Vinyl Cyanide)          | D             | D          | A      | D            | D     | D        | D        | C        | D     | B             | X      | A/70°  | A        | A         | A         | A         |
| Adipic Acid                            | B             | B          | A      | A            | D     | A/140°   | X        | A        | A     | A             | A/70°  | A      | B        | B         | B         | A         |
| Aero Lubriplate                        | A             | C          | A      | A            | D     | A        | X        | D        | A     | A             | A      | A      | A        | A         | A         | A         |
| Aerosafe 2300                          | D             | B          | A      | D            | A     | D        | A        | A        | D     | X             | A      | X      | A        | A         | A         | X         |
| Aerosafe 2300W                         | D             | B          | A      | D            | A     | D        | D        | A        | D     | X             | A      | X      | A        | A         | A         | X         |
| Aeroshell 1AC                          | A             | D          | A      | A            | D     | B        | B        | D        | A     | A             | A      | B      | A        | A         | A         | A         |
| Aeroshell 7A Grease                    | A             | D          | A      | A            | D     | B        | D        | D        | A     | X             | A      | X      | A        | A         | A         | X         |
| Aeroshell 17 Grease                    | A             | D          | A      | A            | D     | B        | A        | D        | A     | X             | A      | X      | A        | A         | A         | X         |
| Aeroshell 750                          | C             | D          | A      | B            | D     | D        | A        | D        | A     | X             | A      | X      | A        | A         | A         | A         |
| Alcohol Amyl (1-Pentanol)              | B             | A          | A      | B            | A     | B        | D        | A        | B     | A             | A      | A      | B/70°    | B         | A         | A         |
| Alcohol Benzyl (Phenol Carbinol)       | D             | A          | A      | D            | D     | B        | C        | C        | A     | A/70°         | A/70°  | A      | B/70°    | A         | A         | A         |
| Alcohol Butyl (Butanol)                | B             | A          | A      | A            | D     | A        | D        | A        | A     | B             | A      | A      | B        | B         | A         | A         |
| Alcohol Diacetone (Tyranton)           | D             | C          | A      | D            | D     | D        | D        | B        | D     | B             | A      | A/70°  | B        | B         | A         | A         |
| Alcohol Ethyl (Ethanol)                | A             | B          | A      | A            | A     | A        | D        | A        | A     | A             | A      | A      | B/200°   | A         | A         | A         |
| Alcohol Hexyl (1-Hexanol)              | A             | B          | A      | A            | D     | B        | D        | B        | A     | A/70°         | A      | A      | A        | A         | A         | A         |
| Alcohol Isobutyl (2-Methyl-1-Propanol) | C             | A          | A      | C            | B     | A        | D        | B        | A     | A/70°         | A      | A      | B        | C         | A         | A         |
| Alcohol Isopropyl (2-Propanol)         | C             | B          | A      | C            | A     | B        | D        | B        | A     | A             | A      | A/150° | B        | C         | A         | A         |
| Alcohol Methyl (Methanol)              | A             | A          | A      | A            | A     | A        | D        | B        | D     | A/120°        | A      | A      | B        | A         | A         | A         |
| Alcohol Octyl (Caprylic Alcohol)       | X             | B          | A      | B            | D     | B        | D        | A        | A     | X             | A      | X      | A        | A         | A         | A         |
| Alcohol Propyl (Propanol)              | A             | A          | A      | A            | D     | A        | D        | B        | A     | A             | A      | A/120° | A        | A         | A         | A         |
| Allyl Alcohol                          | A             | A          | A      | A            | D     | A        | B        | A        | B     | A             | X      | A      | B        | A         | A         | A         |
| Allyl Bromide                          | D             | X          | A      | D            | D     | D        | A        | D        | B     | X             | X      | X      | D        | A         | X         | X         |
| Allyl Chloride                         | C             | X          | A      | B            | D     | D        | D        | D        | B     | A             | X      | A      | D        | C         | B         | X         |
| Alkazene                               | D             | D          | A      | D            | D     | D        | D        | X        | A     | X             | X      | X      | X        | X         | X         | X         |
| Almond Oil (Artificial)                | D             | C          | A      | D            | D     | D        | D        | B/70°    | D     | D             | X      | X      | X        | X         | X         | X         |
| Alum (Aluminum Potasium Sulfate)       | A             | A          | A      | A            | D     | A        | D        | A        | A     | A             | A      | A      | C        | D         | B         | B         |
| Aluminum Acetate                       | X             | A          | A      | B            | X     | B        | D        | A        | D     | A             | A      | X      | A        | D         | B         | B         |
| Aluminum Ammonium Sulfate              | A             | B          | A      | A            | X     | A/170°   | X        | A        | A     | A             | X      | A      | X        | X         | X         | X         |
| Aluminum Bromide                       | B             | B          | A      | A            | D     | A        | D        | A        | A     | X             | X      | A      | X        | X         | X         | X         |
| Aluminum Chloride                      | A             | A          | A      | A            | B     | A        | B        | A        | A     | A             | B      | A      | B        | D         | C         | A         |
| Aluminum Fluoride                      | B             | A          | A      | A            | X     | A        | C/70°    | B        | A     | A             | D      | A      | B        | D         | A         | B         |
| Aluminum Hydroxide                     | A             | A          | A      | A            | D     | A        | B        | A        | A     | A             | A      | A      | A        | D         | A         | B         |
| Aluminum Nitrate                       | A             | A          | A      | A            | X     | A/70°    | C        | A        | A     | A             | B      | A      | B        | D         | A         | B         |
| Aluminum Phosphate                     | A             | A          | A      | A            | X     | A        | D        | A        | A     | A             | A      | A      | X        | X         | A         | X         |
| Aluminum Potassium Sulfate (Alum)      | A             | A          | A      | A            | D     | A        | D        | A        | A     | A             | A      | A      | C        | D         | B         | B         |

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|---------------------------------|---------------|------------|--------|--------------|--------|----------|----------|----------|-------|---------------|--------|--------|----------|-----------|-----------|-----------|
| Aluminum Sulfate (Sulphate)     | A             | A          | A      | A            | (B)    | A        | B        | A        | A     | A             | B/70°  | A      | A        | D         | A         | A         |
| Amines                          | D             | A          | A      | D            | D      | D        | D        | C        | D     | B/120°        | C/70°  | X      | A        | D         | A         | B         |
| Ammonia, Gas, Cold              | B             | A          | A      | A            | D      | A        | B        | A        | D     | B             | A      | D      | X        | X         | X         | X         |
| Ammonia, Anhydrous              | B             | A          | A      | B            | D      | A        | X        | A        | D     | A/70°         | D      | D      | A/70°    | A         | A         | A         |
| Ammonia Liquids                 | B             | A          | A      | B            | X      | A        | B        | A        | D     | A/70°         | D      | A      | D        | A         | A         | B         |
| Ammonia Nitrate                 | A             | A          | A      | A            | X      | C        | B        | A        | D     | A             | B/70°  | A      | C        | A         | A         | B         |
| Ammonium Acetate                | A             | A          | A      | A            | D      | A        | D        | A        | A     | A             | C      | X      | B        | A         | X         | X         |
| Ammonium Bicarbonate            | B             | A          | A      | A            | X      | A        | C        | B        | D     | X             | X      | X      | X        | X         | X         | X         |
| Ammonium Bifluoride             | A             | A          | A      | A            | X      | A        | D        | A        | A     | A             | X      | A      | X        | D         | X         | X         |
| Ammonium Carbonate              | C             | A          | A      | B            | X      | A        | A        | A        | A     | A             | D      | A      | B        | B         | B         | B         |
| Ammonium Casenite               | X             | A          | A      | X            | X      | A        | X        | X        | X     | X             | A      | X      | X        | X         | A         | X         |
| Ammonium Chloride 1%            | A             | A          | A      | B            | A/70°  | A        | B/70°    | A        | A     | A             | A      | A      | C        | D         | C         | A         |
| Ammonium Dichromate             | B             | A          | A      | A            | X      | A        | X        | A        | X     | X             | X      | X      | A        | A         | X         | X         |
| Ammonium Diphosphate            | X             | A          | A      | A            | D      | A        | X        | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| Ammonium Fluoride               | B             | B          | A      | B            | X      | B        | X        | A        | A     | A             | X      | A      | D        | D         | D         | A         |
| Ammonium Hydroxide              | B             | A          | A      | B            | (B)    | A        | D        | A        | B     | A             | B      | A      | B        | B         | B         | A         |
| Ammonium Nitrate                | A             | A          | A      | A            | X      | A        | A        | A        | A     | A             | B      | A      | B        | A         | A         | A         |
| Ammonium Nitrite                | A             | A          | A      | A            | X      | A        | D        | A        | A     | A/70°         | X      | A      | X        | X         | A         | X         |
| Ammonium Oxalate- 5% Sol.       | B             | A          | A      | A            | X      | A        | X        | A        | X     | X             | B      | X      | X        | D         | A         | A         |
| Ammonium Persulfate Sol.        | D             | A          | A      | D            | X      | A        | D        | B        | A     | A             | X      | A      | C        | D         | A         | A         |
| Ammonium Phosphate              | A             | A          | A      | A            | B      | A        | B        | A        | A     | A             | B      | A      | B        | D         | A         | A         |
| Ammonium Sulfamate              | A             | A          | A      | A            | B      | A        | A        | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| Ammonium Sulfate                | A             | A          | A      | A            | B      | A        | A        | A        | A     | A             | A      | A      | B        | C         | A         | B         |
| Ammonium Sulfide                | X             | X          | A      | A            | X      | A        | B        | A        | D     | X             | X      | X      | X        | X         | X         | X         |
| Ammonium Sulfit                 | A             | A          | A      | A            | X      | A        | D        | A        | A     | A             | D      | X      | C        | D         | B         | A         |
| Ammonium Sulphate 1% - 5%       | A             | X          | A      | A            | C      | A        | B        | X        | D     | A             | A      | A      | B        | C         | A         | B         |
| Ammonium Thiocyanate            | X             | X          | A      | A            | X      | A        | X        | A        | A     | X             | X      | A      | C        | C         | A         | A         |
| Ammonium Thiosulfate            | A             | A          | A      | A            | X      | A        | X        | A        | A     | X             | B      | X      | A        | D         | A         | X         |
| Ammonium Thiophosphate          | A             | A          | A      | A            | D      | A        | X        | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| Amyl Acetate (banana oil)       | D             | D          | A      | D            | C      | D        | D        | A        | D     | B             | D      | A/120° | B        | X         | A         | B         |
| Amyl Alcohol                    | B             | A          | A      | B            | A      | A        | D        | A        | A     | B             | A      | A      | B        | C         | A         | B         |
| Amyl Borate                     | X             | B          | A      | B            | X      | A        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Amyl Chloride (Chloropentane)   | D             | C          | A      | D            | D      | D        | C        | D        | A     | D             | A      | A      | D        | A         | A         | B         |
| Amyl Chloranaphthalene          | C             | C          | A      | B            | X      | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Amyl Naphthalene                | D             | C          | A      | D            | D      | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Amyl Phenol                     | X             | C          | A      | D            | X      | X        | X        | X        | A     | X             | X      | X      | A        | A         | A         | A         |
| Anderol, L-774 (Di-Ester)       | X             | X          | A      | A            | X      | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| L-826 (Di-Ester)                | D             | D          | A      | B            | D      | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| L-829 (Di-Ester)                | D             | D          | A      | B            | D      | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| ANG-25 (Glycerol Ester)         | D             | X          | A      | B            | X      | B        | D        | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| ANG-25 (Di-Ester Base) (TG7449) | D             | D          | A      | B            | X      | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Anhydrous Ammonia               | B             | A          | A      | D            | D      | D        | D        | A        | D     | A/70°         | D      | D      | B        | D         | A         | A         |
| Anhydrous Hydrazine             | D             | X          | A      | D            | X      | B        | D        | B        | D     | X             | X      | X      | X        | X         | X         | X         |
| Anhydrous Hydrogen Fluoride     | D             | C          | A      | D            | X      | X        | D        | A        | D     | X             | X      | X      | X        | X         | X         | X         |
| Aniline                         | D             | A          | A      | D            | C      | D        | D        | D        | D     | A             | A/70°  | A/70°  | C        | C         | A         | B         |
| Aniline Dyes                    | D             | B          | A      | C            | D      | B        | D        | A        | A     | X             | D      | X      | B        | A         | B         | X         |
| Aniline Hydrochloride           | D             | A          | A      | C            | X      | D        | D        | B        | B     | D             | X      | A/100° | D        | D         | D         | X         |
| Aniline Oil                     | D             | C          | A      | D            | D      | D        | D        | B        | C     | X             | X      | X      | B        | A         | A         | B         |

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| Aniline Sulfite                   | X             | X          | X        | X            | X        | X        | X        | X        | X        | X             | X        | X        | X        | X         | C         | X         |
| Animal Oil (Lard Oil)             | B             | B          | A        | A            | B        | A        | C        | A        | A        | A             | A        | A        | A        | A         | A         | A         |
| Animal Gelatin                    | B             | B          | A        | A            | X        | A        | A        | A        | A        | X             | X        | X        | X        | X         | A         | X         |
| AN-0-3 Grade M                    | B             | B          | A        | A            | D        | D        | B        | B        | A        | X             | X        | X        | X        | X         | X         | X         |
| AN-0-6                            | B             | X          | A        | A            | D        | A        | D        | A        | A        | X             | X        | X        | X        | X         | X         | X         |
| <b>AN-0-366</b>                   | <b>B</b>      | <b>X</b>   | <b>A</b> | <b>A</b>     | <b>D</b> | <b>D</b> | <b>D</b> | <b>C</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Ansul Ether 161 or 181            | D             | D          | A        | C            | D        | X        | B        | C        | D        | X             | X        | X        | X        | X         | X         | X         |
| Anthraquinone                     | D             | D          | A        | C            | D        | D        | B        | C        | D        | X             | X        | X        | B        | B         | B         | A         |
| Anti-Freeze (Ethylene Glycol)     | A             | A          | A        | A            | A/70°    | A        | B        | A        | A        | A             | B        | A        | B        | B         | A         | A         |
| Antimony Chloride                 | B             | A          | A        | B            | D        | D        | X        | A        | B        | A             | X        | A        | B        | A         | A         | A         |
| Antimony Trichloride              | X             | A          | A        | B            | D        | C        | D        | B        | A        | A             | X        | A        | B        | A         | A         | B         |
| <b>AN-VV-0-366b Hydr. Fluid</b>   | <b>D</b>      | <b>D</b>   | <b>A</b> | <b>A</b>     | <b>D</b> | <b>C</b> | <b>D</b> | <b>D</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Aqua Regia(20% Nitric, 80% HCL)   | D             | D          | A        | D            | D        | D        | D        | B/140°   | A/70°    | B/70°         | D        | A/70°    | D        | D         | D         | C         |
| Argon                             | A             | A          | A        | A            | A        | D        | A        | A        | A        | X             | X        | X        | X        | X         | X         | X         |
| Aroclor                           | D             | D          | A        | D            | C        | D        | B/70°    | B        | A        | D             | X        | X        | A        | B         | A         | A         |
| Aromatic Fuel 50%                 | X             | C          | A        | A            | X        | D        | D        | D        | A        | X             | X        | X        | X        | X         | X         | X         |
| Aromatic Hydrocarbons             | D             | C          | A        | D            | C/70°    | D        | D        | D        | A        | D             | A        | X        | A        | A         | A         | X         |
| <b>Arsenic Acid</b>               | <b>A</b>      | <b>A</b>   | <b>A</b> | <b>A</b>     | <b>D</b> | <b>B</b> | <b>C</b> | <b>A</b> | <b>A</b> | <b>A</b>      | <b>D</b> | <b>A</b> | <b>D</b> | <b>D</b>  | <b>A</b>  | <b>B</b>  |
| Arsenic Trichloride               | B             | B          | A        | A            | D        | A        | X        | D        | A        | X             | D        | X        | D        | D         | D         | B         |
| Ascorbic Acid                     | X             | X          | A        | X            | X        | A        | X        | X        | X        | X             | X        | X        | A        | D         | A         | X         |
| Askarel                           | C             | D          | A        | B            | D        | D        | D        | A        | X        | X             | X        | X        | X        | X         | A         | X         |
| Asphalt                           | B             | B          | A        | B            | (B)      | C        | B        | D        | A        | A             | B        | A        | A        | B         | A         | X         |
| Asphalt Emulsion                  | B             | B          | A        | B            | B        | B        | B        | D        | A        | X             | X        | A        | B        | A         | A         | A         |
| <b>Asphalt Topping</b>            | <b>B</b>      | <b>B</b>   | <b>A</b> | <b>B</b>     | <b>B</b> | <b>B</b> | <b>B</b> | <b>D</b> | <b>A</b> | <b>D</b>      | <b>D</b> | <b>D</b> | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| ASTM Oil, NO. 1                   | C             | C          | A        | A            | A        | B        | B        | D        | A        | X             | A        | X        | A        | A         | A         | A         |
| No.2                              | X             | C          | A        | A            | A        | B        | D        | D        | A        | X             | A        | X        | A        | A         | A         | A         |
| No.3                              | C             | C          | A        | A            | A        | C        | D        | D        | A        | X             | A        | X        | A        | A         | A         | A         |
| No.4                              | X             | X          | A        | B            | D        | D        | D        | D        | A        | X             | A        | X        | A        | A         | A         | A         |
| B                                 | B             | C          | A        | D            | A        | D        | D        | D        | A        | X             | X        | X        | A        | A         | A         | A         |
| <b>C</b>                          | <b>C</b>      | <b>D</b>   | <b>A</b> | <b>B</b>     | <b>A</b> | <b>D</b> | <b>D</b> | <b>D</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b> | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| ASTM Reference Fuel A             | B             | B          | A        | A            | A        | B        | D        | D        | A        | X             | X        | X        | A        | A         | A         | A         |
| Atlantic Dominion F               | X             | C          | A        | B            | D        | B        | D        | D        | A        | X             | X        | X        | X        | X         | X         | X         |
| Aurex 903R (Mobile)               | X             | X          | A        | A            | D        | B        | A        | D        | A        | X             | X        | X        | X        | X         | X         | X         |
| Automatic Transmission Fluid      | X             | D          | A        | A            | A        | B        | B        | D        | A        | X             | A        | X        | A        | A         | A         | A         |
| Aviation Gasoline, Mil.           | B             | X          | A        | A            | D        | C        | D        | D        | A        | X             | X        | X        | A        | A         | A         | A         |
| <b>Bardol B</b>                   | <b>D</b>      | <b>D</b>   | <b>A</b> | <b>D</b>     | <b>D</b> | <b>X</b> | <b>X</b> | <b>D</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Barium Carbonate                  | A             | A          | A        | A            | X        | A        | B        | A        | A        | A             | A        | A        | D        | A         | A         | A         |
| Barium Chloride                   | A             | A          | A        | A            | X        | A        | A        | A        | A        | A             | A        | A        | D        | D         | B         | A         |
| Barium Cyanide                    | D             | A          | A        | C            | X        | A        | X        | A        | A        | D             | B        | X        | C        | B         | A         | X         |
| Barium Hydroxide (Barium Hydrate) | A             | A          | A        | A            | (B)      | A        | A        | A        | A        | A             | D        | A        | D        | B         | A         | B         |
| Barium Nitrate                    | A             | A          | A        | A            | X        | A        | B        | A        | A        | A             | B        | A        | B        | A         | A         | A         |
| <b>Barium Sulfate</b>             | <b>A</b>      | <b>A</b>   | <b>A</b> | <b>A</b>     | <b>D</b> | <b>A</b> | <b>A</b> | <b>A</b> | <b>A</b> | <b>A</b>      | <b>B</b> | <b>A</b> | <b>D</b> | <b>B</b>  | <b>A</b>  | <b>A</b>  |
| Barium Sulfide                    | A             | A          | A        | A            | X        | A        | A        | A        | A        | A             | A        | A        | D        | D         | B         | A         |
| Bayol D                           | D             | D          | A        | D            | X        | A        | X        | D        | A        | X             | X        | X        | X        | X         | X         | X         |
| Bayol 35                          | D             | D          | A        | D            | X        | A        | X        | D        | A        | X             | X        | X        | X        | X         | X         | X         |
| Beef Extract                      | A             | A          | A        | A            | X        | A        | X        | X        | A        | X             | X        | X        | X        | D         | A         | X         |
| Benzaldehyde                      | D             | D          | A        | D            | B        | D        | D        | A        | D        | D             | A        | A/70°    | A        | A         | A         | A         |
| <b>Benzene (Benzol)</b>           | <b>C</b>      | <b>C</b>   | <b>A</b> | <b>D</b>     | <b>B</b> | <b>D</b> | <b>D</b> | <b>D</b> | <b>B</b> | <b>B</b>      | <b>A</b> | <b>A</b> | <b>B</b> | <b>B</b>  | <b>B</b>  | <b>A</b>  |

# Compatibility Guide

A=Excellent, B=Good, C=Fair to Poor, D=Not recommended

**Bold Headings = TPE** *Italic Headings = TS*

X or Brackets around a rating letter, no data is available, but the ratings are made on the basis of exposure test in similar chemical groups

