

## **Frac Water Chemicals, PA DEP, From Material Safety Data Sheets.**

According to the full article, DEP supplied The River Reporter newspaper with a list of chemicals that may be used during the fracking process.

<http://www.riverreporter.com/issues/08-12-04/news-fracking.html>

### ***Chemical Components (From MSDS)***

**2.2-Dibromo-3-Nitrilopropionamide Glycol Ethers**  
**2-butoxyethanol Guar gum**  
**2-methyl-4-isothiazolin-3-one Hemicellulase Enzyme**  
**5-chloro-2-methyl-4-isothiazotin-3-one Hydrochloric Acid**  
**Acetic Acid Hydrotreated light distillate**  
**Acetic Anhydride Hydrotreated Light Distilled**  
**Alphatic Acid Isopropanol**  
**Alphatic Alcohol Polyglycol Ether Isopropyl Alcohol**  
**Ammonia Persulfate Magnesium Nitrate**  
**Aromatic Hydrocarbon Mesh Sand (Crystalline Silica)**  
**Aromatic Ketones Methanol**  
**Boric Acid Mineral Spirits**  
**Boric Oxide Monoethanolamine**  
**Butan-1-01 Petroleum Distillate Blend**  
**Citric Acid Petroleum Distillates**  
**Crystalline Silica: Cristobalite Polyethoxylated Alkanol (1)**  
**Crystalline Silica: Quartz Polyethoxylated Alkanol (2)**  
**Dazomet Polyethylene Glycol Mixture**  
**Diatomaceous Earth Polysaccharide**  
**Diesel (use discontinued) Potassium Carbonate**  
**Ethane-1,2-diol Potassium Hydroxide**  
**Ethoxylated Alcohol Prop-2-yn-1-01**  
**Ethoxylated Alcohol Propan-2-01**  
**Ethoxylated Octylphenol Propargyl Alcohol**  
**Ethylene Glycol Propylene**  
**Ethylhexanol Sodium Bicarbonate**  
**Ferrous Sulfate Heptahydrate Sodium Chloride**  
**Formaldehyde Sodium Hydroxide**  
**Glutaraldehyde Sucrose**  
**Tetramethylammonium Chloride**

### **Frac Stage #1**

Hydrochloric Acid  
Propargyl Alcohol  
Methanol  
Acetic Acid  
Acetic Anhydride

### **Frac Stage #2**

Methanol  
Boric Oxide  
Petroleum Distillate Blend  
Polysaccharide  
Potassium Carbonate  
Sodium Chloride  
Potassium Hydroxide  
Ethylene Glycol  
Boric Acid  
Sodium Bicarbonate  
Monoethanolamine

### **Frac Stage #3**

Hydrotreated light distillate  
Ethoxylated Alcohol  
Glutaraldehyde  
Dazomet  
Sodium Hydroxide  
Methanol  
Diesel (use discontinued)  
2,2-Dibromo-3-Nitrilopropionamide  
Polyethylene Glycol Mixture  
Mesh Sand (Crystalline Silica)

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It is up to the reader to fully research the accuracy of this  
listing.