\*All degrees are in Fahrenheit

| MATERIAL                           | Nitrile (TPE) | Santoprene | Teflon | Nitrile (TS) | Hytrek | Neoprene | Urethane | EPR,EPDM | Viton | Polypropylene | Acetal | PVDF   | Aluminum | Cast Iron | Stainless | Hastelloy |
|------------------------------------|---------------|------------|--------|--------------|--------|----------|----------|----------|-------|---------------|--------|--------|----------|-----------|-----------|-----------|
| Benzene Sulfonic Acid              | D             | A          | A      | D            | X      | B        | D        | D        | B     | B/70°         | C      | A      | D        | D         | B         | B         |
| Benzyl Acetate                     | X             | X          | A      | D            | D      | X        | X        | X        | D     | X             | X      | X      | A        | A         | A         | B         |
| Benzyl Alcohol                     | D             | D          | A      | D            | C      | C        | D        | C        | A     | A             | X      | A      | A        | A         | A         | B         |
| Benzyl Benzoate                    | X             | C          | A      | D            | D      | D        | D        | B        | A     | X             | X      | X      | A        | B         | B         | B         |
| Benzyl Chloride (Chlorotoluene)    | D             | C          | A      | D            | D      | D        | D        | D        | A     | D             | A      | A      | D        | D         | B         | A         |
| Benzoic Acid                       | D             | A          | A      | D            | D      | D        | D        | B        | A     | A             | B      | A      | B        | D         | B         | B         |
| Benzol (Benzene)                   | D             | C          | A      | D            | B      | D        | D        | D        | B     | D             | A      | A/70°  | B        | B         | A         | A         |
| Bichloride of Mercury              | B             | B          | A      | A            | X      | A        | A/70°    | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| Biphenyl (Diphenyl)                | D             | D          | A      | D            | X      | D        | D        | D        | A     | X             | X      | X      | A        | A         | X         | X         |
| Bismuth Subcarbonate               | X             | D          | A      | A            | D      | D        | D        | A        | X     | X             | X      | X      | X        | X         | X         | X         |
| Black Point 77                     | X             | X          | A      | A            | X      | C        | C/70°    | A        | A     | X             | X      | X      | X        | X         | B         | X         |
| Black Sulphate Liquor              | X             | X          | A      | B            | B      | B        | D        | B        | B     | X             | X      | A/175° | C        | B         | A         | B         |
| Blast Furnace Gas                  | X             | A          | A      | D            | B      | D        | D        | D        | A     | X             | D      | X      | X        | X         | X         | X         |
| Bleach Solutions (Water, Chlorine) | D             | B          | A      | D            | C      | D        | D        | A        | B     | B             | D      | A      | D        | D         | B         | B         |
| Blood (Meat Juices - Cold)         | D             | B          | A      | C            | D      | A        | D        | A        | C     | A             | X      | X      | A        | D         | A         | X         |
| Borax (Sodium Borate)              | A             | A          | A      | B            | A      | A        | A        | A        | A     | A             | A      | A      | C        | A         | A         | A         |
| Bordeaux Mixtures                  | B             | A          | A      | A            | B      | A        | D        | A        | A     | X             | X      | X      | D        | C         | A         | A         |
| Boric Acid                         | A             | A          | A      | A            | A/70°  | A        | A/70°    | A        | A     | A             | C      | A      | B        | D         | A         | A         |
| Boron Fuels (HEF)                  | C             | D          | A      | B            | D      | D        | A        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Brake Fluid (Non-Petroleum)        | D             | A          | A      | C            | D      | B        | A        | A        | D     | D             | X      | X      | A        | A         | A         | A         |
| Brine (Calcium Chloride)           | A             | A          | A      | A            | B      | B        | B        | A        | A     | A/70°         | A      | A      | C        | D         | A         | A         |
| Brewery Slop                       | X             | A          | A      | A            | D      | A        | A        | A        | A     | X             | X      | X      | X        | A         | A         | X         |
| Bromine                            | D             | C          | A      | D            | D      | D        | D        | C        | A     | B/72°         | D      | A/150° | D        | D         | D         | A         |
| Bromine- Anhydrous                 | D             | C          | A      | D            | D      | D        | D        | D        | A     | D             | D      | A/150° | D        | D         | D         | A         |
| Bromine- Pentafluoride             | D             | D          | A      | D            | X      | D        | D        | D        | D     | X             | X      | X      | X        | X         | X         | X         |
| Bromine Trifluoride                | D             | C          | A      | D            | D      | D        | D        | D        | D     | D             | D      | X      | D        | D         | B         | X         |
| Bromine Water                      | D             | B          | A      | D            | D      | D        | D        | D        | B     | D             | D      | A      | D        | D         | B         | X         |
| Bromobenzene                       | D             | D          | A      | D            | D      | D        | D        | D        | B     | D             | D      | A      | D        | B         | B         | B         |
| Bromochloromethane                 | X             | X          | A      | D            | X      | D        | D        | B        | C     | X             | X      | X      | D        | B         | B         | B         |
| Bromochloro Trifluoroethane        | X             | D          | A      | D            | X      | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Bromotoluene                       | X             | X          | A      | D            | X      | X        | X        | X        | B     | X             | X      | X      | D        | A         | A         | A         |
| Bronzing Liquid                    | X             | A          | A      | A/70°        | X      | D        | D        | B/70°    | D     | X             | X      | X      | X        | X         | A         | A         |
| Bunker Oil                         | B             | B          | A      | A/70°        | D      | D        | D        | D        | A     | X             | X      | X      | A        | A         | A         | A         |
| Butadiene (Monomer)                | D             | D          | A      | D            | D      | D        | D        | D        | B     | D             | A      | A      | A        | A         | A         | X         |
| Butane (LPG) (Butyl Hydride)       | A             | D          | A      | A            | A      | B        | D        | D        | A     | B             | A      | A      | A        | A         | A         | A         |
| Butanol (Butyl Alcohol)            | B             | B          | A      | A/70°        | B      | A        | D        | A        | A     | B             | A      | A      | B        | B         | A         | A         |
| Butter                             | A             | B          | A      | A            | B      | B        | A        | A        | A     | A             | A      | A      | A        | D         | A         | X         |
| Buttermilk                         | A             | A          | A      | A            | X      | A        | A        | A        | A     | A             | A      | A      | A        | D         | A         | A         |
| Butyl Acetate                      | B             | B          | A      | D            | C      | D        | D        | D        | D     | B/70°         | B      | A      | A        | A         | A         | A         |
| Butyl Acetyl Ricinoleate           | D             | B          | A      | C            | X      | B/70°    | D        | A/70°    | A/70° | X             | X      | X      | A        | A         | A         | A         |
| Butyl Acrylate                     | D             | C          | A      | D            | D      | D        | X        | D        | D     | D             | A      | A/70°  | X        | X         | X         | X         |
| Butyl Alcohol (Butanol)            | A             | A          | A      | A            | B      | A        | D        | B        | A     | A/70°         | X      | A      | A        | B         | A         | A         |
| Butyl Amine (Aminobutane)          | B             | A          | A      | B            | D      | D        | D        | D        | D     | B             | C      | B/70°  | A        | A         | A         | B         |
| Butyl Benzoate                     | X             | C          | A      | D            | X      | D        | D        | A        | A     | X             | A      | X      | B        | B         | B         | B         |
| Butyl Butyrate                     | X             | C          | A      | D            | D      | D        | X        | A        | X     | X             | X      | X      | A        | A         | A         | A         |
| Butyl Carbitol                     | D             | B          | A      | D            | X      | C        | D        | A        | C     | X             | A      | X      | X        | X         | X         | X         |
| Butyl Cellosolve                   | D             | A          | A      | C            | X      | D        | D        | A        | D     | X             | A      | B      | X        | X         | X         | X         |
| Butyl Chloride (Chlorobutane)      | D             | D          | A      | D            | X      | C        | X        | X        | A     | D             | X      | A      | A/70°    | A         | A         | A         |

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|---|---------------|------------|----------|--------------|----------|----------|----------|----------|----------|---------------|----------|--------------|----------|-----------|-----------|-----------|
| Butyl Ether (DiButyl Ether)                       | X             | C          | A        | A            | X        | B        | X        | X        | C        | D             | X        | A/100°       | A        | A         | A         | X         |
| Butyl Oleate                                      | D             | C          | A        | D            | X        | D        | X        | B        | A        | X             | A        | X            | X        | X         | X         | X         |
| Butyl Stearate                                    | C             | C          | A/70°    | B            | X        | D        | B        | D        | A        | X             | A        | A/100°       | B        | B         | B         | B         |
| Butylene (Butene)                                 | C             | C          | A        | A            | B        | C        | C        | C        | A        | B             | A        | A            | A        | X         | A         | X         |
| Butyraldehyde                                     | D             | C          | A        | D            | D        | D        | D        | C        | D        | D             | A        | B            | A        | A         | A         | A         |
| <b>Butyric Acid</b>                               | <b>D</b>      | <b>A</b>   | <b>A</b> | <b>D</b>     | <b>B</b> | <b>D</b> | <b>D</b> | <b>B</b> | <b>B</b> | <b>A</b>      | <b>D</b> | <b>A</b>     | <b>A</b> | <b>D</b>  | <b>B</b>  | <b>A</b>  |
| Butyric Anhydride                                 | X             | A          | A        | C            | X        | X        | X        | X        | X        | X             | X        | X            | A        | A         | A         | A         |
| Butyronitrile                                     | X             | X          | A        | D            | D        | D        | X        | A        | C        | X             | X        | X            | X        | X         | X         | X         |
| Cadmium Sulfate (25% Concentration)               | X             | X          | A        | C            | D        | X        | D        | X        | X        | X             | X        | X            | X        | X         | X         | X         |
| Calcium Acetate (Hydrate)                         | X             | X          | A        | B            | D        | B        | D        | A        | D        | X             | X        | X            | C        | C         | B         | B         |
| Calcium Acid Sulphate                             | X             | X          | A        | C            | X        | C        | X        | B        | D        | X             | X        | X            | X        | X         | X         | X         |
| <b>Calcium Bisulphate</b>                         | <b>A</b>      | <b>X</b>   | <b>A</b> | <b>A</b>     | <b>X</b> | <b>C</b> | <b>A</b> | <b>A</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b>     | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Calcium Bisulfide                                 | A             | D          | A        | A            | B        | A        | A        | D        | A        | A             | A        | A            | C        | D         | B         | A         |
| Calcium Bisulfite                                 | A             | D          | A        | A            | D        | A        | A        | D        | A        | A             | D        | A            | D        | D         | A         | A         |
| Calcium Carbonate (Chalk)                         | A             | A          | A        | A            | X        | A        | D        | A        | A        | A             | A        | A            | C        | B         | A         | A         |
| Calcium Chlorate                                  | A             | A          | A        | A            | X        | A        | B        | A        | A        | A             | X        | A            | B        | B         | B         | B         |
| Calcium Chloride (Brine)                          | A             | A          | A        | A            | A        | A        | A        | A        | A        | A             | D        | A            | C        | C         | C         | A         |
| <b>Calcium Hydrosulfide (Calcium Sulfhydrate)</b> | <b>X</b>      | <b>A</b>   | <b>A</b> | <b>A</b>     | <b>X</b> | <b>A</b> | <b>X</b> | <b>A</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b>     | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Calcium Hydroxide - 10% (Boiling)                 | A             | A          | A        | A            | B        | A        | A        | A        | A        | A             | A/150°   | A            | C        | A         | A         | A         |
| Calcium Hypochlorite                              | C             | A          | A        | C            | B        | D        | D        | A        | A        | A             | A        | A            | C        | D         | A         | A         |
| Calcium Nitrate                                   | C             | A          | A        | B            | X        | B        | D        | B        | A        | A             | D        | A            | B        | C         | B         | B         |
| Calcium Oxide (Unslaked Lime)                     | A             | A          | A        | A            | B        | A        | B        | A        | A        | X             | X        | X            | A        | A         | A         | A         |
| <b>Calcium Silicate</b>                           | <b>X</b>      | <b>X</b>   | <b>A</b> | <b>A</b>     | <b>X</b> | <b>A</b> | <b>X</b> | <b>A</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b>     | <b>A</b> | <b>B</b>  | <b>A</b>  | <b>A</b>  |
| <b>Calcium Sulfate (Gypsum)</b>                   | <b>A</b>      | <b>A</b>   | <b>A</b> | <b>A</b>     | <b>X</b> | <b>D</b> | <b>B</b> | <b>A</b> | <b>A</b> | <b>A</b>      | <b>D</b> | <b>A</b>     | <b>B</b> | <b>A</b>  | <b>A</b>  | <b>B</b>  |
| Calcium Sulfide                                   | A             | A          | A        | A            | X        | B        | A        | A        | A        | A/120°        | X        | A            | A        | B         | B         | A         |
| Calcium Sulfite                                   | B             | A          | A        | A            | X        | A        | A        | A        | A        | X             | X        | X            | B        | B         | A         | X         |
| Calcium Thiosulfate                               | C             | A          | A        | B            | D        | A        | A        | A        | A        | X             | X        | X            | X        | X         | X         | X         |
| Calgon  | A             | A          | A        | A            | D        | A        | D        | A        | A        | A             | A        | X            | X        | D         | A         | X         |
| Cane Juice  | B             | A          | A        | A            | X        | A        | D        | A        | A        | B/72°         | A        | B            | B        | A         | A         | X         |
| <b>Cane Sugar Liquors</b>                         | <b>A</b>      | <b>A</b>   | <b>A</b> | <b>A</b>     | <b>B</b> | <b>A</b> | <b>D</b> | <b>A</b> | <b>A</b> | <b>A</b>      | <b>X</b> | <b>A</b>     | <b>A</b> | <b>B</b>  | <b>A</b>  | <b>X</b>  |
| Capryl Alcohol (Octanol)                          | B             | A          | A        | A            | X        | D        | D        | A        | B        | X             | X        | X            | A        | A         | A         | A         |
| Caprylic Acid (Octanoic acid)                     | C             | A          | A        | C            | X        | X        | X        | A        | A        | X             | X        | A            | A        | X         | A         | A         |
| Caproic Aldehyde                                  | X             | X          | A        | D            | X        | X        | X        | X        | D        | X             | X        | X            | X        | X         | X         | X         |
| Carbamate   | D             | A          | A        | C            | X        | B        | D        | B        | A        | X             | X        | X            | X        | X         | X         | X         |
| Carbitol  | C             | B          | A        | B            | X        | B        | D        | B        | A        | C             | X        | A            | B        | B         | B         | X         |
| <b>Carbolic Acid (Phenol)</b>                     | <b>D</b>      | <b>A</b>   | <b>A</b> | <b>D</b>     | <b>D</b> | <b>C</b> | <b>C</b> | <b>C</b> | <b>A</b> | <b>B</b>      | <b>D</b> | <b>A/70°</b> | <b>B</b> | <b>D</b>  | <b>A</b>  | <b>A</b>  |
| Carbon Bisulfide                                  | D             | D          | A        | D            | B        | D        | C        | D        | A        | D             | B        | A            | A        | B         | B         | B         |
| Carbon Dioxide                                    | B             | A          | A        | A            | C        | A        | C        | A        | B        | A             | A        | A            | A        | D         | A         | A         |
| Carbon Disulfide                                  | D             | D          | A        | D            | C        | D        | C        | D        | A        | D             | B        | A/70°        | A        | B         | B         | B         |
| Carbon Monoxide                                   | A             | A          | A        | A            | A        | B        | A        | C        | A        | A             | B        | A            | A        | A         | A         | A         |
| Carbon Tetrachloride - Pure                       | D             | D          | A        | C            | D        | D        | A        | D        | A        | B/70°         | A        | A            | D        | C         | A         | A         |
| <b>Carbonated Beverages</b>                       | <b>A</b>      | <b>A</b>   | <b>A</b> | <b>A</b>     | <b>X</b> | <b>B</b> | <b>A</b> | <b>A</b> | <b>A</b> | <b>A</b>      | <b>X</b> | <b>A</b>     | <b>C</b> | <b>D</b>  | <b>A</b>  | <b>A</b>  |
| Carbonic Acid                                     | B             | A          | A        | A            | C        | A        | C        | A        | A        | A             | A        | A            | D        | B         | A         | X         |
| Casein  | X             | A          | A        | A            | X        | A        | X        | A        | A        | X             | X        | X            | B        | X         | B         | B         |
| Casing Head Gas                                   | X             | X          | A        | A            | X        | A        | X        | X        | X        | X             | X        | X            | X        | X         | X         | X         |
| Castor Oil  | B             | B          | A        | A            | C        | A        | A        | B        | A        | X             | X        | X            | A        | B         | A         | A         |
| Catsup (Ketchup)                                  | A             | A          | A        | A            | X        | D        | D        | X        | A        | A             | B        | X            | D        | D         | A         | A         |
| <b>Cellosolve (Glycol Ethers)</b>                 | <b>D</b>      | <b>C</b>   | <b>A</b> | <b>D</b>     | <b>D</b> | <b>D</b> | <b>D</b> | <b>B</b> | <b>D</b> | <b>A</b>      | <b>A</b> | <b>A</b>     | <b>B</b> | <b>B</b>  | <b>B</b>  | <b>A</b>  |

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X or Brackets around a rating letter, no data is available, but the ratings are made on the basis of exposure test in similar chemical groups

\*All degrees are in Fahrenheit

| MATERIAL                             | Nitrile (TPE) | Santoprene   | Teflon   | Nitrile (TS) | Hytrek       | Neoprene | Urethane     | EPR,EPDM | Viton    | Polypropylene | Acetal   | PVDF     | Aluminum | Cast Iron | Stainless | Hastelloy |
|--------------------------------------|---------------|--------------|----------|--------------|--------------|----------|--------------|----------|----------|---------------|----------|----------|----------|-----------|-----------|-----------|
| Cellosolve, Acetate                  | D             | A            | A        | D            | D            | D        | D            | B        | D        | A             | A        | A/120°   | B        | B         | A         | A         |
| Cellosolve, Butyl                    | D             | C            | A        | D            | D            | D        | D            | B        | D        | X             | A        | B        | X        | X         | X         | X         |
| Cellugard                            | B             | B            | A        | A            | X            | A        | D            | A        | B        | X             | X        | X        | X        | X         | X         | X         |
| Cellultherm 2505A                    | C             | D            | A        | B            | D            | D        | D            | D        | A        | X             | X        | X        | X        | X         | X         | X         |
| Cetane (Hexadecane)                  | B             | D            | A        | A            | D            | B        | D            | D        | A        | X             | X        | X        | X        | X         | X         | X         |
| <b>China Wood Oil(Tung Oil)</b>      | <b>B</b>      | <b>B</b>     | <b>A</b> | <b>A</b>     | <b>B</b>     | <b>A</b> | <b>C</b>     | <b>D</b> | <b>A</b> | <b>A</b>      | <b>A</b> | <b>A</b> | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Chloroacetaldehyde                   | X             | X            | A        | D            | X            | D        | D            | A        | D        | X             | X        | X        | X        | X         | X         | X         |
| Chlorate of Lime                     | D             | D            | A        | C            | D            | D        | D            | A        | A        | X             | X        | X        | X        | X         | X         | X         |
| Chlorbenzol (Conc. Pure)             | D             | D            | A        | D            | X            | D        | X            | D        | D        | X             | X        | X        | X        | X         | X         | X         |
| Chlorextol                           | X             | X            | A        | B            | X            | B        | D            | D        | A        | X             | X        | X        | X        | X         | X         | X         |
| Chlorinated Lime - 35% (Bleach)      | C             | A            | A        | C            | C            | D        | D            | A        | A        | B             | D        | A        | D        | D         | A         | A         |
| <b>Chlorinated Water - Saturated</b> | <b>D</b>      | <b>D</b>     | <b>A</b> | <b>C</b>     | <b>D</b>     | <b>C</b> | <b>D</b>     | <b>D</b> | <b>A</b> | <b>B</b>      | <b>D</b> | <b>A</b> | <b>C</b> | <b>X</b>  | <b>B</b>  | <b>A</b>  |
| Chlorine, Dry                        | D             | C            | A        | D            | D            | D        | D            | D        | A/70°    | B             | D        | A        | D        | D         | D         | A         |
| Chlorine, Wet                        | D             | C            | A        | D            | D            | D        | D            | A        | A        | D             | D        | A        | D        | B         | B         | A         |
| Chlorine, Anhydrous Liquid           | D             | D            | A        | D            | D            | D        | D            | A        | A        | D             | D        | A        | D        | D         | D         | A         |
| Chlorine Dioxide                     | D             | D            | A        | D            | D            | D        | D            | C        | B        | D             | X        | A        | D        | D         | D         | A         |
| Chlorine Trifluoride                 | D             | D            | A        | D            | X            | D        | D            | D        | D        | D             | X        | X        | D        | D         | A         | X         |
| <b>Chloroacetic Acid</b>             | <b>C</b>      | <b>D</b>     | <b>A</b> | <b>D</b>     | <b>X</b>     | <b>D</b> | <b>D</b>     | <b>B</b> | <b>D</b> | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Chloroacetone                        | D             | C            | A        | D            | D            | C        | D            | D        | B        | D             | B        | X        | D        | B         | B         | B         |
| Chlorobenzene                        | C             | C            | A        | D            | D            | D        | D            | D        | A        | B             | A        | A/70°    | D        | B/70°     | B         | A         |
| Chlorobromo Methane                  | D             | D            | A        | D            | D            | D        | D            | B        | A        | D             | B        | X        | D        | B         | B         | X         |
| Chlorobutadiene                      | D             | C            | A        | D            | D            | D        | D            | D        | A        | D             | X        | X        | D        | B         | A         | B         |
| Chlorodane                           | D             | C            | A        | D            | D            | D        | D            | D        | A        | X             | X        | X        | X        | X         | X         | X         |
| <b>Chlorododecane</b>                | <b>D</b>      | <b>D</b>     | <b>A</b> | <b>D</b>     | <b>D</b>     | <b>D</b> | <b>D</b>     | <b>D</b> | <b>A</b> | <b>D</b>      | <b>X</b> | <b>X</b> | <b>D</b> | <b>D</b>  | <b>X</b>  | <b>X</b>  |
| Chloroform                           | C             | C            | A        | D            | C            | D        | D            | D        | A        | D             | A        | A        | D        | D         | A         | B         |
| 0 - Chloronaphthalene                | D             | D            | A        | D            | D            | D        | D            | A        | D        | D             | X        | A        | D        | B         | B         | B         |
| 1 - Chlorol 1 Nitro Ethane           | D             | C            | A        | D            | D            | D        | D            | D        | D        | D             | X        | X        | D        | X         | X         | X         |
| Chlorosulfonic Acid (Dry)            | C             | C            | A        | D            | C            | D        | D            | C        | C        | C             | D        | C        | D        | D         | D         | B         |
| Chlorosulfonic Acid (Wet)            | D             | D            | A        | D            | D            | D        | D            | D        | D        | C             | D        | C        | D        | D         | D         | B         |
| <b>Chlorotoluene</b>                 | <b>D</b>      | <b>C</b>     | <b>A</b> | <b>D</b>     | <b>D</b>     | <b>D</b> | <b>D</b>     | <b>D</b> | <b>A</b> | <b>D</b>      | <b>A</b> | <b>X</b> | <b>D</b> | <b>B</b>  | <b>B</b>  | <b>A</b>  |
| 0 - Chlorphenol                      | C             | C            | A        | D            | X            | D        | D            | D        | B        | X             | B        | A        | C        | C         | A         | A         |
| Chromic Acid - 5%                    | D             | A            | A        | D            | D            | D        | D            | A        | A        | A/70°         | D        | A        | C        | D         | A         | A         |
| Chromic Acid - 50%                   | D             | A            | A        | D            | D            | D        | D            | C        | A        | B/140°        | D        | A        | C        | D         | B         | A         |
| Cider (Apple Juice)                  | B             | A            | A/122°   | A            | D            | A        | D            | A        | A        | X             | A        | X        | B        | D         | A         | A         |
| Cinnamon Oil                         | X             | C            | A        | X            | X            | C        | X            | X        | X        | X             | X        | X        | X        | D         | A         | X         |
| <b>Citric Acid - 5% Solution</b>     | <b>A</b>      | <b>A/70°</b> | <b>A</b> | <b>A</b>     | <b>B/70°</b> | <b>A</b> | <b>A/70°</b> | <b>A</b> | <b>A</b> | <b>A</b>      | <b>C</b> | <b>A</b> | <b>C</b> | <b>D</b>  | <b>A</b>  | <b>A</b>  |
| Citric Oils                          | B             | C            | A        | A            | X            | D        | X            | B        | A        | A             | B        | X        | C        | D         | A         | X         |
| Citrus Pectin Liquor                 | B             | X            | A        | A            | B            | A        | C            | X        | C        | X             | X        | X        | X        | X         | A         | X         |
| Clove Oil                            | X             | C            | A        | C            | X            | X        | X            | X        | X        | X             | X        | X        | X        | D         | A         | X         |
| Coal Gas                             | X             | X            | A        | D            | B            | A        | B            | A        | A        | X             | X        | X        | X        | X         | X         | X         |
| Coal Tars                            | D             | D            | A        | C            | D            | C        | D            | C        | A        | C             | D        | X        | X        | X         | X         | A         |
| <b>Cobalt Chloride</b>               | <b>A</b>      | <b>A</b>     | <b>A</b> | <b>A</b>     | <b>X</b>     | <b>A</b> | <b>D</b>     | <b>C</b> | <b>A</b> | <b>A</b>      | <b>X</b> | <b>X</b> | <b>D</b> | <b>D</b>  | <b>X</b>  | <b>X</b>  |
| Coca Cola Syrup                      | B             | A            | A        | A            | X            | B        | B            | A        | B        | X             | X        | X        | X        | X         | X         | X         |
| Coconut Oil (Coconut Butter)         | B             | B            | A        | A            | X            | C/140°   | C            | B        | A        | X             | X        | X        | B        | A         | A         | X         |
| Cod Liver Oil (Fish Oil)             | X             | C            | A        | A/70°        | X            | B/70°    | A            | A        | A        | X             | X        | X        | A        | D         | A         | X         |
| Coffee                               | A             | A            | A        | A            | X            | A        | D            | A        | A        | A             | A        | X        | A        | X         | A         | A         |
| Coke Oven Gas                        | D             | B            | A        | C            | X            | C        | D            | D        | A        | X             | X        | A        | X        | X         | X         | X         |
| <b>Coliche Liquors</b>               | <b>B</b>      | <b>B</b>     | <b>A</b> | <b>B</b>     | <b>X</b>     | <b>A</b> | <b>X</b>     | <b>B</b> | <b>X</b> | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |

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|--------------------------------|---------------|------------|--------|--------------|--------|----------|----------|----------|-------|---------------|--------|--------|----------|-----------|-----------|-----------|
| Convelex 10                    | D             | D          | A      | D            | D      | D        | D        | X        | A     | X             | X      | X      | X        | X         | X         | X         |
| Coolanol (Monsanto)            | B             | D          | X      | A            | X      | B        | D        | D        | A     | X             | A      | A      | D        | D         | C         | B         |
| Copper Acetate                 | X             | A          | A      | B            | D      | B        | D        | A        | D     | X             | A      | A      | D        | D         | C         | B         |
| Copper Chloride - 1%           | A             | A          | A      | A            | A      | A        | D        | A        | A     | A             | A      | A      | D        | D         | D         | B         |
| Copper Cyanide                 | A             | A          | A      | A            | A      | A        | A        | A        | A     | A             | A      | A      | D        | D         | A         | A         |
| Copper Fluoborate              | X             | A          | A      | B            | A      | A        | A        | X        | A     | X             | B      | X      | D        | D         | D         | B         |
| Copper Nitrate                 | B             | A          | A      | A/140°       | A      | A/140°   | B/70°    | A        | A     | A             | A      | A      | D        | D         | A         | A         |
| Copper Sulfate - 5% Solution   | A             | A          | A      | A            | A      | A        | A        | A        | A     | A             | D      | A      | D        | D         | A         | A         |
| Corn Oil                       | B             | D          | A      | A            | A      | C        | A        | D        | A     | A             | X      | A      | B        | C         | B         | X         |
| Cottonseed Oil                 | B             | B          | A      | A            | A/70°  | C        | A/70°    | A/70°    | A     | A             | B      | A      | A        | C         | A         | X         |
| Creosols                       | D             | C          | A      | D            | X      | D        | D        | D        | A     | D             | B      | A/150° | B        | C         | A         | B         |
| Creosote, Coal Tar             | D             | D          | A      | B            | D      | D        | D        | D        | A     | D             | D      | X      | B        | B         | B         | B         |
| Creosote, Wood                 | D             | D          | A      | A            | D      | C        | C        | D        | A     | D             | D      | X      | X        | X         | B         | X         |
| Cresylic Acid (Cresol)         | D             | B          | A      | D            | D      | D        | D        | D        | A     | C             | D      | A/150° | C        | A         | A         | B         |
| Crotonaldehyde                 | X             | B          | A      | D            | X      | D        | D        | A        | D     | X             | X      | X      | A        | A         | A         | A         |
| Crude Oil                      | C             | C          | A      | B            | B      | B        | D        | D        | A     | B/150°        | D      | A/120° | A        | A         | A         | B         |
| Cumene (Isopropylbenzene)      | D             | D          | A      | D            | X      | D        | D        | D        | A     | X             | X      | X      | B        | B         | B         | B         |
| Cutting Oil (Water Soluble)    | C             | D          | A      | C            | X      | D        | A        | D        | A     | X             | X      | X      | A        | A         | A         | A         |
| Cutting Oil (Sulfur Base)      | B             | D          | A      | A            | X      | C        | A        | D        | A     | X             | X      | X      | A        | A         | A         | A         |
| Cyclohexane                    | A             | C          | A      | A            | A      | D        | B        | D        | A     | C/70°         | A      | A      | A        | B         | A         | B         |
| Cyclohexanol                   | C             | D          | A      | B            | X      | A        | B        | C        | A     | B/70°         | A      | A/150° | C        | B         | B         | A         |
| Cyclohexanone                  | D             | D          | A      | D            | D      | D        | D        | C        | D     | D             | A      | B/70°  | B        | B         | B         | B         |
| Cyanoic Acid                   | D             | B          | A      | C            | X      | D        | D        | A        | D     | X             | D      | X      | X        | D         | A         | X         |
| P-Cymene                       | D             | B          | A      | D            | X      | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Decalin                        | D             | C          | A      | D            | X      | D        | D        | D        | A     | B/120°        | X      | A/175° | X        | X         | X         | X         |
| Decanal                        | X             | D          | A      | D            | X      | D        | X        | D        | D     | X             | X      | X      | X        | X         | X         | X         |
| Decane                         | A             | B          | A      | B            | X      | D        | B        | D        | A     | A/70°         | X      | A      | X        | X         | X         | X         |
| Decyl Alcohol (Decanol)        | X             | X          | A      | B            | X      | D        | D        | X        | B     | X             | X      | X      | X        | X         | X         | X         |
| De-Ionized Water               | A             | A          | A      | A            | A      | A        | X        | A        | A     | A             | X      | A      | A        | C         | A         | A         |
| Degreasing Fluid (Chlorinated) | D             | D          | A      | D            | X      | D        | A        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Denatured Alcohol              | A             | B          | A      | A            | X      | A        | D        | A        | B     | A             | A      | A      | A        | A         | A         | A         |
| Detergent Solutions            | B             | B          | A      | A            | B      | B        | A        | A        | A     | A             | A      | A      | A        | A         | A         | X         |
| Developing Fluids (Photo)      | X             | A          | A      | A            | D      | A        | D        | B        | A     | X             | A      | X      | X        | D         | A         | A         |
| Dextrose                       | A             | A          | A      | A            | B/140° | B        | A        | A        | A     | A             | X      | A      | A        | D         | A         | A         |
| Dextron                        | C             | D          | A      | A            | X      | B        | B        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Diacetone Alcohol (Diacetol)   | D             | B          | A      | D            | C      | D        | D        | A        | D     | B             | A      | A/70°  | A        | A         | A         | A         |
| Diamylamine                    | X             | B          | A      | B            | X      | D        | D        | A        | D     | X             | X      | X      | X        | X         | X         | X         |
| Diazinon                       | D             | D          | A      | C            | D      | C        | D        | D        | B     | X             | X      | X      | X        | X         | X         | X         |
| Dibenzyl Ether                 | X             | C          | A      | D            | X      | D        | B        | C        | C     | X             | X      | C      | B        | B         | B         | B         |
| Dibenzyl Sebacate              | D             | C          | A      | D            | X      | D        | B        | B        | B     | X             | X      | X      | X        | X         | X         | X         |
| Dibromoethyl Benzene           | D             | C          | A      | D            | X      | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Dibutyl Amine                  | D             | C          | A      | C            | X      | D        | D        | D        | B     | D             | X      | B      | X        | X         | X         | X         |
| Dibutyl Ether                  | D             | B          | A      | D            | X      | D        | D        | C        | C     | X             | X      | X      | X        | X         | X         | X         |
| Dibutyl Phthalate              | B             | B          | A      | D            | A      | D        | C        | A        | B     | B             | X      | D      | A        | A         | A         | A         |
| Dibutyl Sebacate               | D             | B          | A      | D            | A      | D        | D        | B        | B     | B/72          | X      | D      | X        | A         | A         | X         |
| Dichloroacetic Acid            | X             | B          | A      | D            | X      | D        | X        | C        | D     | X             | X      | X      | X        | X         | X         | X         |
| Dichlorethane                  | D             | D          | A      | D            | D      | D        | D        | D        | B     | A             | A      | A/70°  | X        | D         | A         | B         |
| P-Dichlorobenzene              | D             | D          | A      | D            | D      | D        | D        | D        | A     | B             | B      | A/150° | D        | B         | B         | A         |

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|-----------------------------------|---------------|------------|----------|--------------|----------|----------|----------|----------|----------|---------------|----------|---------------|----------|-----------|-----------|-----------|
| Dichlorobutane                    | X             | X          | A        | B            | X        | D        | D        | D        | A        | X             | X        | X             | D        | B         | B         | X         |
| Dichloroethyl Ether               | X             | X          | A        | D            | X        | X        | X        | X        | X        | X             | X        | X             | B        | X         | X         | X         |
| Dichloro Isopropyl Ether          | D             | D          | A        | D            | D        | D        | B        | C        | C        | D             | X        | X             | D        | X         | X         | X         |
| Dichloropentane                   | D             | D          | A        | D            | X        | D        | D        | D        | A        | X             | X        | X             | X        | X         | X         | X         |
| Dicyclohexylamine                 | D             | B          | A        | D            | X        | D        | D        | D        | D        | X             | X        | X             | X        | X         | X         | X         |
| <b>Diesel Oil (Fuel ASTM #2)</b>  | <b>B</b>      | <b>D</b>   | <b>A</b> | <b>A</b>     | <b>B</b> | <b>D</b> | <b>B</b> | <b>D</b> | <b>A</b> | <b>B/70°</b>  | <b>A</b> | <b>A</b>      | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Di- Ester Lubricant Mil-L-7808    | C             | D          | A        | B            | X        | D        | D        | D        | A        | X             | X        | X             | X        | X         | X         | X         |
| Di-Ester Synthetic Lubricants     | D             | D          | A        | D            | D        | D        | D        | D        | A        | X             | X        | X             | A        | A         | A         | A         |
| Diethanol Amine                   | D             | X          | A        | D            | D        | D        | D        | A        | D        | A             | X        | X             | A        | A         | A         | A         |
| Diethyl Amine                     | D             | C          | A        | C            | X        | B        | C        | B        | D        | A             | X        | A/70°         | B        | D         | B         | X         |
| Diethyl Aniline                   | D             | B          | A        | D            | X        | D        | D        | B        | C        | A             | X        | A             | X        | X         | X         | X         |
| <b>Diethyl Benzene</b>            | <b>D</b>      | <b>C</b>   | <b>A</b> | <b>D</b>     | <b>X</b> | <b>D</b> | <b>D</b> | <b>D</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b>      | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Diethyl Carbonate                 | D             | D          | A        | D            | X        | D        | D        | D        | A        | X             | X        | X             | X        | X         | X         | X         |
| Diethyl Ether                     | D             | B          | A        | D            | C        | D        | D        | D        | D        | D             | A        | A/70°         | B        | B         | B         | B         |
| Diethyl Phthalate (Dep)           | B             | A          | A        | D            | A        | X        | X        | X        | C        | X             | X        | X             | A        | A         | A         | A         |
| Diethyl Sebacate                  | B             | B          | A        | D            | A        | D        | D        | B        | A        | A/120°        | X        | A/120°        | A        | A         | A         | A         |
| Diethyl Sulfate                   | D             | B          | A        | D            | X        | A        | D        | A        | D        | X             | X        | X             | X        | X         | X         | X         |
| <b>Diethylene Ether (Dioxane)</b> | <b>D</b>      | <b>D</b>   | <b>A</b> | <b>D</b>     | <b>X</b> | <b>X</b> | <b>X</b> | <b>D</b> | <b>X</b> | <b>X</b>      | <b>X</b> | <b>X</b>      | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>X</b>  |
| Diethylene Glycol                 | A             | A          | A        | A            | A        | A        | D        | A        | A        | A             | D        | X             | A        | A         | A         | A         |
| Diethylene Triamine               | D             | B          | A        | D            | X        | D        | D        | A        | D        | X             | X        | X             | A        | A         | A         | A         |
| Difluorodibromomethane            | D             | B          | A        | D            | D        | D        | D        | B        | X        | X             | X        | X             | X        | X         | X         | X         |
| Diisobutyl Ketone                 | D             | B          | A        | D            | X        | D        | D        | A        | D        | X             | X        | X             | A        | A         | A         | A         |
| Diisobutylene                     | C             | C          | A        | B            | D        | C        | D        | D        | A        | A/120°        | A        | A             | B        | B         | B         | X         |
| <b>Diisodecyl Adipate (D10A)</b>  | <b>X</b>      | <b>X</b>   | <b>A</b> | <b>D</b>     | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b> | <b>C</b> | <b>X</b>      | <b>X</b> | <b>X</b>      | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Diisodecyl Phthalate (D10P)       | X             | X          | A        | D            | X        | D        | X        | A        | C        | X             | X        | X             | X        | X         | X         | X         |
| Diisooctyl Adipate (D10A)         | X             | X          | A        | D            | X        | X        | X        | C        | C        | X             | X        | X             | A        | A         | A         | A         |
| Diisooctyl Phthalate (D10P)       | D             | C          | A        | D            | X        | X        | X        | B        | C        | X             | X        | X             | X        | X         | X         | X         |
| Diisooctyl Sebacate               | D             | D          | A        | C            | X        | D        | D        | C        | B        | X             | X        | X             | X        | X         | X         | X         |
| Diisopropyl Amine                 | C             | X          | A        | B            | X        | X        | X        | X        | X        | X             | X        | X             | X        | X         | X         | X         |
| <b>Diisopropyl Benzene</b>        | <b>D</b>      | <b>C</b>   | <b>A</b> | <b>D</b>     | <b>D</b> | <b>D</b> | <b>D</b> | <b>D</b> | <b>A</b> | <b>X</b>      | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Diisopropyl Ketone                | D             | C          | A        | D            | X        | D        | D        | A        | D        | X             | A        | A             | X        | X         | A         | X         |
| Dimethylaniline                   | D             | B          | A        | D            | X        | D        | D        | B        | C        | A             | D        | A/70°         | A        | X         | X         | B         |
| Diemethyl Formamide               | C             | A          | A        | C            | B        | D        | D        | B        | D        | A/120°        | C        | D             | A        | A         | A         | A         |
| Diemethyl Phthalate               | D             | A          | A        | D            | A        | D        | D        | B        | A        | A             | X        | A/70°         | A        | A         | A         | A         |
| Dipentene                         | C             | C          | A        | A            | X        | D        | D        | D        | A        | X             | X        | X             | A        | A         | A         | A         |
| <b>Diphenyl</b>                   | <b>D</b>      | <b>C</b>   | <b>A</b> | <b>D</b>     | <b>X</b> | <b>D</b> | <b>D</b> | <b>D</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>A/120°</b> | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Diphenyl Oxides                   | D             | C          | A        | D            | X        | D        | D        | A        | A        | X             | D        | A             | B        | A         | A         | B         |
| Dipropylamine                     | X             | X          | A        | B            | X        | X        | X        | X        | X        | X             | X        | X             | X        | X         | X         | X         |
| Dipropylene Glycol                | A             | A          | A        | A            | X        | X        | X        | X        | A        | A             | X        | A             | X        | X         | X         | X         |
| Dipropyl Ketone (Butyrone)        | D             | X          | A        | D            | D        | X        | X        | X        | D        | X             | X        | X             | X        | X         | X         | X         |
| Dispersing Oil #10                | D             | X          | A        | D            | X        | D        | D        | C        | X        | X             | X        | X             | A        | A         | A         | A         |
| <b>Divinyl Benzene (DVB)</b>      | <b>D</b>      | <b>D</b>   | <b>A</b> | <b>D</b>     | <b>X</b> | <b>D</b> | <b>X</b> | <b>D</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b>      | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Dodecyl Benzene (Alkane)          | D             | X          | A        | D            | X        | X        | X        | X        | A        | X             | X        | X             | A        | A         | A         | X         |
| Dow (Silicones)                   | A             | A          | A        | A            | B        | A        | A        | A        | A        | X             | X        | X             | A        | X         | X         | X         |
| Dowtherm A                        | D             | D          | A        | D            | B        | D        | D        | D        | A        | B             | X        | X             | C        | B         | A         | X         |
| Dowtherm E                        | D             | D          | X        | D            | B        | D        | D        | D        | A        | B             | X        | X             | X        | X         | X         | X         |
| Dry Cleaning Fluid                | D             | D          | A        | C            | X        | D        | D        | D        | A        | D             | X        | A             | A        | A         | A         | X         |
| <b>DTE Light Oil</b>              | <b>B</b>      | <b>D</b>   | <b>B</b> | <b>A</b>     | <b>B</b> | <b>B</b> | <b>D</b> | <b>D</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b>      | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |



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| MATERIAL                                  | Nitrile (TPE) | Santoprene | Teflon   | Nitrile (TS) | Hytre    | Neoprene | Urethane | EPR,EPDM | Viton    | Polypropylene | Acetal   | PVDF         | Aluminum | Cast Iron | Stainless | Hastelloy |
|---|---------------|------------|----------|--------------|----------|----------|----------|----------|----------|---------------|----------|--------------|----------|-----------|-----------|-----------|
| Epichlorohydrin                           | D             | B          | A        | D            | D        | D        | D        | C        | D        | A             | A        | C            | D        | A         | A         | A         |
| Epsom Salts                               | A             | A          | A        | A            | X        | A        | X        | A        | A        | A             | B        | A            | A        | A         | A         | B         |
| Esam-6 Fluid                              | X             | B          | X        | X            | X        | B        | X        | A        | D        | X             | X        | X            | X        | X         | X         | X         |
| Esstic 42, 43                             | A             | D          | X        | A            | D        | B        | B        | D        | A        | X             | X        | X            | X        | X         | X         | X         |
| Ethane                                    | C             | C          | A        | A            | X        | B/70°    | B/70°    | D        | A        | C             | A        | X            | A        | A         | A         | A         |
| <b>Ethanol (Ethyl Alcohol)</b>            | <b>A</b>      | <b>A</b>   | <b>A</b> | <b>A</b>     | <b>A</b> | <b>A</b> | <b>D</b> | <b>A</b> | <b>A</b> | <b>A</b>      | <b>A</b> | <b>A</b>     | <b>B</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Ethanolamine (Aminoethanol)               | B             | A          | A        | B            | X        | B        | C        | B        | D        | B             | D        | C            | B        | B         | A         | B         |
| Ethanol Chloride                          | D             | B          | A        | D            | X        | D        | X        | C        | B        | X             | X        | X            | X        | X         | X         | X         |
| Ethers                                    | D             | C          | A        | D            | X        | D        | D        | C        | D        | C             | A        | A/70°        | A        | C         | A         | B         |
| Ethyl Acetate                             | D             | A          | A        | D            | B        | D        | D        | B        | D        | A             | A/120°   | A            | B        | A         | A         | B         |
| Ethyl Acetoacetate                        | D             | B          | A        | D            | D        | D        | D        | A        | D        | X             | A        | A/70°        | A        | A         | A         | A         |
| <b>Ethyl Acrylate</b>                     | <b>D</b>      | <b>C</b>   | <b>A</b> | <b>D</b>     | <b>X</b> | <b>D</b> | <b>D</b> | <b>B</b> | <b>D</b> | <b>D</b>      | <b>A</b> | <b>C</b>     | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Ethylacrylic Acid                         | D             | C          | A        | D            | X        | B        | D        | B        | D        | X             | X        | X            | X        | X         | X         | X         |
| Ethyl Alcohol (Ethanol)                   | A             | A          | A        | A            | A        | A        | D        | A        | A/70°    | A             | X        | A            | B        | B         | A         | A         |
| Ethyl Aluminium Dichloride                | D             | X          | A        | D            | X        | X        | X        | X        | B        | X             | X        | X            | X        | X         | X         | X         |
| Ethyl Amine (Monoethylamine)              | X             | X          | A        | D            | X        | D        | D        | A        | D        | X             | X        | X            | B        | B         | A         | X         |
| Ethyl Benzene                             | D             | D          | A        | D            | X        | D        | D        | D        | A        | D             | A        | C            | A        | B         | B         | A         |
| <b>Ethyl Benzoate</b>                     | <b>D</b>      | <b>C</b>   | <b>A</b> | <b>D</b>     | <b>X</b> | <b>D</b> | <b>D</b> | <b>D</b> | <b>A</b> | <b>B/70°</b>  | <b>A</b> | <b>X</b>     | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Ethyl Bromide                             | C             | X          | A        | B            | X        | D        | D        | D        | A        | D             | X        | X            | A        | A         | A         | X         |
| Ethyl Butyl Acetate                       | D             | X          | A        | D            | X        | X        | X        | X        | D        | X             | X        | X            | X        | X         | X         | X         |
| Ethyl Butyl Alcohol                       | A             | X          | A        | A            | D        | X        | D        | X        | B        | X             | X        | X            | X        | X         | X         | X         |
| Ethyl Butyl Ketone                        | D             | X          | A        | D            | X        | X        | X        | X        | D        | X             | X        | X            | X        | X         | X         | X         |
| Ethyl Butyraldehyde                       | D             | X          | A        | D            | X        | X        | X        | X        | D        | X             | X        | X            | X        | X         | X         | X         |
| <b>Ethyl Butyrate</b>                     | <b>D</b>      | <b>X</b>   | <b>A</b> | <b>D</b>     | <b>X</b> | <b>D</b> | <b>X</b> | <b>D</b> | <b>C</b> | <b>B/70°</b>  | <b>X</b> | <b>X</b>     | <b>B</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Ethyl Caprylate                           | D             | X          | A        | D            | X        | D        | X        | D        | X        | X             | X        | X            | X        | X         | X         | X         |
| Ethyl Cellosolve                          | C             | B          | A        | D            | X        | D        | D        | B        | D        | X             | A        | X            | X        | X         | X         | X         |
| Ethyl Cellulose                           | B             | A          | A        | B            | B        | B        | B        | B        | D        | X             | A        | X            | B        | A         | B         | B         |
| Ethyl Chloride                            | C             | D          | A        | A            | C        | D        | C        | A/140°   | A        | D             | A        | A            | D        | C         | A         | B         |
| Ethyl Chlorocarbonate                     | D             | A          | A        | D            | D        | D        | D        | D        | A        | X             | A        | X            | D        | A         | X         | X         |
| <b>Ethyl Chloroformate</b>                | <b>D</b>      | <b>C</b>   | <b>A</b> | <b>D</b>     | <b>D</b> | <b>D</b> | <b>D</b> | <b>D</b> | <b>A</b> | <b>D</b>      | <b>A</b> | <b>X</b>     | <b>D</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Ethyl Cyanide (Propionitrile)             | D             | X          | A        | D            | X        | B        | X        | A        | D        | X             | X        | X            | X        | X         | X         | X         |
| Ethylcyclopentane                         | X             | X          | X        | A            | X        | C        | A        | D        | A        | X             | X        | X            | X        | X         | X         | X         |
| Ethyl Ether                               | D             | D          | A        | D            | X        | D        | D        | D        | D        | C/70°         | A/70°    | B/170°       | B        | B         | A         | B         |
| Ethyl Formate                             | D             | B          | A        | D            | D        | B        | X        | B        | A        | X             | A        | X            | C        | A         | B         | B         |
| Ethyl Hexyl Acetate                       | X             | X          | A        | D            | D        | X        | X        | X        | D        | X             | X        | X            | X        | X         | X         | X         |
| <b>Ethyl Hexyl Alcohol (Ethylhexanol)</b> | <b>A</b>      | <b>A</b>   | <b>A</b> | <b>A</b>     | <b>D</b> | <b>A</b> | <b>D</b> | <b>A</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b>     | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Ethyl Iodide                              | X             | X          | A        | D            | X        | D        | X        | C        | B        | X             | X        | X            | X        | X         | X         | X         |
| Ethyl Isobutyrate                         | X             | X          | A        | D            | X        | D        | X        | D        | X        | X             | X        | X            | X        | X         | X         | X         |
| Ethyl Mercaptan                           | D             | C          | A        | D            | X        | D        | A        | D        | B        | X             | X        | X            | B        | A         | B         | B         |
| Ethyl Oxalate                             | D             | B          | A        | D            | D        | D        | A        | A        | B        | X             | X        | X            | A        | X         | X         | X         |
| Ethyl Pentachlorobenzene                  | D             | D          | A        | D            | X        | D        | C        | D        | A        | D             | X        | X            | D        | X         | X         | X         |
| <b>Ethyl Propionate</b>                   | <b>D</b>      | <b>D</b>   | <b>A</b> | <b>D</b>     | <b>D</b> | <b>D</b> | <b>X</b> | <b>D</b> | <b>X</b> | <b>X</b>      | <b>X</b> | <b>X</b>     | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Ethyl Silicate                            | B             | B          | A        | A            | B        | A        | D        | A        | A        | X             | X        | X            | B        | A         | A         | A         |
| Ethyl Sulfate                             | D             | B          | A        | D            | X        | A        | D        | A        | D        | X             | X        | X            | X        | X         | D         | X         |
| Ethylene (Ethene)                         | B             | C          | A        | A            | D        | C        | B        | D        | A        | X             | A        | X            | A        | A         | A         | X         |
| Ethylene Chloride                         | D             | D          | A        | D            | C        | D        | D        | C        | C        | C/70°         | A        | A            | B        | C         | A         | B         |
| Ethylene Chlorohydrin                     | D             | C          | A        | D            | D        | B        | D        | B        | A        | D             | C/70°    | A/70°        | B        | B         | B         | X         |
| <b>Ethylene Diamine</b>                   | <b>B</b>      | <b>A</b>   | <b>A</b> | <b>B</b>     | <b>X</b> | <b>A</b> | <b>D</b> | <b>A</b> | <b>D</b> | <b>A</b>      | <b>A</b> | <b>B/70°</b> | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>C</b>  |

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|-------------------------------|---------------|------------|--------|--------------|--------|----------|----------|----------|--------|---------------|--------|-------|----------|-----------|-----------|-----------|
| Ethylene Dibromide            | D             | D          | A      | D            | X      | D        | D        | D        | A      | B/70°         | X      | A     | D        | B         | A         | B         |
| Ethylene Dichloride           | C             | C          | A      | D            | C      | D        | D        | D        | B      | D             | A      | A     | B        | A         | A         | A         |
| Ethylene Glycol               | A             | A          | A      | A            | A/70°  | A        | B        | A        | A      | A             | B      | A     | B        | B         | A         | A         |
| Ethylene Oxide                | A             | A          | A      | D            | A      | D        | D        | B        | D      | C/125°        | A      | A/70° | D        | C         | A         | X         |
| Ethylene Trichloride          | X             | X          | A      | D            | X      | D        | D        | D        | A      | D             | X      | A     | D        | A         | A         | X         |
| Ethylidene Chloride           | D             | D          | A      | D            | X      | D        | X        | D        | X      | X             | X      | X     | D        | B         | A         | B         |
| Fatty Acids                   | B             | B          | A      | B            | D      | B/70°    | D        | D        | A      | B/140°        | B      | A     | B        | D         | A         | A         |
| Ferric Chloride               | A             | A          | A      | A/150°       | B/140° | A/140°   | A/70°    | A/176°   | A/176° | A             | X      | A     | D        | D         | D         | B         |
| Ferric Hydroxide              | B             | B          | A      | B            | X      | B        | X        | B        | B      | X             | X      | X     | X        | X         | A         | B         |
| Ferric Nitrate                | A             | A          | A      | A            | D      | B        | A/70°    | A        | A      | A             | A      | A     | D        | D         | A         | A         |
| Ferric Sulfate                | A             | A          | A      | A            | A      | A        | A        | A        | A      | A             | B      | A     | D        | D         | A         | A         |
| Ferrous Chloride              | B             | A          | A      | B            | A      | A        | D        | A        | A      | A             | B      | A     | D        | D         | D         | B         |
| Ferrous Sulfate (Copperas)    | A             | A          | A      | B            | A      | A        | A        | A        | A      | A             | B/70°  | A     | D        | D         | A         | B         |
| Fish Oil                      | A             | B          | A      | A            | B      | B        | D        | D        | A      | X             | X      | X     | X        | X         | X         | X         |
| Fluorine (Anhydrous)          | D             | D          | B      | D            | D      | D        | D        | D        | B      | D             | A      | A/70° | D        | D         | A         | B         |
| Fluorboric Acid               | A             | A          | A      | A            | D      | A        | D        | A        | A      | A             | X      | A     | D        | D         | B         | A         |
| Fluorobenzene                 | D             | C          | A      | D            | X      | D        | X        | D        | A      | D             | A      | X     | D        | X         | X         | X         |
| Fluorocarbon Oil              | D             | D          | A      | X            | X      | A        | X        | A        | X      | D             | X      | X     | D        | A         | A         | A         |
| Fluorochloroethylene          | D             | C          | A      | D            | X      | D        | X        | D        | A      | X             | X      | X     | X        | X         | X         | X         |
| Fluorinated Cyclic Ethers     | D             | D          | A      | D            | X      | D        | X        | A        | A      | X             | X      | X     | X        | X         | X         | X         |
| Fluorolube (Fluoro Carbonoil) | X             | X          | A      | A            | D      | A        | X        | A        | B      | D             | X      | X     | A        | A         | A         | A         |
| Fluorosulfonic Acid           | X             | X          | X      | X            | X      | X        | X        | X        | X      | X             | X      | X     | X        | X         | X         | X         |
| Fluosilicic Acid              | A             | A          | A      | A            | B      | A        | B        | B        | A/140° | A             | X      | A     | D        | D         | B         | B         |
| Formaldehyde                  | A             | A/70°      | A      | C            | B      | B        | D        | A        | A      | A             | A      | A     | A        | D         | A         | B         |
| Formamide                     | A             | A          | A      | A            | D      | A        | X        | A        | D      | X             | X      | X     | A        | B         | B         | B         |
| Formic Acid                   | A             | A          | A      | D            | B      | D        | D        | B        | B      | A             | D      | A     | D        | D         | A         | A         |
| Freon 11                      | C             | B          | A      | A            | A      | B        | D        | D        | C      | D             | A      | A     | C        | A         | A         | A         |
| Freon 12                      | C             | D          | A      | A            | A      | A        | A/130°   | B        | B      | B             | A      | A     | A        | A         | A         | A         |
| Freon 13                      | D             | X          | A      | A            | C      | A        | C/70°    | A        | A      | D             | A      | A     | A        | A         | A         | A         |
| Freon 13B1                    | D             | X          | A      | A            | X      | A        | A        | A        | A      | X             | X      | X     | X        | X         | X         | X         |
| Freon 14                      | A             | X          | A      | A            | X      | A        | A/170°   | A        | A      | X             | X      | X     | X        | X         | X         | X         |
| Freon 21                      | D             | X          | A      | D            | X      | D        | X        | D        | D      | D             | A      | A     | D        | X         | X         | X         |
| Freon 22                      | D             | D          | A      | D            | D      | A        | D        | A        | D      | D             | A      | A     | D        | D         | A         | A         |
| Freon 31                      | D             | X          | A      | D            | X      | A        | X        | A        | D      | X             | A      | X     | D        | X         | X         | X         |
| Freon 32                      | D             | X          | A      | A            | X      | A        | X        | A        | D      | X             | A      | X     | D        | X         | X         | X         |
| Freon 112                     | B             | X          | A      | B            | X      | B        | B/70°    | D        | A      | X             | A      | X     | D        | X         | X         | X         |
| Freon 113                     | D             | D          | A      | A            | A      | A        | B        | D        | B      | D             | A      | A     | D        | X         | A         | A         |
| Freon 114                     | B             | X          | A      | A            | A      | A        | A/70°    | D        | A      | D             | A      | A     | C        | X         | A         | X         |
| Freon114B2                    | X             | X          | A      | A            | X      | A        | X        | D        | B      | X             | X      | X     | X        | X         | X         | X         |
| Freon 142b                    | X             | X          | A      | A            | X      | A        | X        | A        | D      | X             | A      | X     | D        | X         | X         | X         |
| Freon 15                      | X             | X          | X      | X            | X      | X        | X        | X        | X      | X             | A      | X     | C        | X         | X         | X         |
| Freon 152a                    | X             | X          | A      | A            | X      | A        | X        | A        | D      | X             | A      | X     | D        | X         | X         | X         |
| Freon 218                     | X             | X          | A      | A            | X      | A        | X        | X        | A      | X             | A      | X     | D        | X         | X         | X         |
| Freon 502                     | X             | X          | A      | B            | D      | A        | X        | A        | B      | X             | A      | X     | D        | X         | X         | X         |
| Freon, BF                     | X             | X          | A      | A            | X      | B        | X        | D        | A      | X             | X      | X     | D        | X         | X         | X         |
| Freon C316                    | X             | X          | A      | A            | X      | A        | X        | A        | A      | X             | A      | X     | D        | X         | X         | X         |
| Freon C318                    | X             | X          | A      | A            | X      | A        | X        | A        | A      | X             | A      | X     | D        | X         | X         | X         |
| Freon K-142B                  | X             | X          | X      | X            | X      | X        | X        | X        | X      | X             | A      | X     | D        | X         | X         | X         |

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X or Brackets around a rating letter, no data is available, but the ratings are made on the basis of exposure test in similar chemical groups

\*All degrees are in Fahrenheit

| MATERIAL                               | Nitrile (TPE) | Santoprene | Teflon | Nitrile (TS) | Hytre | Neoprene | Urethane | EPR,EPDM | Viton | Polypropylene | Acetal | PVDF   | Aluminum | Cast Iron | Stainless | Hastelloy |
|--|---------------|------------|--------|--------------|-------|----------|----------|----------|-------|---------------|--------|--------|----------|-----------|-----------|-----------|
| Freon K-152a                           | X             | X          | X      | X            | X     | X        | X        | X        | X     | X             | A      | X      | D        | X         | X         | X         |
| Freon, MF                              | X             | X          | A      | A            | A     | D        | D        | D        | D     | X             | X      | X      | D        | X         | X         | X         |
| Freon, PCA                             | X             | X          | X      | A            | X     | A        | A        | D        | B/70° | X             | X      | X      | D        | X         | X         | X         |
| Freon, TF                              | X             | D          | A      | A            | A     | A        | B        | D        | B     | X             | A      | B      | D        | A         | A         | A         |
| Freon T-WD602                          | X             | X          | A      | B            | X     | B        | A        | B        | A     | X             | X      | X      | D        | X         | X         | X         |
| Freon TMC                              | X             | X          | A      | B            | A     | B        | B        | B        | A     | X             | X      | X      | D        | X         | X         | X         |
| Freon T-P35                            | X             | X          | A      | A            | X     | A        | A        | A        | A     | X             | X      | X      | D        | X         | X         | X         |
| Freon TA                               | X             | X          | A      | A            | X     | A        | A        | A        | C     | X             | X      | X      | D        | X         | X         | X         |
| Freon TC                               | X             | X          | A      | A            | X     | A        | A        | B        | A     | X             | X      | X      | D        | X         | X         | X         |
| Fuel Oil                               | B             | C          | A      | A            | B     | A        | D        | D        | A     | A             | B      | A      | A        | A         | A         | A         |
| Fumaric Acid (Boletic Acid)            | X             | A          | A      | A            | B     | B        | X        | B        | A     | X             | X      | X      | X        | X         | X         | X         |
| Fuming Sulphuric Acid (20/50% Oleum)   | D             | X          | A      | D            | D     | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Furan (Furfuran)                       | D             | A          | A      | D            | X     | D        | X        | D        | D     | C             | X      | D      | A        | A         | A         | X         |
| Furfural (Ant Oil)                     | D             | A          | A      | D            | B     | C        | D        | A        | D     | D             | B      | B/120° | A        | B         | A         | B         |
| Furfuryl Alcohol                       | D             | C          | A      | D            | B     | D        | D        | B        | D     | X             | X      | B/100° | A        | A         | A         | A         |
| Furyl Carbinol                         | D             | X          | A      | D            | X     | D        | D        | B        | D     | X             | X      | X      | X        | X         | X         | X         |
| Fusel Oil (Grain Oil)                  | X             | X          | A      | A            | X     | B        | C/70°    | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| Gallic Acid                            | D             | B          | A      | B            | D     | B        | D        | B        | A     | A             | X      | A/70°  | A        | D         | B         | B         |
| Gasoline (Aviation)                    | D             | C          | A/170° | A            | A     | D        | C        | D        | A     | D             | A      | A      | X        | X         | X         | X         |
| Gasoline (Leaded)                      | C             | C          | A      | A            | A     | D        | C        | D        | A     | D             | A      | A      | A        | A         | A         | A         |
| Gasoline (Unleaded)                    | C             | C          | A      | D            | X     | D        | D        | D        | A     | D             | A      | A      | A        | A         | A         | A         |
| Gelatin                                | A             | A          | A      | A            | B     | A        | D        | A        | A     | A             | B      | A      | A        | D         | A         | A         |
| Glacial Acetic Acid                    | D             | A          | A      | D            | D     | D        | D        | A        | D     | X             | X      | X      | X        | X         | X         | X         |
| Glauber's Salt                         | X             | X          | A      | A            | B     | A        | A        | B        | A     | X             | X      | X      | X        | X         | X         | X         |
| Glucose (Corn Syrup)                   | A             | A          | A      | A            | B     | A        | A        | A        | A     | A             | A      | A      | A        | B         | A         | A         |
| Glue                                   | D             | A          | A      | A            | A     | A        | A        | A        | A     | A             | B      | A      | B        | A         | A         | A         |
| Glycerine - Glycerol                   | A             | A          | A      | A            | A     | A        | D        | A        | A     | A             | A      | A      | A        | B         | A         | A         |
| Glycolic Acid                          | A             | X          | A      | A            | X     | A        | X        | X        | A     | A             | A      | A/70°  | X        | X         | X         | A         |
| Grape Juice                            | A             | A          | X      | A            | X     | A        | D        | A        | A     | A             | B      | A      | B        | D         | A         | X         |
| Grapefruit Oil                         | X             | A          | A      | A            | X     | D        | X        | X        | A     | X             | X      | X      | X        | D         | A         | X         |
| Grease (Ester Base)                    | C             | B          | A      | C            | X     | X        | X        | X        | X     | A             | A      | A      | A        | A         | A         | A         |
| Grease (Petroleum Base)                | A             | D          | A      | A            | A     | D        | A        | D        | A     | A             | A      | A      | A        | A         | A         | A         |
| Grease (Silicone Base)                 | A             | B          | A      | A            | X     | X        | X        | X        | X     | A             | A      | A      | A        | A         | A         | A         |
| Green Sulfate Liquor                   | B             | A          | A      | B            | D     | B        | A        | A        | A     | A             | X      | X      | B        | C         | A         | B         |
| Halothane                              | D             | X          | X      | D            | X     | D        | D        | X        | A     | X             | X      | X      | X        | X         | X         | X         |
| Halowax Oil                            | D             | D          | A      | D            | X     | D        | X        | D        | A     | X             | X      | X      | D        | X         | X         | X         |
| Hannifin Lube A                        | A             | D          | X      | A            | X     | A        | A        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Heavy Water                            | A             | B          | X      | A            | B     | X        | D        | A        | X     | X             | X      | X      | A        | C         | A         | A         |
| HEF - 2 (High Energy Fuel)             | B             | D          | X      | B/70°        | X     | A        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Helium                                 | A             | A          | A      | A            | X     | A        | A        | A        | A     | A             | A      | X      | A        | A         | A         | X         |
| Heptane                                | B             | C          | A      | A            | B     | A        | B        | D        | A     | B/70°         | A      | A      | A        | A         | A         | A         |
| N-Hexaldehyde                          | D             | C          | A      | D            | D     | A        | B        | A        | D     | X             | X      | X      | A        | A         | A         | X         |
| Hexane                                 | B             | C          | A      | A            | A     | D        | B        | D        | A     | B/70°         | A      | A      | A        | A         | A         | A         |
| Hexanol                                | A             | C          | A      | A            | D     | D        | D        | A        | A     | A/70°         | A/70°  | X      | A        | A         | A         | A         |
| Hexyl Alcohol                          | B             | B          | A      | B            | D     | B        | D        | A        | B     | X             | X      | A      | A        | A         | A         | X         |
| Hexylene Glycol                        | X             | X          | A      | A            | D     | A        | X        | C/70°    | A     | X             | X      | X      | A        | A         | A         | A         |
| Hilo MS #1                             | D             | X          | X      | D            | D     | D        | B        | A        | D     | X             | X      | X      | X        | X         | X         | X         |
| Houghto-Safe 271 (Water & Glycol Base) | X             | A          | A      | A            | B     | B        | D        | A        | B     | X             | X      | X      | X        | X         | X         | X         |

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|--------------------------------------|---------------|------------|--------|--------------|--------|----------|----------|-------------|-------|---------------|--------|--------|----------|-----------|-----------|-----------|
| 620 Water/Glycol                     | B             | A          | A      | A            | A      | B        | B        | A           | B     | X             | X      | X      | X        | X         | X         | X         |
| 1010, Phosphate Ester                | D             | A          | A      | D            | B      | D        | A        | A           | A     | X             | X      | X      | X        | X         | X         | X         |
| 1055, Phosphate Ester                | D             | A          | A      | D            | B      | D        | A        | A           | A     | X             | X      | X      | X        | X         | X         | X         |
| 1120, Phosphate                      | D             | A          | A      | D            | B      | D        | A        | A           | A     | X             | X      | X      | X        | X         | X         | X         |
| 5040 (Water/Oil Emulsion)            | A             | D          | A      | A            | B      | B        | D        | D           | A     | X             | X      | X      | X        | X         | X         | X         |
| <b>Hydraulic Oils (Petroleum)</b>    | A             | D          | A      | A            | A      | B        | X        | D           | A     | D             | B      | X      | A        | A         | A         | A         |
| Hydraulic Oils (Synthetic)           | A             | D          | A      | D            | A      | D        | B        | D           | A     | D             | B      | X      | A        | A         | A         | A         |
| Hydrazine (Diamine)                  | D             | A          | A      | B            | D      | B        | D        | A           | D     | C             | B      | A/120° | A        | D         | A         | A         |
| Hydrobromic Acid                     | D             | B          | A      | D            | X      | D        | X        | A           | X     | B             | D      | A      | D        | D         | D         | A         |
| Hydrochloric Acid 20%                | D             | A          | A      | D            | D      | D        | B        | A           | A     | A             | D      | A      | D        | D         | D         | A         |
| Hydrochloric Acid 37%                | D             | B          | A      | B            | D      | D        | D        | B           | A     | A             | D      | A      | D        | D         | D         | A         |
| <b>Hydrocyanic Acid</b>              | D             | A          | A      | B            | D      | B        | D        | A           | A     | A             | D      | A      | A        | D         | A         | A         |
| Hydrofluoric Acid 20%                | D             | D          | A      | D            | D      | D        | D        | B           | A     | A             | D      | A      | D        | D         | D         | D         |
| Hydrofluoric Acid 50%                | D             | D          | A      | D            | D      | D        | D        | B           | A     | B/70°         | D      | A      | D        | D         | D         | D         |
| Hydrofluoric Acid 75%                | D             | D          | A      | D            | D      | D        | D        | D           | D     | B/70°         | D      | A      | D        | D         | D         | D         |
| Hydrofluoric Acid Concentrated       | D             | D          | A      | D            | D      | D        | D        | D           | D     | D             | D      | A      | D        | D         | D         | D         |
| Hydrofluosilicic Acid                | D             | B          | A      | B            | B      | B        | D        | A           | A     | A             | X      | A      | D        | D         | D         | B         |
| <b>Hydrogen</b>                      | A             | A          | A      | A            | A      | A        | A        | B           | A     | X             | X      | X      | X        | X         | X         | X         |
| Hydrogen Chloride Gas                | B             | B          | A      | D            | X      | B        | X        | A           | A     | A/140°        | X      | A      | D        | A         | A         | A/125°    |
| Hydrogen Cyanide Gas                 | A             | A          | A      | B            | D      | D        | D        | A           | A     | A             | X      | A      | D        | A         | B         | X         |
| Hydrogen Fluoride                    | D             | X          | B/70°  | D            | D      | X        | D        | B/70°       | A     | A/70°         | X      | X      | D        | X         | D         | A         |
| Hydrogen Peroxide                    | C             | A          | A      | B            | D      | D        | C        | C           | A     | A/70°         | D      | A/70°  | A        | D         | A         | A         |
| Hydrogen Sulfide Dry                 | D             | A          | A      | A            | A      | A        | A        | A           | D     | A             | A      | A      | B        | D         | B         | A         |
| <b>Hydrogen Sulfide Wet</b>          | D             | A          | A      | D            | A      | A        | D        | A           | D     | A             | C      | A      | D        | D         | A         | A         |
| Hydrolube-Water/Ethylene Glycol      | A             | A/250°     | A      | A/70°        | B/150° | B/70°    | D        | A/70°       | A/70° | A             | D      | A      | A        | A         | A         | A         |
| Hydroquinone                         | C             | A          | A      | D            | X      | D        | X        | D           | C     | A             | A      | A      | A        | B         | B         | B         |
| Hydne                                | B             | D          | A      | B            | X      | B        | X        | A           | D     | X             | X      | X      | X        | X         | X         | X         |
| Hydroxyacetic Acid                   | D             | A          | A      | D            | X      | D        | D        | A/70°(100%) | D     | X             | C      | X      | D        | B         | B         | X         |
| Hypochlorous Acid                    | D             | A          | A      | D            | X      | D        | D        | B           | A     | A             | D      | A      | D        | D         | D         | A         |
| <b>Hypoid Grease (Parapoid 10-C)</b> | B             | X          | A      | B            | X      | D        | D        | D           | C     | X             | A      | X      | X        | X         | X         | X         |
| Ink (Printers)                       | A             | A          | A      | A            | A      | A        | A        | A           | A     | X             | A      | A      | C        | D         | A         | A         |
| Iodine                               | B             | A          | A      | B            | B      | D        | D        | B           | A     | A             | A      | A/150° | D        | D         | D         | B         |
| Iodine Pentafluoride                 | D             | B          | A      | D            | X      | D        | D        | D           | D     | X             | X      | X      | X        | X         | X         | X         |
| Iodoform                             | B             | B          | A      | X            | X      | B        | D        | B           | A     | X             | X      | A      | B        | A         | B         | D         |
| Isoamyl Acetate                      | D             | X          | A      | D            | X      | D        | D        | B           | D     | X             | X      | X      | A        | A         | A         | A         |
| <b>Isoamyl Alcohol</b>               | X             | X          | A      | A            | X      | A        | C        | A           | A     | X             | X      | X      | X        | X         | X         | X         |
| Isoamyl Butyrate                     | D             | X          | A      | D            | X      | X        | X        | X           | D     | X             | X      | X      | A        | A         | A         | A         |
| Isoamyl Chloride                     | D             | X          | A      | D            | X      | D        | X        | D           | A     | X             | X      | X      | D        | X         | X         | X         |
| Iso Butane                           | X             | X          | A      | A            | X      | D        | A        | D           | A/70° | X             | X      | X      | X        | X         | X         | X         |
| Iso Butyl Acetate                    | D             | X          | A      | D            | X      | D        | X        | C/70°       | D     | X             | X      | X      | A        | A         | A         | A         |
| Isobutyl Alcohol                     | B             | A          | A      | B/80°        | X      | A/80°    | D        | A/160°      | A/75° | A/70°         | A      | A      | B        | C         | A         | A         |
| <b>Isobutyl Amine</b>                | D             | X          | A      | D            | X      | X        | X        | X           | D     | X             | X      | X      | X        | X         | X         | X         |
| Isobutyl Chloride                    | D             | X          | A      | D            | X      | X        | X        | X           | B     | X             | X      | X      | D        | B         | B         | A         |
| Isobutyric Acid                      | D             | X          | A      | D            | X      | B        | X        | A           | X     | X             | X      | X      | A        | X         | X         | X         |
| Iso-Butyl N-Butane                   | D             | X          | A      | D            | D      | X        | D        | X           | B     | X             | X      | X      | X        | X         | X         | X         |
| Isocyanates                          | C             | X          | A      | B            | B      | X        | B        | X           | B     | A             | A      | X      | X        | A         | A         | A         |
| Isododecane                          | A             | X          | A      | A/70°        | X      | B/70°    | B/70°    | D           | A/70° | X             | X      | X      | B        | B         | B         | B         |
| <b>Isoccatane</b>                    | C             | C          | A      | A            | A/158° | B        | A        | A/70°       | A     | A/120°        | X      | A/70°  | A        | A/70°     | A/70°     | A         |

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X or Brackets around a rating letter, no data is available, but the ratings are made on the basis of exposure test in similar chemical groups

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| MATERIAL                             | Nitrile (TPE) | Santoprene | Teflon | Nitrile (TS) | Hytrek | Neoprene | Urethane | EPR,EPDM | Viton  | Polypropylene | Acetal | PVDF  | Aluminum | Cast Iron | Stainless | Hastelloy |
|--------------------------------------|---------------|------------|--------|--------------|--------|----------|----------|----------|--------|---------------|--------|-------|----------|-----------|-----------|-----------|
| Isopentane                           | A             | X          | A      | A            | X      | D        | B        | D        | A      | X             | X      | X     | X        | X         | X         | X         |
| Isophorone (Ketone)                  | D             | B          | A      | D            | X      | D        | D        | A        | D      | X             | X      | X     | A        | A         | A         | A         |
| Isopropanol (Isopropyl Alcohol)      | A             | B          | A      | A/70°        | A/70°  | B/120°   | B        | A/160°   | A/170° | A             | A      | A     | A        | A         | A         | A         |
| Isopropyl Acetate                    | D             | B          | A      | D            | C      | D        | D        | B        | D      | A             | A      | X     | B        | A         | A         | B         |
| Isopropyl Alcohol (Isopropanol)      | A             | B          | A      | A            | A      | B        | D        | A        | A      | A             | A      | A     | A        | A         | A         | A         |
| Isopropyl Amine                      | D             | X          | A      | D            | X      | X        | X        | X        | D      | X             | X      | X     | X        | A         | A         | X         |
| Isopropyl Benzene (Cumene)           | D             | X          | A      | D            | X      | D        | D        | D        | A      | X             | X      | X     | X        | X         | X         | X         |
| Isopropyl Chloride                   | D             | C          | A      | D            | X      | D        | D        | D        | A      | D             | A      | X     | D        | A         | A         | X         |
| Isopropyl Ether                      | B             | C          | A      | B            | X      | D        | B        | D        | D      | B/70°         | A      | X     | A        | X         | A         | A         |
| JP-1                                 | C             | D          | A      | A            | X      | D        | C        | D        | A      | D             | A      | A     | A        | A         | A         | A         |
| JP-2                                 | C             | C          | A      | A            | X      | D        | C        | D        | A      | D             | A      | A     | A        | A         | A         | A         |
| JP-3 (Mil-J-5624)                    | C             | C          | A      | A            | X      | D        | C        | D        | A      | A/70°         | A      | A     | A        | A         | A         | A         |
| JP-4 (Mil-J-5624)                    | A             | D          | A      | A            | A      | D        | C        | D        | A      | A/70°         | A      | A     | A        | A         | A         | A         |
| JP-5 (Mil-J-5624)                    | C             | C          | A      | A            | X      | D        | B        | D        | A      | A/70°         | A      | A     | A        | A         | A         | A         |
| JP-6 (Mil-J-25656)                   | C             | C          | A      | A            | X      | D        | C        | D        | A      | D             | A      | A     | A        | A         | A         | A         |
| JP-X(Mil-F-25604)                    | A             | C          | A      | A            | X      | B        | X        | D        | D      | D             | A      | A     | A        | A         | A         | A         |
| Kel F Liquids                        | X             | X          | A      | A            | X      | X        | X        | A        | B      | X             | X      | X     | X        | X         | X         | X         |
| Kerosene                             | A             | C          | A      | A            | A      | X        | B        | X        | A      | B/72°         | A      | A     | A        | A         | A         | B         |
| Ketones                              | D             | C          | A      | D            | D      | D        | D        | A        | D      | D             | A      | A/70° | B        | X         | A         | A         |
| Keystone #87HX-Grease                | X             | X          | A      | A            | X      | D        | A        | D        | A      | X             | X      | X     | X        | X         | X         | X         |
| Lactam-Amino Acids                   | X             | X          | A      | D            | X      | B        | X        | B        | D      | X             | X      | X     | X        | X         | X         | X         |
| Lacquer Solvents                     | D             | C          | A      | D            | B      | D        | D        | D        | D      | C             | A      | D     | A        | B         | A         | X         |
| Lacquers                             | D             | C          | A      | D            | D      | D        | D        | D        | D      | C             | A      | D     | A        | C         | A         | A         |
| Lactic Acid- 5%Solution              | B             | A          | A      | A            | D      | A        | B        | A        | A      | A             | A      | A/70° | C        | D         | A         | B         |
| Lactol                               | X             | X          | A      | A            | X      | D        | X        | X        | A      | D             | A      | X     | A        | A         | A         | A         |
| Lard Oil (Hot)                       | X             | B          | A      | A            | B      | A        | C        | B        | A      | B             | AA     | A     | A        | A         | A         | A         |
| Latex                                | A             | A          | A      | A            | X      | A        | D        | A        | A      | A             | A      | X     | A        | X         | A         | X         |
| Lauryl Alcohol (N-Dodecanol)         | X             | X          | A      | A            | X      | X        | D        | X        | B      | X             | X      | X     | A        | A         | A         | A         |
| Lavender Oil                         | B             | B          | A      | B            | X      | D        | X        | D        | A      | X             | X      | X     | X        | X         | X         | X         |
| Lead Acetate                         | B             | A          | A      | B            | X      | B        | D        | A        | A      | A             | A      | A     | D        | A         | B         | B         |
| Lead Chloride                        | X             | X          | A      | A            | X      | B        | X        | A        | A      | A             | X      | A     | D        | X         | B         | B         |
| Lead Nitrate                         | A             | X          | A      | A            | X      | A        | X        | A        | A      | A             | X      | A     | D        | B         | B         | B         |
| Lead Sulfamate                       | A             | A          | A      | B            | X      | A        | X        | A        | A      | A             | A      | A     | C        | X         | X         | X         |
| Lehigh X1169                         | X             | X          | A      | A            | X      | B        | A        | D        | A      | X             | X      | X     | X        | X         | X         | X         |
| Lehigh X1170                         | X             | X          | A      | A            | X      | B        | A        | D        | A      | X             | X      | X     | X        | X         | X         | X         |
| Lemon Oil                            | X             | C          | A      | A            | X      | C        | X        | C        | A      | X             | X      | X     | A        | X         | A         | X         |
| Light Grease                         | X             | X          | A      | A            | X      | D        | A        | D        | A      | X             | A      | X     | X        | X         | X         | X         |
| Ligroin (Petroleum Ether or Benzine) | B             | B          | A      | A            | X      | B        | C        | D        | A      | B/175°        | B      | A     | X        | A         | A         | X         |
| Lignin Liquor                        | X             | X          | A      | A            | X      | A        | D        | D        | A      | X             | X      | X     | X        | X         | A         | X         |
| Lime                                 | A             | A          | A      | A            | A      | A        | B        | A        | A      | B             | X      | A     | C        | A         | A         | X         |
| Lime Bleach                          | B             | A          | A      | A            | X      | B        | X        | A        | A      | B             | X      | X     | D        | X         | A         | X         |
| Lime Slurries                        | A             | A          | A      | A            | X      | A        | B        | C        | D      | X             | X      | X     | B        | X         | B         | X         |
| Lime Sulfur                          | A             | B          | A      | A            | X      | A        | A        | A        | A      | A             | X      | A     | D        | X         | A         | X         |
| Lindol, Hydraulic Fluid              | D             | A          | A      | D            | X      | D        | D        | A        | B      | X             | X      | X     | X        | X         | X         | X         |
| Limonene                             | D             | X          | A      | D            | X      | D        | X        | D        | A      | X             | X      | X     | X        | X         | X         | X         |
| Linoleic Acid                        | B             | B          | A      | B            | X      | D        | X        | D        | B      | A             | X      | A     | A        | X         | A         | A         |
| Linseed Oil                          | A             | B          | A      | A            | B      | A        | B        | C        | A      | A             | A      | A     | A        | A         | A         | A         |
| Liquid Oxygen                        | D             | X          | A      | D            | X      | D        | D        | D        | D      | X             | X      | X     | X        | X         | X         | X         |

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|--|---------------|------------|----------|--------------|----------|----------|----------|----------|----------|---------------|----------|----------|----------|-----------|-----------|-----------|
| Liquid Petroleum Gas (LPG)             | D             | C          | A        | A            | B        | C        | C        | D        | A        | D             | A        | X        | X        | X         | X         | A         |
| Liquimoly                              | A             | X          | A        | A            | X        | B        | B/70°    | D        | A        | X             | X        | X        | X        | X         | X         | X         |
| Lithium Bromide                        | A             | X          | A        | A            | X        | D        | D        | A        | A        | X             | X        | A        | X        | A         | X         | X         |
| Lithium Chloride                       | A             | X          | A        | A            | X        | A        | D        | A        | A        | A/125°        | A        | X        | D        | B         | A         | A         |
| Lithium Hydroxide                      | D             | X          | A        | D            | X        | D        | D        | A        | C        | A/70°         | X        | X        | D        | B         | B         | B         |
| <b>Lubricating Oil Di-Ester</b>        | <b>A</b>      | <b>D</b>   | <b>A</b> | <b>B</b>     | <b>D</b> | <b>C</b> | <b>D</b> | <b>D</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Petroleum Base                         | B             | D          | A        | A            | A        | B/150°   | B/70°    | D        | A        | C             | A        | A        | A        | A         | A         | A         |
| SAE 10,20, 30, 40, 50                  | A             | D          | A        | A            | A        | D        | A        | D        | A        | C             | A        | A        | A        | A         | A         | A         |
| Lye Solutions                          | B             | A          | A        | D            | C        | A        | B        | A        | B        | A             | D        | A/150°   | X        | X         | A         | X         |
| Lysol                                  | B             | X          | A        | B            | X        | B        | X        | X        | X        | X             | X        | X        | X        | X         | X         | X         |
| Magnesium Bisulfite                    | C             | X          | A        | B            | X        | B        | X        | X        | X        | X             | X        | X        | X        | X         | X         | X         |
| <b>Magnesium Carbonate</b>             | <b>A</b>      | <b>A</b>   | <b>A</b> | <b>A</b>     | <b>X</b> | <b>A</b> | <b>B</b> | <b>B</b> | <b>A</b> | <b>A</b>      | <b>A</b> | <b>A</b> | <b>D</b> | <b>B</b>  | <b>A</b>  | <b>B</b>  |
| Magnesium Chloride                     | A             | A          | A        | A            | B        | A        | X        | A        | A        | A             | B        | A        | D        | D         | D         | A         |
| Magnesium Hydroxide (Milk of Magnesia) | A             | A          | A        | A            | B        | A        | A        | A        | A        | A             | A        | A        | D        | B         | A         | A         |
| Magnesium Nitrate                      | A             | A          | A        | A            | X        | A        | B        | A        | A        | A             | A        | A        | D        | D         | A         | A         |
| Magnesium Oxide                        | A             | A          | A        | A            | X        | A        | X        | A        | A        | X             | A        | X        | B        | A         | A         | A         |
| Magnesium Salts                        | A             | A          | A        | A            | X        | A        | A        | A        | A        | X             | X        | X        | X        | X         | X         | X         |
| <b>Magnesium Sulfate</b>               | <b>B</b>      | <b>A</b>   | <b>A</b> | <b>A</b>     | <b>B</b> | <b>A</b> | <b>D</b> | <b>A</b> | <b>A</b> | <b>B</b>      | <b>A</b> | <b>A</b> | <b>D</b> | <b>C</b>  | <b>A</b>  | <b>B</b>  |
| Magnesium Sulfite                      | B             | A          | A        | A            | X        | A        | X        | A        | A        | X             | X        | X        | X        | X         | X         | X         |
| Malathion                              | X             | X          | A        | B            | D        | X        | D        | D        | A        | X             | X        | X        | X        | X         | X         | X         |
| Maleic Acid                            | A             | A          | A        | C            | X        | D        | D        | A        | A        | B             | A        | A        | B        | A         | A         | B         |
| Maleic Anhydride                       | D             | A          | A        | D            | X        | D        | X        | D        | A        | X             | A        | X        | A        | B         | A         | A         |
| Malic Acid                             | B             | A          | A        | A            | X        | B        | X        | D        | A        | B             | A        | A        | B        | D         | A         | B         |
| <b>Manganese Chloride</b>              | <b>A</b>      | <b>X</b>   | <b>A</b> | <b>A</b>     | <b>X</b> | <b>B</b> | <b>B</b> | <b>C</b> | <b>A</b> | <b>A</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>D</b>  | <b>X</b>  | <b>B</b>  |
| Malt Beverages                         | B             | A          | A        | A            | X        | A        | B        | A        | A        | X             | X        | X        | X        | X         | X         | X         |
| Maple Sugar Liquors (Sucrose)          | A             | A          | A        | A            | X        | A        | D        | A        | A        | X             | X        | X        | X        | X         | X         | X         |
| Mash                                   | A             | A          | X        | A            | X        | A        | A        | X        | X        | X             | A        | X        | X        | X         | A         | X         |
| Mayonnaise                             | A             | A          | A        | A            | X        | A        | D        | D        | A        | A             | A        | A        | D        | D         | A         | A         |
| MCS 312                                | D             | X          | A        | D            | X        | D        | X        | D        | A        | X             | X        | X        | X        | X         | X         | X         |
| <b>MCS 352</b>                         | <b>D</b>      | <b>X</b>   | <b>A</b> | <b>D</b>     | <b>X</b> | <b>D</b> | <b>D</b> | <b>A</b> | <b>D</b> | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| MCS 463                                | D             | X          | A        | D            | X        | D        | D        | A        | D        | X             | X        | X        | X        | X         | X         | X         |
| Melamine Resins                        | C             | B          | A        | C            | X        | D        | D        | A        | A        | X             | A        | X        | X        | X         | D         | A         |
| Mercaptan                              | D             | X          | A        | D            | X        | D        | D        | A        | D        | X             | X        | X        | X        | X         | X         | X         |
| Mercuric Chloride                      | A             | A          | A        | A            | B        | A        | A        | A        | A        | A             | B        | A        | D        | D         | D         | B         |
| Mercuric Cyanide                       | A             | A          | A        | A            | D        | B        | X        | A        | A        | A             | X        | A        | D        | C         | A         | A         |
| <b>Mercurous Nitrate</b>               | <b>B</b>      | <b>X</b>   | <b>A</b> | <b>B</b>     | <b>X</b> | <b>B</b> | <b>X</b> | <b>A</b> | <b>A</b> | <b>A</b>      | <b>X</b> | <b>A</b> | <b>D</b> | <b>B</b>  | <b>B</b>  | <b>B</b>  |
| Mercury                                | A             | A          | A        | A            | A        | A        | A        | A        | A        | A             | A        | A        | C        | A         | A         | A         |
| Mesityl Oxide                          | D             | C          | A        | D            | X        | D        | D        | B        | D        | X             | X        | X        | A        | A         | A         | A         |
| Methane                                | B             | C          | A        | A            | B        | B        | C        | D        | A        | B             | A        | A        | A        | X         | A         | A         |
| Methanol                               | A             | A          | A        | A            | A        | A        | D        | A        | D        | A/120°        | A        | A        | B        | X         | A         | A         |
| Methyl Acetate                         | D             | B          | A        | D            | C        | D        | D        | B        | D        | C             | A        | B        | A        | A         | A         | A         |
| <b>Methyl Acetoacetate</b>             | <b>D</b>      | <b>X</b>   | <b>A</b> | <b>D</b>     | <b>X</b> | <b>D</b> | <b>D</b> | <b>B</b> | <b>D</b> | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Methyl Acetone                         | D             | B          | A        | C            | X        | D        | X        | A        | D        | D             | A        | D        | A        | A         | A         | A         |
| Methyl Acrylate                        | D             | D          | A        | D            | X        | D        | D        | B        | D        | X             | A        | B        | X        | A         | A         | X         |
| Methyl Acrylic Acid                    | X             | A          | A        | D            | X        | C        | D        | B        | C        | X             | A        | X        | X        | X         | X         | X         |
| Methyl Alcohol                         | A             | A          | A        | A            | A        | C        | D        | A        | C        | A             | A        | A        | B        | A         | B         | A         |
| Methyl Amine                           | B             | X          | A        | B            | X        | C        | X        | A        | C        | X             | A        | C        | B        | A         | A         | B         |
| <b>Methyl Amyl Alcohol</b>             | <b>B</b>      | <b>X</b>   | <b>A</b> | <b>A</b>     | <b>X</b> | <b>D</b> | <b>X</b> | <b>X</b> | <b>D</b> | <b>X</b>      | <b>X</b> | <b>X</b> | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |

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| Methyl Aniline                                       | D             | X          | A      | D            | X      | B        | D        | D        | B     | X             | X      | X      | X        | X         | X         | X         |
| Methyl Benzoate                                      | D             | X          | A      | D            | X      | A        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Methyl Bromide                                       | B             | D          | A      | B            | X      | A        | D        | D        | A     | D             | A      | A      | D        | A         | A         | B         |
| Methyl Butyl Ketone                                  | D             | C          | A      | D            | X      | D        | D        | A        | D     | D             | A      | D      | A        | X         | A         | X         |
| Methyl Butyrate                                      | D             | X          | A      | D            | X      | D        | X        | D        | X     | X             | X      | X      | A        | A         | A         | A         |
| Methyl Carbonate                                     | D             | X          | A      | D            | X      | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Methyl Cellosolve                                    | C             | B          | A      | C            | X      | B        | D        | B        | D     | B             | A      | A      | A        | C         | X         | X         |
| Methyl Cellulose                                     | B             | X          | A      | B            | X      | B        | B/70°    | B        | D     | X             | X      | X      | X        | X         | X         | X         |
| Methyl Chloride                                      | D             | D          | A      | D            | D      | D        | D        | D        | B     | D             | A      | A      | D        | D         | A         | B         |
| Methyl Chloroformate                                 | D             | X          | A      | D            | X      | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Methyl Cyanide                                       | C             | X          | A      | C            | X      | A        | X        | A        | D     | X             | X      | X      | X        | X         | X         | X         |
| Methyl Cyclopentane                                  | D             | C          | A      | D            | X      | D        | D        | X        | A     | X             | A      | X      | X        | X         | X         | X         |
| Methyl D-Bromide                                     | D             | X          | A      | D            | X      | D        | D        | X        | A     | X             | X      | X      | X        | X         | X         | X         |
| Methyl Dichloride                                    | D             | D          | A      | D            | X      | D        | X        | D        | A     | D             | A      | D      | D        | X         | X         | X         |
| Methyl Ether   | X             | X          | A      | A            | X      | C        | X        | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| Methyl Ethyl Ketone (MEK)                            | B             | B          | A      | D            | B      | D        | D        | A        | D     | C/125°        | B      | D      | A        | A         | A         | A         |
| Methyl Formate                                       | D             | B          | A      | D            | X      | B        | D        | B        | D     | X             | A      | X      | A        | B         | B         | X         |
| Methyl Hexane  | X             | X          | A      | A            | X      | B        | X        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Methyl Iodide  | D             | X          | A      | D            | X      | D        | X        | A        | X     | X             | X      | X      | D        | A         | A         | A         |
| Methyl Isopropyl Ketone                              | D             | C          | A      | D            | X      | D        | D        | C        | D     | C             | A      | X      | A        | C         | A         | X         |
| Methyl Methacrylate                                  | D             | B          | A      | D            | X      | D        | D        | D        | D     | A             | A      | B      | B        | C         | A         | X         |
| Methyl Oleate  | D             | C          | A      | D            | X      | D        | X        | B        | A     | X             | A      | X      | X        | X         | X         | X         |
| Methyl Salicylate                                    | D             | B          | A      | D            | X      | D        | X        | B        | B     | B             | A      | B      | A        | A         | X         | X         |
| Methylamine  | X             | A          | A      | B            | X      | X        | X        | A        | X     | X             | A      | C      | B        | A         | A         | B         |
| Methylene Bromide                                    | D             | X          | A      | D            | X      | D        | X        | D        | C     | X             | X      | A      | D        | A         | A         | A         |
| Methylene Chloride                                   | C             | D          | A      | D            | D      | D        | D        | C        | B     | D             | A      | B      | D        | B         | A         | A         |
| Methylene Dichloride                                 | D             | X          | A      | D            | X      | D        | D        | D        | B     | X             | X      | X      | X        | X         | X         | X         |
| Milk   | A             | A          | A      | A            | B      | A        | D        | A        | A     | A             | A      | A      | A        | D         | A         | A         |
| Mine Water   | A             | B          | A      | A            | X      | C        | D        | A        | A     | A             | A      | A      | A        | A         | A         | A         |
| Mineral Oil  | A             | D          | A      | A            | A      | A        | A        | D        | A     | B             | A      | A      | A        | A         | A         | A         |
| MLO-7277 Hydr.                                       | X             | X          | A      | C            | X      | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| MLO-7557   | X             | X          | A      | C            | X      | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| MLO-8200 Hydr.                                       | X             | X          | A      | B            | X      | A        | A        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| MLO-8515   | X             | X          | A      | B            | X      | B        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Molasses   | A             | A          | A      | A            | B      | A        | B        | A        | A     | A             | B      | A      | A        | A         | A         | X         |
| Monochloroacetic Acid                                | D             | D          | A      | D            | D      | A        | D        | C        | B     | A             | B      | A      | D        | D         | D         | B         |
| Monochlorobenzene                                    | D             | D          | A      | D            | C      | D        | D        | D        | A     | D             | A      | A/150° | D        | A         | A         | X         |
| Monochlorodifluoro Methane                           | D             | D          | A      | D            | D      | A        | D        | A        | D     | A             | X      | A      | A        | A         | A         | X         |
| Monoethanolamine                                     | D             | A          | A      | B            | D      | B        | D        | B        | D     | D             | D      | D      | B        | A         | A         | X         |
| Monomethylaniline                                    | D             | B          | A      | D            | D      | D        | D        | D        | B     | X             | X      | X      | X        | X         | X         | X         |
| Monomethylether                                      | A             | C          | A      | A            | D      | B        | X        | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| Monomethyl Hydrazine                                 | B             | X          | A      | B            | D      | B        | X        | A        | X     | X             | X      | X      | X        | X         | X         | X         |
| Mononitrotoluene & Dicitrotoluene<br>(40/60 Mixture) | A             | X          | A      | D            | D      | D        | D        | D        | C     | X             | X      | X      | X        | X         | X         | X         |
| Muriatic Acid (10-20% HCL)                           | B             | A          | A      | D            | D      | D        | B        | A        | A     | A             | D      | A      | D        | D         | D         | A         |
| Mustard  | B             | A          | A      | B            | B      | A        | B        | A        | A     | A             | A      | X      | B        | X         | A         | A         |
| Napalm   | B             | X          | X      | B            | D      | X        | B        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Naptha   | A             | C          | A      | A            | A      | D        | C        | D        | A     | C             | A      | A      | A        | B         | A         | A         |

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| MATERIAL                     | Nitrile (TPE) | Santoprene | Teflon | Nitrile (TS) | Hytre | Neoprene | Urethane | EPR,EPDM | Viton | Polypropylene | Acetal | PVDF   | Aluminum | Cast Iron | Stainless | Hastelloy |
|------------------------------|---------------|------------|--------|--------------|-------|----------|----------|----------|-------|---------------|--------|--------|----------|-----------|-----------|-----------|
| Naptha-Coal Tar (Benzol)     | D             | C          | A      | D            | D     | D        | B        | D        | A     | C             | A      | A      | A        | A         | A         | A         |
| Napthalene (Tar Camphor)     | D             | C          | A      | D            | B     | D        | B        | D        | A     | B             | A      | A      | B        | A         | A         | A         |
| Napthenic Acid               | B             | B          | A      | B            | D     | D        | X        | D        | A     | X             | A      | X      | B        | B         | A         | B         |
| Natural Gas                  | A             | C          | A      | A            | B     | A        | C        | D        | A     | A             | A      | X      | A        | A         | A         | X         |
| Neatsfoot Oil                | A             | B          | A      | A            | D     | D        | A        | B        | A     | X             | B      | X      | A        | A         | A         | X         |
| Neohexane                    | A             | X          | A      | A            | D     | X        | X        | X        | A     | X             | X      | X      | X        | X         | X         | X         |
| Neosol                       | A             | X          | A      | A            | D     | A        | X        | X        | C     | X             | X      | X      | B        | B         | A         | A         |
| Neville Acid                 | D             | A          | A      | D            | D     | D        | X        | B        | A     | X             | X      | X      | X        | X         | X         | X         |
| Nickel Acetate               | B             | A          | A      | B            | X     | B        | D        | A        | D     | A             | X      | A      | B        | X         | A         | X         |
| Nickel Ammonium Sulfate      | C             | A          | A      | X            | X     | A        | X        | X        | A     | X             | X      | X      | X        | X         | X         | X         |
| Nickel Chloride              | A             | A          | A      | A            | D     | B        | A        | A        | A     | A             | B      | A      | D        | D         | B         | A         |
| Nickel Nitrate               | A             | A          | A      | A            | X     | A        | A        | A        | A     | A             | D      | A      | D        | X         | A         | B         |
| Nickel Salts                 | A             | A          | A      | A            | X     | B        | A        | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| Nickel Sulfate               | A             | A          | A      | A            | D     | A        | A        | A        | A     | A             | A      | A      | D        | D         | A         | B         |
| Nicotine                     | A             | X          | A      | X            | B     | C        | A        | X        | A     | X             | X      | X      | X        | X         | X         | X         |
| Nicotinic Acid               | A             | X          | A      | A            | X     | A        | X        | A        | X     | X             | X      | X      | X        | X         | X         | X         |
| Niter Cake                   | A             | A          | A      | A            | X     | A        | A        | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| Nitrana (Ammonia Fertilizer) | B             | X          | A      | B            | X     | B        | X        | X        | C     | X             | X      | X      | X        | X         | X         | X         |
| Nitric Acid                  |               |            |        |              |       |          |          |          |       |               |        |        |          |           |           |           |
| Concentrated                 | D             | C          | A      | D            | D     | D        | D        | D        | A     | D             | C      | A/125° | D        | D         | A         | B         |
| Red Fuming (RFNA)            | X             | D          | A      | D            | D     | D        | D        | D        | B     | D             | C      | D      | D        | D         | A         | B/70°     |
| 5% To 10% Solution           | A             | A          | A      | D            | B     | D        | C        | B        | A     | A/120°        | C      | A/120° | D        | D         | A         | A         |
| 20% Solution                 | B             | B          | A      | D            | D     | D        | C        | B        | A     | B/70°         | C      | A      | D        | D         | A         | B         |
| 50% Solution (Boiling)       | C             | C          | A      | D            | D     | D        | C        | D        | A     | B/70°         | C      | A/125° | D        | D         | A         | A         |
| 65% Solution (Boiling)       | D             | C          | A      | D            | D     | D        | C        | D        | A     | D             | D      | A      | D        | D         | A         | D         |
| Nitrobenzene                 | D             | B          | A      | D            | D     | D        | D        | C        | A     | B/70°         | B      | A/70°  | C        | C         | B         | B         |
| Nitroethane                  | D             | A          | A      | D            | X     | C        | D        | B        | D     | C             | B      | X      | A        | A         | A         | A         |
| Nitrogen                     | A             | A          | A      | A            | B     | A        | A        | A        | A     | A             | A      | A      | A        | A         | A         | A         |
| Nitrogen Textroide           | D             | D          | A      | D            | B     | D        | D        | D        | D     | D             | X      | C      | D        | D         | A         | A         |
| Nitroglycerine               | X             | A          | A      | A            | D     | A        | A        | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| Nitromethane                 | D             | A          | A      | D            | D     | C        | D        | B        | D     | C             | X      | A/120° | A        | A         | A         | A         |
| Nitropropane                 | X             | B          | A      | D            | X     | D        | D        | B        | D     | X             | X      | X      | A        | A         | A         | A         |
| Nitrous Acid                 | D             | X          | A      | D            | X     | X        | X        | B        | A     | D             | X      | A      | D        | D         | B         | A         |
| Nitrous Oxide                | A             | X          | A      | A            | X     | B        | B        | A        | A     | A             | X      | D      | B        | B         | D         | B         |
| Octachloro Toluene           | D             | X          | A      | D            | X     | D        | D        | D        | A     | D             | X      | X      | D        | X         | X         | X         |
| Octadecane                   | X             | B          | A      | A            | X     | B        | A        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| N-Octane                     | D             | B          | A      | B            | X     | D        | D        | D        | A     | D             | X      | A      | X        | X         | X         | X         |
| Octyl Acetate                | D             | X          | A      | D            | X     | X        | X        | X        | D     | X             | X      | X      | A        | X         | A         | X         |
| Octyl Alcohol                | B             | X          | A      | B            | X     | B        | D        | B        | B     | X             | X      | X      | X        | X         | X         | X         |
| Oils, Crude(Asphalt Base)    | B             | D          | A      | B            | B     | C        | A        | D        | A     | B             | A      | A      | A        | B         | A         | A         |
| Oleic Acid (Red Oil)         | D             | B          | A      | A            | A     | C        | B/70°    | C        | A     | A             | A      | A      | A        | B         | A         | A         |
| Olein (Triolein)             | X             | D          | A      | B            | X     | C        | X        | X        | X     | X             | X      | X      | X        | X         | X         | X         |
| Oleum (Fuming Sulfuric Acid) | D             | D          | A      | D            | D     | D        | D        | D        | B     | D             | D      | D      | D        | D         | A         | D         |
| Oleum Spirits                | D             | D          | A      | B            | B     | D        | C        | D        | A     | D             | X      | D      | D        | D         | B         | X         |
| Olive Oil                    | D             | B          | A      | A            | X     | B        | A        | B        | A     | A             | A      | B      | A        | A         | B         | A         |
| Oronite 8200                 | X             | X          | A      | B            | B     | A        | A        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Oronite 9515                 | X             | X          | A      | B            | X     | X        | X        | X        | X     | X             | X      | X      | X        | X         | X         | X         |
| Orthochloro Ethyl Benzene    | X             | X          | A      | D            | X     | D        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |



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|---|---------------|------------|--------|--------------|-------|----------|----------|----------|-------|---------------|--------|---------|----------|-----------|-----------|-----------|
| Ortho-Dichlorobenzene                   | X             | D          | A      | D            | D     | D        | D        | D        | A     | X             | X      | X       | X        | X         | X         | X         |
| OS 45 Type 111 (OS45)                   | X             | X          | A      | B            | C     | A        | D        | D        | B     | X             | X      | X       | X        | X         | X         | X         |
| OS 45 Type IV (OS45-1)                  | X             | X          | A      | B            | X     | A        | D        | D        | B     | X             | X      | X       | X        | X         | X         | X         |
| OS 70                                   | X             | X          | A      | B            | X     | A        | D        | D        | A     | X             | X      | X       | X        | X         | X         | X         |
| Oxalic Acid - 5% (Hot and Cold)         | C             | A          | A      | B            | D     | B        | A        | A        | A     | A             | D      | A/120°  | B        | D         | B         | B         |
| Ozone                                   | X             | A          | A      | D            | C     | C        | A        | A        | A     | D             | D      | A       | B        | X         | X         | X         |
| Paint Thinner, Duco                     | D             | C          | A      | D            | X     | D        | D        | D        | B     | D             | A      | X       | A        | A         | A         | X         |
| Palmitic Acid                           | A             | B          | A      | A            | A     | B        | A        | B        | A     | A             | A      | A       | C        | C         | A         | B         |
| Palm Oil                                | X             | B          | A      | A            | X     | D        | A        | D        | A     | X             | A      | A       | A        | A         | A         | X         |
| Para-Dichlorobenzene                    | X             | X          | A      | D            | X     | D        | D        | D        | A     | X             | X      | X       | X        | X         | X         | X         |
| Paraffin                                | A             | A          | A      | A            | X     | B        | A        | D        | A     | A             | A      | A       | A        | X         | A         | B         |
| Paraformaldehyde                        | X             | X          | A      | B/70°        | X     | B        | X        | A        | C     | X             | X      | X       | A        | A         | A         | A         |
| Paraldehyde                             | X             | X          | A      | D            | X     | D        | X        | A        | D     | X             | X      | X       | A        | A         | A         | A         |
| Peanut Oil                              | A             | B          | A      | A            | X     | A        | B/70°    | C/70°    | A     | A             | X      | A       | X        | A         | A         | A         |
| Pentachloroethane (Pentalin)            | D             | X          | A      | D            | X     | D        | X        | X        | A     | D             | A      | A       | D        | A         | A         | A         |
| Pentachlorophenol (PCP)                 | X             | X          | A      | D            | X     | D        | D        | D        | A     | X             | X      | X       | A        | A         | A         | A         |
| Pentane                                 | X             | X          | A      | A            | X     | B        | D        | D        | A     | X             | A      | A       | A        | B         | B         | B         |
| Peppermint Oil                          | X             | C          | X      | D            | X     | D        | X        | X        | A     | X             | X      | X       | X        | X         | A         | X         |
| Perchloric Acid                         | D             | D          | A      | D            | D     | B        | D        | B        | A     | X             | C      | A/120°  | D        | D         | B         | X         |
| Perchloroethylene(Tetrachloroethylene)  | D             | D          | A      | D            | D     | D        | D        | D        | B     | D             | A      | A       | D        | B         | A         | B         |
| Permachlor (Degreasing Fluid)           | X             | X          | A      | D            | X     | X        | X        | D        | C/70° | X             | X      | X       | X        | X         | X         | X         |
| Petrolatum                              | A             | X          | A      | A            | X     | B        | D        | D        | A     | A             | A      | A       | B        | X         | A         | A         |
| Petroleum Ether                         | A             | X          | A      | A            | X     | D        | B        | D        | A     | A             | A      | B       | B        | B         | A         | D         |
| Petroleum Oils (Refined)                | B             | C          | A      | A            | A     | B        | B        | D        | A     | B             | A      | A       | X        | X         | X         | X         |
| Petroleum Oils (Sour)                   | C             | C          | A      | B            | B     | B        | B        | D        | A     | B             | A      | A       | B        | B         | A         | A         |
| Petroleum Oil, Crude                    | C             | C          | A      | A            | A     | B        | A        | D        | A     | B             | A      | A       | X        | X         | X         | X         |
| Phenol                                  | D             | A          | A      | D            | D     | D        | D        | X        | A     | C             | A      | A/70°   | B        | D         | A         | A         |
| Phenol Sulfonic Acid                    | X             | X          | Q      | D            | X     | X        | X        | X        | D     | X             | X      | AB/120° | B        | B         | B         | A         |
| Phenyl Acetate                          | X             | X          | A      | D            | X     | D        | D        | B/70°    | D     | X             | X      | X       | X        | X         | X         | X         |
| Phenylbenzene                           | X             | C          | A      | D            | X     | D        | D        | D        | A     | X             | X      | X       | X        | X         | X         | X         |
| Phenyl Hydrazine                        | X             | B          | A      | D            | X     | D        | X        | D        | A     | X             | X      | D       | A        | D         | X         | X         |
| Phorone(Diisopropylidene Acetone)       | X             | B          | A      | D            | X     | D        | D        | B        | D     | X             | X      | X       | X        | X         | X         | X         |
| Phosphate Esters                        | X             | X          | A      | D            | X     | D        | D        | A        | D     | X             | X      | X       | X        | X         | X         | X         |
| Phosphoric Acid 20%<br>40-100% Solution | X             | A          | A      | B            | X     | A        | C        | A        | A     | A             | D      | A       | D        | D         | A         | A         |
| Phosphorous Oxychloride                 | X             | X          | A      | X            | X     | D        | X        | X        | X     | X             | X      | X       | B        | B         | B         | B         |
| Phosphorous Trichloride Acid            | D             | B          | A      | D            | X     | D        | X        | A        | A     | D             | D      | A       | D        | B         | A         | X         |
| Photographic Developer                  | B             | A          | A      | A            | D     | A        | B        | B        | A     | A             | A      | A       | C        | D         | A         | A         |
| Phthalic Acid                           | D             | X          | A      | C            | X     | C        | X        | A        | A     | A             | X      | A       | B        | A         | B         | B         |
| Phthalic Anhydride                      | X             | X          | A      | C            | X     | A        | X        | A        | A     | X             | X      | X       | X        | X         | X         | X         |
| Pickling Solution                       | D             | A          | A      | D            | D     | D        | C        | C/70°    | B/70° | X             | D      | X       | X        | X         | X         | A         |
| Picric Acid                             | B             | B          | A      | D            | D     | C        | C        | C        | A     | B/70°         | D      | A/70°   | C        | D         | D         | D         |
| Pinene                                  | B             | C          | A      | B            | D     | D        | D        | D        | A     | X             | X      | X       | X        | X         | X         | X         |
| Pine Oil                                | B             | C          | A      | B            | D     | D        | D        | D        | A     | X             | X      | X       | A        | B         | A         | X         |
| Piperidine                              | X             | B          | A      | D            | D     | D        | D        | D        | D     | X             | X      | X       | X        | X         | X         | X         |
| Pitch                                   | A             | X          | A      | A            | D     | D        | D        | D        | A     | X             | X      | X       | X        | X         | X         | X         |
| Plating Solutions                       |               |            |        |              |       |          |          |          |       |               |        |         |          |           |           |           |
| Antimony                                | B             | A          | A      | A            | X     | A        | X        | X        | A     | A             | A      | A       | D        | A         | A         | A         |

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# Compatibility Guide

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\*All degrees are in Fahrenheit

| MATERIAL                                 | Nitrile (TPE) | Santoprene | Teflon | Nitrile (TS) | Hytrek | Neoprene | Urethane | EPR,EPDM | Viton | Polypropylene | Acetal | PVDF   | Aluminum | Cast Iron | Stainless | Hastelloy |
|--|---------------|------------|--------|--------------|--------|----------|----------|----------|-------|---------------|--------|--------|----------|-----------|-----------|-----------|
| Arsenic                                  | B             | A          | A      | A            | X      | A        | X        | X        | A     | A             | A      | X      | C        | A         | A         | A         |
| Brass                                    | B             | A          | A      | A            | X      | A        | X        | A        | A     | A             | A      | A      | C        | A         | A         | A         |
| Bronze                                   | B             | A          | A      | A            | X      | A        | X        | A        | A     | A             | B      | X      | C        | A         | A         | A         |
| Cadmium                                  | B             | A          | A      | A            | X      | A        | X        | A        | A     | A             | C      | A      | C        | A/70°     | A/140°    | A/90°     |
| Chrome                                   | D             | A          | A      | D            | X      | D        | X        | A        | A     | A             | D      | A      | C        | C         | A         | B         |
| Copper                                   | B             | A          | A      | A            | X      | A        | D        | A        | X     | A             | X      | A      | C        | A/70°     | A/150°    | A/120°    |
| Gold                                     | B             | A          | A      | A            | X      | A        | X        | A        | A     | A             | X      | A      | C        | X         | A/150°    | A/70°     |
| Indium                                   | B             | A          | A      | A            | X      | A        | X        | X        | A     | A             | X      | X      | C        | X         | A         | A         |
| Iron                                     | B             | A          | A      | A            | X      | A        | X        | X        | A     | A             | X      | A      | C        | X         | A         | A         |
| Lead                                     | C             | A          | A      | B            | X      | A        | X        | A        | A     | A             | A      | A      | C        | X         | X         | X         |
| Nickel                                   | B             | A          | A      | A            | X      | A        | X        | A        | A     | A             | X      | A      | C        | X         | A/70°     | A/140°    |
| Silver                                   | B             | A          | A      | A            | X      | A        | X        | A        | A     | A             | X      | A      | C        | X         | A         | A         |
| Tin                                      | B             | A          | A      | B            | X      | A        | X        | A        | A     | A             | X      | A      | C        | X         | A         | A         |
| Zinc                                     | B             | A          | A      | A            | X      | A        | X        | A        | A     | A             | X      | A      | C        | X         | A         | A         |
| Polyvinyl Acetate Emulsion               | B             | A          | A      | A            | X      | B        | X        | A        | D     | B/70°         | A      | A      | X        | B         | X         | X         |
| Potassium Acetate                        | B             | A          | A      | B            | X      | B        | D        | A        | D     | A             | A      | A      | D        | A         | B         | B         |
| Potassium Bicarbonate                    | A             | A          | A      | A            | X      | A        | D        | A        | A     | A             | A      | A      | C        | A         | B         | B         |
| Potassium Bisulfite                      | A             | X          | A      | A            | X      | A        | A        | A        | A     | A             | X      | X      | X        | X         | X         | X         |
| Potassium Bromide                        | A             | A          | A      | A            | X      | A        | D        | A        | A     | A             | A      | A      | C        | D         | A         | A         |
| Potassium Carbonate (Potash)             | A             | A          | A      | A            | D      | A        | D        | A        | A     | A             | A      | A      | C        | B         | A         | B         |
| Potassium Chlorate                       | A             | A          | A      | A            | X      | A        | A        | A        | A     | A             | A      | A      | B        | C         | A         | B         |
| Potassium Chloride                       | A             | A          | A      | A            | D      | A        | A        | A        | A     | A             | A      | A      | B        | B         | C         | B         |
| Potassium Chromate                       | A             | A          | A      | A            | X      | A        | B        | A        | A     | A             | D      | A      | A        | A         | B         | A         |
| Potassium Cupro Cyanide                  | X             | A          | A      | A            | X      | A        | X        | B        | A     | A             | C      | A      | X        | X         | X         | X         |
| Potassium Cyanide                        | A             | A          | A      | A            | B      | A        | A        | A        | A     | A             | C      | A      | D        | B         | A         | B         |
| Potassium Dichromate                     | A             | A          | A      | A            | B      | A        | B        | A        | A     | A             | D      | A      | A        | B         | A         | B         |
| Potassium Ferricyanide                   | X             | X          | A      | C            | X      | A        | X        | A        | A     | A             | B      | A      | B        | C         | B         | B         |
| Potassium Hydroxide(Caustic Potash)(Lye) | A             | A          | A      | B            | A      | B        | B        | A        | B     | A             | A      | A/150° | D        | C         | A         | B         |
| Potassium Hypochlorite                   | B/70°         | X          | B      | B/70°        | X      | B        | B        | A        | D     | D             | D      | A      | D        | D         | D         | B         |
| Potassium Iodide                         | B             | X          | A      | A            | X      | A        | X        | A        | A     | A             | X      | A      | B        | X         | B         | B         |
| Potassium Nitrate                        | A             | A          | A      | A            | X      | A        | A        | A        | A     | A             | B      | A      | A        | B         | B         | B         |
| Potassium Permanganate                   | D             | A          | A      | B            | D      | A        | B        | A        | A     | B             | C      | A      | B        | B         | B         | A         |
| Potassium Phosphate                      | X             | X          | A      | A            | X      | A        | C        | A        | A     | X             | X      | X      | D        | D         | B         | B         |
| Potassium Salts                          | A             | X          | A      | A            | X      | A        | A        | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| Potassium Sulfate                        | A             | A          | A      | A            | B      | A        | A        | A        | A     | A             | B      | A      | B        | B         | A         | A         |
| Potassium Sulfide                        | A             | X          | A      | A            | X      | A        | A        | A        | A     | A             | X      | A      | D        | B         | B         | B         |
| Potassium Sulfite                        | A             | X          | A      | A            | X      | A        | A        | A        | A     | A             | X      | A      | A        | D         | B         | X         |
| Potassium Triphosphate                   | A             | X          | D (A)  | A            | X      | A        | B        | X        | A     | X             | X      | X      | X        | X         | X         | X         |
| PRL-High Temp. Hydr. Oil                 | B/70°         | X          | A      | B/70°        | X      | B        | B        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Producer Gas                             | X             | X          | A      | A            | X      | B        | A        | D        | A     | X             | A      | X      | X        | X         | X         | X         |
| Propane (LPG)                            | B             | C          | A      | A            | B      | B        | B        | D        | A     | D             | A      | A      | A        | B         | A         | A         |
| Propane (Liquified)                      | B             | X          | A      | A            | B      | B        | B        | D        | A     | B/70°         | A      | B/20°  | A        | A         | A         | A         |
| Propane Propionitrile                    | X             | X          | A      | A            | X      | B        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Propionaldehyde (Propanol)               | X             | X          | A      | D            | X      | D        | D        | A        | D     | X             | X      | X      | A        | A         | A         | A         |
| Propionic Acid                           | X             | A          | A      | D            | X      | D        | D        | A        | D     | X             | X      | X      | A        | A         | A         | A         |
| Propyl Acetate                           | D             | B          | A      | D            | X      | D        | D        | B        | D     | C             | A      | A/70°  | A        | X         | A         | A         |
| Propyl Alcohol                           | B             | A          | A      | A            | X      | A        | D        | A        | A     | A             | A      | A      | A        | A         | A         | A         |
| Propylene                                | X             | B          | A      | D            | X      | D        | D        | D        | A     | A             | A      | A      | A        | A         | A         | A         |

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|-----------------------------------|---------------|------------|---------------------|--------------|----------|----------|--------------|--------------|--------------|---------------|----------|----------|----------|-----------|-----------|-----------|
| Propylene Dichloride              | X             | X          | A                   | D            | X        | D        | D            | D            | A            | X             | X        | X        | D        | A         | A         | B         |
| Propylene Glycol                  | A             | A          | A                   | A            | X        | C        | B            | A            | A            | A             | D        | A        | A        | B         | A         | B         |
| Propylene Oxide                   | D             | A          | A                   | D            | X        | D        | D            | B            | D            | A/70°         | A        | D        | B        | B         | A         | X         |
| Propyl Nitrate                    | X             | B          | A                   | D            | X        | D        | D            | B            | D            | C             | A        | D        | B        | B         | A         | X         |
| Pryanol, Transformer Oil          | X             | X          | A                   | A            | X        | D        | B            | D            | A            | X             | X        | X        | X        | X         | X         | X         |
| <b>Pydraul</b>                    | <b>X</b>      | <b>X</b>   | <b>X</b>            | <b>X</b>     | <b>X</b> | <b>X</b> | <b>X</b>     | <b>X</b>     | <b>X</b>     | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Pyridine                          | X             | A          | A                   | D            | C        | D        | D            | B            | D            | C             | B        | D        | B        | A         | B         | A         |
| Pyrogallic Acid                   | X             | X          | A                   | D            | X        | A        | D            | B            | A            | X             | D        | A        | X        | D         | A         | B         |
| Pyroligneous Acid                 | D             | X          | A                   | D            | X        | D        | D            | B            | D            | A             | D        | A        | B        | D         | A         | X         |
| Pyrolube                          | X             | A          | A                   | D            | X        | D        | D            | B            | A            | X             | X        | X        | X        | X         | X         | X         |
| Pyrrole                           | X             | C          | A                   | D            | X        | D        | X            | D            | D            | X             | X        | X        | X        | X         | X         | X         |
| <b>Quarternary Ammonium Salts</b> | <b>X</b>      | <b>X</b>   | <i>A/70°</i>        | <b>A</b>     | <b>X</b> | <b>A</b> | <b>X</b>     | <b>X</b>     | <b>A</b>     | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Quench Oil                        | X             | X          | <i>A/70°</i>        | A            | X        | D        | A            | D            | A            | X             | X        | X        | A        | X         | A         | A         |
| Quinine Bisulphate (Dry)          | D             | X          | A                   | A            | X        | A        | A            | A            | A            | D             | D        | D        | D        | D         | B         | A         |
| Quinine Sulphate (Dry)            | D             | X          | A                   | A            | X        | A        | A            | A            | A            | D             | D        | D        | D        | D         | A         | A         |
| Radiation                         | X             | X          | A                   | B            | X        | C        | B            | <i>C/70°</i> | D            | X             | D        | X        | X        | X         | X         | X         |
| Rape Seed Oil                     | X             | B          | A                   | B            | X        | B        | <i>B/70°</i> | A            | A            | X             | X        | X        | X        | A         | A         | A         |
| <b>Red Line 100 Oil</b>           | <b>X</b>      | <b>X</b>   | <b>X</b>            | <b>A</b>     | <b>X</b> | <b>B</b> | <b>A</b>     | <b>D</b>     | <b>A</b>     | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| RJ-1 (Mil-F-25558)                | X             | X          | X                   | A            | X        | B        | B            | D            | A            | X             | X        | X        | X        | X         | X         | X         |
| RP-1 (Mil-R-25576)                | X             | X          | X                   | A            | X        | C        | C            | D            | A            | X             | X        | X        | X        | X         | X         | X         |
| Rose Oil                          | X             | A          | X                   | X            | X        | C        | A            | X            | A            | X             | X        | X        | X        | X         | A         | X         |
| Rosins                            | A             | A          | A                   | A            | X        | A        | D            | D            | A            | A             | B        | X        | A        | D         | A         | A         |
| Rosin Paper Mill                  | X             | A          | A                   | A            | X        | A        | D            | A            | A            | A             | B        | X        | A        | D         | A         | A         |
| <b>Rotenone</b>                   | <b>X</b>      | <b>X</b>   | <b>A</b>            | <b>A</b>     | <b>X</b> | <b>A</b> | <b>X</b>     | <b>A</b>     | <b>A</b>     | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Rum                               | A             | A          | A                   | A            | X        | A        | D            | A            | A            | A             | A        | X        | X        | X         | A         | A         |
| Rust Inhibitors                   | A             | B          | X                   | A            | X        | C        | A            | X            | A            | A             | A        | X        | X        | C         | A         | X         |
| Sal Ammoniac                      | X             | A          | A                   | A            | A        | A        | A            | A            | A            | A             | D        | A        | D        | D         | B         | A         |
| Sal Soda                          | A             | B          | A                   | A            | X        | A        | X            | A            | A            | X             | X        | X        | D        | A         | A         | A         |
| Salad Dressing                    | D             | A          | X                   | D            | D        | D        | D            | D            | D            | A             | A        | X        | B        | D         | A         | X         |
| <b>Salicylic Acid</b>             | <b>A</b>      | <b>A</b>   | <b>A</b>            | <b>A</b>     | <b>X</b> | <b>D</b> | <b>X</b>     | <b>A</b>     | <b>A</b>     | <b>A</b>      | <b>X</b> | <b>A</b> | <b>A</b> | <b>D</b>  | <b>B</b>  | <b>A</b>  |
| Santo Safe 300                    | X             | X          | A                   | D            | B        | D        | X            | <i>C/70°</i> | A            | X             | X        | X        | X        | X         | X         | X         |
| Salt Water                        | A             | A          | A                   | A            | X        | A        | D            | A            | A            | A             | A        | A        | D        | D         | C         | A         |
| Sea Water                         | A             | A          | A                   | A            | A        | A        | A            | A            | A            | A             | A        | A        | D        | D         | C         | A         |
| Sesame Seed Oil                   | A             | B          | X                   | A            | X        | C        | X            | X            | A            | X             | X        | X        | X        | A         | A         | X         |
| Sewage                            | A             | A          | A                   | A            | A        | A        | D            | A            | A            | A             | A        | A        | B        | B         | A         | A         |
| <b>Shellac</b>                    | <b>A</b>      | <b>A</b>   | <b>A</b>            | <b>A</b>     | <b>D</b> | <b>D</b> | <b>D</b>     | <b>A</b>     | <b>A</b>     | <b>A</b>      | <b>A</b> | <b>X</b> | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Silicate Esters                   | A             | B          | A                   | A            | C        | A        | B            | D            | A            | X             | X        | X        | X        | X         | X         | X         |
| Silicone Greases                  | A             | B          | A                   | A            | A        | A        | A            | A            | A            | X             | A        | X        | X        | X         | X         | X         |
| Silicone Oils                     | A             | C          | A                   | A            | B        | A        | A            | A            | A            | A             | A        | A        | B        | A         | A         | A         |
| Silicon Tetrachloride Wet         | X             | X          | X                   | X            | X        | X        | X            | X            | X            | X             | X        | X        | X        | X         | X         | X         |
| Silver Bromide                    | X             | X          | <i>A/70°</i>        | X            | X        | X        | X            | X            | X            | X             | A        | X        | D        | D         | B         | A         |
| <b>Silver Chloride</b>            | <b>D</b>      | <b>X</b>   | <b><i>A/70°</i></b> | <b>X</b>     | <b>X</b> | <b>X</b> | <b>X</b>     | <b>X</b>     | <b>X</b>     | <b>A</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Silver Cyanide                    | A             | X          | A                   | A            | X        | A        | D            | A            | A            | A             | X        | A        | D        | A         | A         | A         |
| Silver Nitrate                    | C             | A          | A                   | B            | D        | A        | A            | A            | A            | A             | A        | A        | D        | D         | A         | A         |
| Spelly, Solvent B,C,E             | X             | X          | A                   | A            | X        | D        | X            | D            | A            | X             | X        | X        | X        | X         | X         | X         |
| Skydrol 500                       | D             | B          | A                   | D            | A        | D        | D            | A            | D            | X             | A        | X        | X        | X         | A         | A         |
| Skydrol 7000                      | X             | B          | A                   | D            | D        | D        | D            | A            | <i>B/70°</i> | X             | A        | X        | X        | X         | A         | A         |
| <b>Soap Solutions</b>             | <b>A</b>      | <b>A</b>   | <b>A</b>            | <b>A</b>     | <b>A</b> | <b>A</b> | <b>A</b>     | <b>A</b>     | <b>A</b>     | <b>A</b>      | <b>A</b> | <b>A</b> | <b>C</b> | <b>D</b>  | <b>A</b>  | <b>A</b>  |

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| Sodium Acid Sulfate              | A             | A          | A      | A            | X     | A        | A        | A        | A     | A             | X      | X    | X        | B         | X         | X         |
| Sodium Aluminate                 | A             | A          | A      | A            | X     | A        | X        | A        | A     | A             | A      | A    | C        | A         | A         | A         |
| Sodium Aluminium Sulfate         | A             | A          | A      | A            | X     | A        | A        | A        | A     | X             | X      | X    | X        | X         | X         | B         |
| Sodium Bicarbonate               | A             | A          | A      | A            | B     | A        | A        | A        | A     | A             | A      | A    | A        | C         | A         | B         |
| Sodium Bichromate                | B             | A          | A      | A            | X     | A        | A        | A        | A     | A             | D      | A    | C        | C         | B         | C         |
| Sodium Bisulfate                 | A             | A          | A      | A            | AC    | A        | A        | A        | A     | A             | A      | A    | D        | D         | A         | B         |
| Sodium Bisulfite                 | A             | A          | A      | A            | B     | A        | A        | A        | A     | A             | A      | A    | A        | D         | A         | A         |
| Sodium Borate (Borax)            | A             | A          | A      | A            | B     | A        | A        | A        | A     | A/140°        | A      | A    | C        | B         | B         | A         |
| Sodium Bromide                   | X             | A          | A      | X            | X     | A        | X        | A        | A     | A             | X      | A    | C        | C         | B         | B         |
| Sodium Carbonate                 | A             | A          | A      | A            | B     | A        | A        | A        | A     | A             | A      | A    | C        | B         | A         | A         |
| Sodium Chlorate                  | A             | A          | A      | A            | X     | A        | A        | A        | A     | A             | A      | A    | B        | B         | A         | A         |
| Sodium Chloride                  | A             | A          | A      | A            | A     | A        | A        | A        | A     | A             | A      | A    | C        | B         | C         | A         |
| Sodium Chromate                  | A             | A          | A      | A            | X     | A        | X        | X        | A     | A             | D      | A    | A        | A         | A         | A         |
| Sodium Citrate                   | D             | A          | X      | X            | X     | X        | X        | X        | X     | X             | X      | X    | X        | X         | B         | B         |
| Sodium Cyanide                   | A             | A          | A      | A            | B     | A        | A        | A        | A     | A             | B      | A    | D        | B         | A         | A         |
| Sodium Dichromate                | A             | A          | A      | A            | B     | B        | B        | A        | B     | A             | X      | A    | X        | X         | X         | X         |
| Sodium Ferricyanide              | A             | A          | A      | A            | X     | A        | X        | A        | A     | A             | X      | A    | A        | D         | B         | B         |
| Sodium Fluoride                  | A             | A          | A      | A            | X     | A        | B        | A        | A     | A             | X      | A    | B        | X         | B         | B         |
| Sodium Hydroxide                 |               |            |        |              |       |          |          |          |       |               |        |      |          |           |           |           |
| 20% (Cold)                       | B             | A          | A      | A            | A     | B        | B        | A        | A     | A             | A      | A    | D        | B         | A         | B         |
| 50% Solution (Cold)              | D             | A          | A      | D            | B     | C        | B        | A        | A     | A             | A      | C    | D        | C         | B         | A         |
| 80% Solution (Cold)              | D             | X          | A      | D            | D     | C        | B        | A        | A     | A             | A      | C    | D        | C         | D         | B         |
| Sodium Hydrosulfate              | X             | X          | X      | X            | X     | X        | X        | X        | X     | X             | X      | X    | X        | X         | X         | X         |
| Sodium Hypochlorite 0-20%        | D             | B          | A      | D            | C     | B        | D        | B        | C     | B             | D      | A    | D        | D         | C         | A         |
| Sodium Metasilicate              | A             | A          | A      | A            | X     | A        | B/70°    | A        | A     | A             | B      | A    | B        | X         | A         | A         |
| Sodium Nitrate                   | C             | A          | A      | A            | B     | B        | B/70°    | A        | A     | A             | A      | A    | A        | A         | A         | A         |
| Sodium Perborate                 | B             | A          | A      | B            | B     | B        | B/70°    | A        | A     | A             | B      | A    | D        | B         | A         | B         |
| Sodium Peroxide (Sodium Dioxide) | B             | B          | A      | B            | B     | B        | D        | A        | A     | B             | F      | A    | B        | A         | B         | B         |
| Sodium Phosphate                 | A             | A          | A      | A            | C     | A        | A        | A        | A     | A             | A      | A    | D        | B         | B         | A         |
| Sodium Phosphate (Mono)          | A             | A          | A      | A            | B     | C        | A        | A        | A     | A             | A      | A    | D        | D         | A         | X         |
| Sodium Phosphate (Dibasic)       | B             | A          | A      | A            | B     | B        | A        | A        | A     | A             | A      | A    | D        | D         | A         | X         |
| Sodium Phosphate (Tribasic)      | B             | A          | A      | A            | B     | C        | A        | A        | A     | A             | A      | A    | D        | D         | A         | A         |
| Sodium Silicate (Water Glass)    | A             | A          | A      | A            | B     | A        | B        | A        | A     | A             | C      | A    | C        | B         | A         | B         |
| Sodium Sulfate (Salt Cake)       | A             | A          | A      | A            | B     | A        | A        | A        | A     | A             | B      | A    | B        | A         | A         | B         |
| Sodium Sulfide                   | A             | A          | A      | A            | B     | A        | A        | A        | A     | A             | B      | A    | D        | A         | A         | B         |
| Sodium Sulfide - Saturated       | A             | A          | A      | A            | B     | A        | A        | B        | B     | A             | A      | A    | D        | B         | B         | A         |
| Sodium Sulfite                   | A             | A          | A      | A            | B     | A        | A        | A        | A     | A             | A      | A    | A        | D         | A         | B         |
| Sodium Tetraborate               | B             | A          | A      | A            | B     | A        | B        | A        | A     | A             | A      | A    | A        | B         | A         | B         |
| Sodium Tetraphosphate            | X             | A          | X      | X            | X     | X        | X        | X        | X     | X             | X      | X    | X        | X         | X         | X         |
| Sodium Thiosulfate (Antichlor)   | A             | A          | A      | X            | X     | X        | X        | X        | X     | A             | B      | A    | A        | C         | A         | B         |
| Sodium Triphosphate              | X             | X          | A      | A            | B     | A        | A        | A        | A     | A             | C      | A    | B        | C         | A         | A         |
| Sorghum                          | A             | A          | X      | A            | X     | A        | X        | X        | A     | X             | A      | X    | X        | A         | A         | A         |
| Soybean Oil                      | A             | C          | A      | A            | B     | A        | B/70°    | D        | A     | B             | B      | X    | A        | A         | A         | A         |
| Soy Sauce                        | A             | A          | X      | A            | X     | A        | B        | X        | A     | X             | A      | X    | A        | D         | A         | X         |
| Sperm Oil (Whale Oil)            | X             | B          | X      | A            | X     | D        | X        | D        | A     | X             | X      | X    | X        | A         | A         | A         |
| Spry                             | X             | X          | X      | A            | X     | B        | A        | B/70°    | A     | X             | X      | X    | X        | X         | X         | X         |
| SR-6 Fuel                        | X             | X          | X      | B/70°        | X     | D        | B/70°    | D        | A     | X             | X      | X    | X        | X         | X         | X         |
| SR-10 Fuel                       | X             | X          | X      | A            | X     | D        | B/70°    | D        | A     | X             | X      | X    | X        | X         | X         | X         |

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# Compatibility Guide

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\*All degrees are in Fahrenheit

| MATERIAL                           | Nitrile (TPE) | Santoprene | Teflon | Nitrile (TS) | Hytrek | Neoprene | Urethane | EPR,EPDM | Viton | Polypropylene | Acetal | PVDF   | Aluminum | Cast Iron | Stainless | Hastelloy |
|------------------------------------|---------------|------------|--------|--------------|--------|----------|----------|----------|-------|---------------|--------|--------|----------|-----------|-----------|-----------|
| Stannic Chloride                   | A             | A          | A      | A            | B      | C        | B        | A        | A     | A             | B      | A      | D        | D         | D         | B         |
| Stannic Fluoroborate               | X             | X          | X      | A            | X      | A        | X        | X        | A     | X             | C      | X      | D        | D         | X         | X         |
| Stannous Chloride                  | A             | B          | A      | A            | B      | A        | C        | B        | A     | A             | X      | A      | D        | B         | A         | A         |
| Starch                             | A             | A          | A      | A            | B      | A        | A        | A        | A     | A             | B      | X      | A        | C         | A         | A         |
| Stearic Acid                       | B             | A          | A      | B            | B      | B        | A        | B        | A     | B/72°         | A      | A      | B        | X         | A         | A         |
| Stoddard Solvent                   | B             | D          | A      | A            | C      | D        | A        | D        | A     | A/70°         | A      | A      | A        | A         | A         | A         |
| Styrene (Vinyl Benzene)            | D             | C          | A      | D            | D      | D        | D        | D        | B     | D             | A      | A      | A        | B         | A         | D         |
| Sucrose Solutions (Sugar)          | A             | A          | A      | A            | B      | A        | A        | A        | A     | X             | A      | X      | A        | B         | A         | A         |
| Sugar Liquids                      | A             | A          | A      | A            | B      | A        | D        | A        | A     | A             | A      | A      | A        | A         | A         | A         |
| Sulfate Black Liquor               | B             | A          | A      | B            | B      | A        | A        | A        | A     | A             | D      | A      | B        | C         | A         | A         |
| Sulfate Green Liquor               | B             | A          | A      | B            | B      | A        | A        | A        | A     | A             | D      | A      | B        | C         | A         | A         |
| Sulfite Liquor                     | B             | A          | A      | B            | X      | A        | C        | B/70°    | A     | B             | X      | X      | D        | D         | B         | A         |
| Sulfur                             | B             | A          | A      | B            | X      | B        | B        | A        | A     | A             | A      | A      | A        | A         | A         | B         |
| Sulfur Chloride                    | D             | D          | A      | D            | C/70°  | A        | C/70°    | D        | A     | C             | D      | A/70°  | B        | D         | B         | A         |
| Sulfur Dioxide                     | D             | A          | A      | D            | D      | A        | C        | A        | A     | A             | D      | A      | D        | D         | A         | B         |
| Sulfur Hexafluoride                | C             | B          | A      | B/70°        | B      | B        | B        | A        | C     | X             | D      | X      | D        | D         | X         | D         |
| Sulfur Trioxide                    | D             | D          | A      | D            | D      | A        | C        | C        | A     | D             | X      | C      | D        | D         | B         | B         |
| Sulfuric Acid -Dilute              | D             | A          | A      | D            | A      | C        | C        | A        | A     | A             | D      | A      | D        | D         | B         | A         |
| Sulfuric Acid - (To 10%)           | D             | A          | A      | D            | A      | D        | D        | A        | A     | A/120°        | D      | A      | D        | D         | C         | A         |
| Sulfuric Acid - (To 75%)           | D             | A          | A      | D            | B      | D        | D        | C        | A     | A/72°         | D      | A/150° | D        | D         | C         | B         |
| Concentrated                       | D             | B          | A      | D            | C      | D        | D        | C        | A     | C/72°         | D      | A/120° | D        | D         | B         | A         |
| (Fuming) Oleum                     | D             | A          | A      | D            | B      | D        | D        | B        | A     | D             | D      | D      | C        | D         | B         | B         |
| Sulfurous Acid                     | D             | X          | A      | D            | D      | D        | D        | D        | D     | A             | D      | A      | D        | D         | B         | B         |
| Sunsafe (Fire Resist. Hydr. Fluid) | B             | D          | A      | A            | A      | B        | D        | D        | A     | X             | X      | X      | X        | X         | X         | X         |
| Syrup                              | A             | A          | X      | A            | X      | B        | X        | A        | A     | A             | A      | X      | A        | X         | A         | X         |
| Tall Oil                           | A             | D          | A      | A            | X      | D        | A        | D        | A     | A             | X      | A      | D        | C         | B         | A         |
| Tallow                             | B             | B          | A      | A            | X      | D        | A        | A        | A     | B/70°         | A      | X      | A        | X         | A         | X         |
| Tannic Acid                        | A             | A          | A      | A            | A      | A        | A        | A        | A     | A             | D      | A      | D        | C         | A         | B         |
| Tanning Oils                       | X             | X          | A      | A            | X      | D        | X        | X        | A     | A             | D      | A      | A        | X         | A         | A         |
| Tar and Tar Oil                    | X             | X          | A      | X            | C      | C        | D        | X        | X     | A             | A      | A      | A        | C         | B         | X         |
| Tar, Bituminous                    | B             | B          | A      | B/70°        | B      | C        | B/70°    | D        | A     | A             | A      | X      | A        | X         | A         | A         |
| Tartaric Acid                      | B             | A          | A      | A            | (B)    | A        | A        | C        | A     | A             | D      | A      | A        | D         | A         | A         |
| Terpene Monocyclic                 | X             | X          | A      | C/70°        | X      | A        | X        | D        | A     | X             | X      | X      | A        | D         | X         | X         |
| Terpineol                          | D             | B          | A      | B/70°        | X      | D        | B/70°    | C/70°    | A     | D             | X      | B/120° | A        | A         | A         | A         |
| Tertiary Butyl Alcohol             | D             | B          | A      | B            | X      | B        | D        | B/70°    | A     | B             | A      | X      | X        | X         | X         | X         |
| P-Tertiary Butyl Catechol          | X             | B          | A      | D            | X      | B        | X        | B/70°    | A     | X             | A      | X      | C        | B         | B         | X         |
| Tertiary Butyl Mercaptan           | X             | B          | A      | D            | X      | D        | D        | D        | A     | X             | B      | X      | X        | X         | X         | X         |
| Tetra Bromoethane                  | D             | D          | A      | D            | X      | D        | X        | D        | A     | D             | X      | X      | D        | X         | X         | X         |
| Tetrabutyl Titanate                | X             | B          | A      | B/70°        | X      | B        | X        | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| Tetrachlorodifluorethane           | D             | D          | A      | B            | X      | D        | X        | D        | X     | X             | X      | X      | X        | X         | X         | X         |
| Tetrachloroethylene                | D             | D          | A      | D            | X      | D        | D        | D        | A     | D             | A      | A/170° | D        | A         | A         | X         |
| Tetraethyl Lead                    | B             | C          | A      | B            | B      | C        | B        | D        | A     | A             | X      | A      | B        | A         | A         | X         |
| Tetraethylene Glycol               | X             | X          | A      | A            | X      | X        | X        | X        | A     | X             | X      | X      | X        | X         | X         | X         |
| Tetrahydrofuran                    | D             | B          | A      | D            | B      | D        | D        | D        | D     | C             | A      | B/70°  | X        | X         | A         | A         |
| Tetralin                           | D             | C          | A      | D            | X      | D        | D        | D        | A     | D             | X      | X      | A        | A         | A         | A         |
| Thiokol TP-90B                     | X             | X          | X      | D            | X      | B        | X        | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| TP-95                              | X             | X          | X      | D            | X      | B        | X        | A        | A     | X             | X      | X      | X        | X         | X         | X         |
| Thionyl Chloride                   | X             | X          | X      | X            | X      | X        | X        | X        | X     | B             | B      | D      | C        | D         | D         | A         |

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|--------------------------------------|---------------|------------|----------|--------------|----------|----------|--------------|----------|--------------|---------------|----------|----------|----------|-----------|-----------|-----------|
| Thiophene                            | D             | D          | A        | D            | X        | D        | X            | D        | C            | X             | X        | X        | X        | X         | X         | X         |
| Tin Tetrachloride                    | A             | X          | A        | A            | X        | D        | B/70°        | X        | X            | A             | X        | A        | D        | D         | D         | A         |
| Titanium Tetrachloride               | C             | D          | A        | B            | X        | D        | D            | D        | A            | D             | X        | B        | D        | A         | B         | B         |
| Toluene (Toluol)                     | C             | D          | A        | D            | C        | D        | D            | D        | B            | D             | A        | A        | A        | A         | A         | A         |
| Toluene Di-Isocyanate (Hylene)       | X             | B          | A        | D            | B        | D        | X            | A        | C            | X             | C        | X        | X        | X         | X         | X         |
| <b>Toluidine</b>                     | <b>X</b>      | <b>X</b>   | <b>A</b> | <b>D</b>     | <b>X</b> | <b>X</b> | <b>X</b>     | <b>X</b> | <b>B/70°</b> | <b>X</b>      | <b>X</b> | <b>X</b> | <b>A</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Tomato Pulp & Juice                  | A             | A          | A        | A            | X        | A        | A            | A        | A            | A             | A        | A        | B        | X         | A         | A         |
| Transformer Oils                     | B             | D          | A        | A            | X        | B        | A            | D        | A            | B/70°         | A        | A        | A        | A         | A         | A         |
| Transmission Fluid, Type A           | X             | C          | A        | A            | B        | B        | A            | D        | A            | X             | A        | X        | A        | A         | A         | A         |
| Triacetin                            | X             | A          | A        | B            | X        | B        | D            | A        | D            | X             | X        | X        | B        | X         | X         | X         |
| Triaryl Phosphate                    | D             | X          | A        | D            | X        | D        | D            | A        | A            | B             | X        | A        | X        | X         | X         | X         |
| <b>Tributoxyl Ethyl Phosphate</b>    | <b>X</b>      | <b>B</b>   | <b>A</b> | <b>D</b>     | <b>X</b> | <b>D</b> | <b>D</b>     | <b>A</b> | <b>A</b>     | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Tributyl Mercaptan                   | X             | B          | A        | D            | X        | D        | X            | D        | A            | X             | X        | X        | X        | X         | X         | X         |
| Tributyl Phosphate                   | D             | B          | A        | D            | C        | D        | D            | B        | D            | B             | X        | A        | A        | A         | A         | X         |
| Trichloroacetic Acid                 | D             | B          | A        | D            | D        | D        | D            | B/70°    | D            | B/140°        | D        | A/70°    | D        | D         | D         | B         |
| Trichlorobenzenes                    | X             | X          | A        | D            | X        | D        | D            | X        | A            | X             | X        | X        | D        | A         | A         | B         |
| Trichloroethane                      | D             | D          | A        | D            | D        | D        | D            | D        | A            | D             | A        | B/150°   | D        | A         | A         | A         |
| <b>Trichloroethylene (Triad)</b>     | <b>D</b>      | <b>D</b>   | <b>A</b> | <b>D</b>     | <b>D</b> | <b>D</b> | <b>D</b>     | <b>D</b> | <b>C</b>     | <b>C/70°</b>  | <b>B</b> | <b>A</b> | <b>B</b> | <b>B</b>  | <b>B</b>  | <b>B</b>  |
| Trichloromonofluoroethane (Freon 17) | D             | X          | X        | D            | X        | D        | X            | X        | X            | X             | X        | X        | A        | X         | A         | A         |
| Trichloropropane                     | D             | D          | A        | A            | X        | A        | A            | X        | A            | D             | A        | X        | D        | A         | A         | A         |
| Trichlorotrifluoroethane (Freon 113) | A             | D          | A        | A            | A        | A        | B            | D        | A            | A             | X        | A        | A        | A         | A         | A         |
| Tricresyl Phosphate                  | D             | B          | A        | D            | C        | C        | D            | A        | A            | B             | C        | D        | D        | A         | A         | A         |
| Tridecyl Alcohol (Tridecanol)        | X             | X          | A/170°   | A            | X        | X        | B            | X        | B/70°        | X             | X        | X        | X        | X         | X         | X         |
| <b>Triethanol Amine</b>              | <b>D</b>      | <b>A</b>   | <b>A</b> | <b>C</b>     | <b>C</b> | <b>A</b> | <b>D</b>     | <b>A</b> | <b>D</b>     | <b>A/70°</b>  | <b>A</b> | <b>A</b> | <b>B</b> | <b>A</b>  | <b>A</b>  | <b>A</b>  |
| Triethyl Aluminium                   | X             | B          | A        | D            | D        | D        | X            | X        | B/70°        | X             | X        | X        | X        | X         | X         | X         |
| Triethyl Amine                       | D             | D          | A        | A            | X        | B        | D            | A        | A            | C             | A        | A/120°   | X        | A         | A         | A         |
| Triethylene Glycol (TEG)             | A             | X          | A        | A            | X        | X        | X            | X        | A            | A             | X        | X        | X        | X         | X         | X         |
| Triethyl Borane                      | X             | B          | A        | D            | X        | D        | X            | X        | A            | X             | X        | X        | X        | X         | X         | X         |
| Trifluoroethane                      | X             | X          | A        | D            | X        | D        | D            | D        | A            | X             | X        | X        | X        | X         | X         | X         |
| <b>Trimethylene Glycol</b>           | <b>X</b>      | <b>X</b>   | <b>A</b> | <b>A</b>     | <b>X</b> | <b>X</b> | <b>X</b>     | <b>A</b> | <b>A</b>     | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Trinitrotoluene (TNT)                | X             | A          | A        | D            | X        | B        | X            | D        | B/70°        | X             | X        | X        | X        | X         | X         | X         |
| Trioctyl Phosphate                   | X             | B          | A        | D            | X        | D        | D            | A        | B            | X             | X        | X        | X        | X         | X         | X         |
| Triphenyl Phosphate                  | D             | X          | A        | D            | X        | X        | X            | X        | C/70°        | X             | X        | X        | X        | X         | X         | X         |
| Trisodium Phosphate                  | A             | A          | A        | A            | A        | A        | B            | A        | A            | A             | D        | A        | D        | A         | B         | A         |
| Tung Oil                             | D             | B          | A        | A            | (B)      | A        | B            | D        | A            | A             | X        | A        | A        | B         | A         | A         |
| <b>Turbine Oil</b>                   | <b>X</b>      | <b>X</b>   | <b>A</b> | <b>B</b>     | <b>X</b> | <b>B</b> | <b>A</b>     | <b>D</b> | <b>A</b>     | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Turbine Oil #15 (Mil -L-7808A)       | X             | X          | A        | B            | X        | D        | D            | D        | A            | X             | X        | X        | X        | X         | X         | X         |
| Turbo Oil #35                        | X             | X          | X        | A            | X        | B        | A            | D        | A            | X             | X        | X        | X        | X         | X         | X         |
| Turpentine                           | B             | D          | A        | A            | B        | D        | D            | D        | A            | B/120°        | A        | A        | A        | B         | A         | B         |
| Type 1 Fuel (Mil-S-3136)             | X             | D          | A        | A            | A        | A        | B            | D        | A            | X             | X        | X        | X        | X         | X         | X         |
| Type 11 Fuel (Mil-S-3136)            | X             | D          | A        | B            | X        | D        | B/70°        | D        | A            | X             | X        | X        | X        | X         | X         | X         |
| <b>Type 111 (Fuel Mil-S-3136)</b>    | <b>X</b>      | <b>D</b>   | <b>A</b> | <b>B</b>     | <b>A</b> | <b>D</b> | <b>B/70°</b> | <b>D</b> | <b>A</b>     | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Univis 40 (Hydr. Fluid)              | X             | D          | A        | A            | X        | B        | A            | D        | A            | X             | X        | X        | X        | X         | X         | X         |
| Univolt #35 (Mineral Oil)            | X             | C          | A        | A            | X        | B        | A            | D        | A            | X             | X        | X        | X        | X         | X         | X         |
| Unsymmetrical Dimethyl Hydrazine     | X             | B          | A        | B/70°        | X        | B        | D            | A        | D            | X             | X        | A/70°    | B        | A         | A         | X         |
| Urea (Carbamide)                     | B             | A          | A        | B            | B        | A        | B            | A        | A            | A             | A        | A        | B        | X         | B         | B         |
| Uric Acid                            | X             | X          | A        | X            | D        | X        | D            | X        | X            | D             | D        | D        | D        | X         | B         | B         |
| <b>Urine</b>                         | <b>A</b>      | <b>A</b>   | <b>A</b> | <b>A</b>     | <b>X</b> | <b>D</b> | <b>X</b>     | <b>A</b> | <b>A</b>     | <b>A</b>      | <b>C</b> | <b>A</b> | <b>B</b> | <b>B</b>  | <b>A</b>  | <b>A</b>  |

# Compatibility Guide

A=Excellent, B=Good, C=Fair to Poor, D=Not recommended

**Bold Headings = TPE** *Italic Headings = TS*

X or Brackets around a rating letter, no data is available, but the ratings are made on the basis of exposure test in similar chemical groups

\*All degrees are in Fahrenheit

| <b>MATERIAL</b>                 | <b>Nitrile (TPE)</b> | <b>Santoprene</b> | Teflon   | <i>Nitrile (TS)</i> | <b>Hytre</b> | Neoprene | Urethane | EPR,EPDM | Viton    | Polypropylene | Acetal   | PVDF     | Aluminum | Cast Iron | Stainless | Hastelloy |
|---------------------------------|----------------------|-------------------|----------|---------------------|--------------|----------|----------|----------|----------|---------------|----------|----------|----------|-----------|-----------|-----------|
| Valeric Acid                    | X                    | X                 | A        | D                   | X            | D        | X        | A        | X        | X             | X        | X        | A        | X         | X         | X         |
| Vanilla Extract                 | X                    | A                 | A        | A                   | X            | A        | X        | X        | X        | X             | X        | X        | X        | X         | A         | X         |
| Varnish                         | B/70°                | D                 | A        | B/70°               | X            | D        | B        | D        | A        | A             | X        | A        | A        | X         | A         | A         |
| Vegetable Juices                | X                    | A                 | D        | A                   | X            | B        | B        | A        | A        | X             | A        | X        | C        | X         | A         | X         |
| Vegetable Oil                   | A                    | A                 | A        | A                   | X            | B        | A        | A        | A        | A             | A        | A        | A        | B         | A         | A         |
| <b>Versilube</b>                | <b>X</b>             | <b>X</b>          | <b>A</b> | <b>A</b>            | <b>X</b>     | <b>A</b> | <b>A</b> | <b>A</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Versilube F-50                  | X                    | X                 | A        | A                   | X            | A        | A        | A        | A        | X             | X        | X        | X        | X         | X         | X         |
| Vinegar                         | B                    | A                 | A        | B/70°               | C            | B        | B        | A        | A        | A             | B        | A        | D        | C         | A         | A         |
| Vinyl Acetate                   | D                    | B                 | A        | D                   | X            | D        | D        | B        | A        | B/80°         | X        | A        | B        | A         | A         | A         |
| Vinyl Chloride (Chloroethylene) | X                    | X                 | A        | D                   | X            | D        | X        | C        | A        | D             | X        | A        | D        | B         | A         | A         |
| Walnut Oil                      | X                    | X                 | A        | A                   | X            | B        | X        | X        | A        | X             | X        | X        | X        | X         | X         | X         |
| <b>Water, Acid Mine</b>         | <b>A</b>             | <b>A</b>          | <b>A</b> | <b>A</b>            | <b>X</b>     | <b>C</b> | <b>C</b> | <b>A</b> | <b>A</b> | <b>A</b>      | <b>A</b> | <b>A</b> | <b>D</b> | <b>D</b>  | <b>A</b>  | <b>A</b>  |
| Water, Fresh                    | A                    | A                 | A        | A                   | A            | A        | A        | A        | B        | A             | A        | A        | A        | B         | A         | A         |
| Water, Distilled                | A                    | A                 | A        | A                   | X            | B        | A        | A        | A        | A             | A        | A        | B        | D         | A         | A         |
| Water, Salt                     | A                    | A                 | A        | A                   | A            | A        | B        | A        | A        | A             | A        | A        | D        | D         | C         | X         |
| Water-Brine, Process, Beverage  | X                    | A                 | D        | A                   | X            | A        | D        | A        | A        | X             | X        | X        | X        | X         | X         | X         |
| Waxes                           | D                    | X                 | A        | A                   | X            | A        | A        | B        | A        | D             | A        | D        | D        | D         | D         | A         |
| <b>Wemco C</b>                  | <b>X</b>             | <b>X</b>          | <b>A</b> | <b>A</b>            | <b>X</b>     | <b>B</b> | <b>A</b> | <b>D</b> | <b>A</b> | <b>X</b>      | <b>A</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>A</b>  | <b>X</b>  |
| Whey                            | A                    | A                 | X        | A                   | X            | X        | X        | X        | A        | X             | X        | X        | B        | X         | A         | X         |
| Whiskey and Wines               | A                    | A                 | A        | A                   | B            | A        | D        | A        | A        | A             | A        | A        | D        | D         | A         | A         |
| White Liquor (Pulp Mill)        | A                    | A                 | A        | A                   | X            | A        | D        | A        | A        | X             | X        | X        | X        | X         | X         | X         |
| White Pine Oil                  | X                    | A                 | A        | B/70°               | D            | D        | X        | D        | A        | X             | A        | X        | X        | X         | X         | X         |
| White Oil                       | X                    | C                 | A        | A                   | X            | B        | A        | D        | A        | X             | A        | X        | X        | X         | A         | A         |
| <b>Wolmar Salt</b>              | <b>X</b>             | <b>X</b>          | <b>A</b> | <b>A</b>            | <b>X</b>     | <b>B</b> | <b>A</b> | <b>A</b> | <b>A</b> | <b>X</b>      | <b>X</b> | <b>X</b> | <b>X</b> | <b>X</b>  | <b>X</b>  | <b>X</b>  |
| Wood Alcohol                    | X                    | X                 | A        | A                   | X            | A        | D        | A        | D        | X             | X        | X        | X        | X         | X         | X         |
| Wood Oil                        | X                    | X                 | A        | A                   | A            | D        | C/70°    | D        | A        | X             | X        | X        | A        | A         | A         | X         |
| Wort, Distillery                | X                    | X                 | X        | A                   | X            | B        | B/70°    | A        | A        | X             | X        | X        | A        | B         | A         | A         |
| Xylene (Xylol)                  | C                    | D                 | A        | D                   | B            | D        | D        | D        | A        | B             | A        | A        | A        | A         | A         | A         |
| Zeolites                        | X                    | A                 | A        | C                   | X            | C        | X        | A        | A        | X             | X        | X        | X        | X         | A         | A         |
| <b>Zinc Acetate</b>             | <b>B</b>             | <b>A</b>          | <b>A</b> | <b>B</b>            | <b>X</b>     | <b>B</b> | <b>D</b> | <b>A</b> | <b>B</b> | <b>A</b>      | <b>X</b> | <b>A</b> | <b>C</b> | <b>X</b>  | <b>A</b>  | <b>X</b>  |
| Zinc Carbonate                  | A                    | A                 | A        | A                   | X            | A        | A        | A        | A        | X             | X        | X        | B        | B         | B         | B         |
| Zinc Chloride                   | A                    | A                 | A        | A                   | A            | A        | A        | A        | A        | A             | D        | A        | D        | D         | C         | A         |
| Zinc Hydrosulphite              | A                    | A                 | (A)      | A                   | X            | A        | X        | A        | X        | X             | C        | A        | D        | X         | A         | X         |
| Zinc Salts                      | A                    | A                 | A        | A                   | X            | A        | A        | A        | A        | A             | X        | A        | X        | X         | X         | X         |
| Zinc Sulfate                    | A                    | A                 | A        | A                   | C            | A        | A        | A        | A        | A             | C        | A        | D        | D         | A         | A         |