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## SAFETY DATA SHEET

NEUSoft 30% BaSO4

Section 1. Identification	on	
GHS product identifier Chemical name CAS number Other means of identification Product type	::	NEUSoft 30% BaSO4 Mixture Mixture EM10032953 solid
<u>Relevant identified uses of the subs</u> Product use	tance:	or mixture and uses advised against Industrial applications. Plastics.
Supplier's details	:	<b>NEU Specialty Engineered Materials, LLC.</b> <b>15 Corporate Drive, North Haven, CT 06473</b> 1 (440) 930-1000 or 1 (866) POLYONE
Emergency telephone number (with hours of operation)	:	CHEMTREC 1-800-424-9300 (24hrs for spill, leak, fire, exposure or accident).CHEMTREC 1-800-424-9300 (24hrs for spill, leak, fire, exposure or accident).

## Section 2. Hazards identification

This mixture has not been evaluated as a whole. Information provided on the health effects of this product is based on individual components. All ingredients are bound and potential for hazardous exposure as shipped is minimal. However, some vapors may be released upon heating and the end-user (fabricator) must take the necessary precautions (mechanical ventilation, respiratory protection, etc.) to protect employees from exposure. After handling, always wash hands thoroughly with soap and water.

OSHA/HCS status	:	While this material is not considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200), this SDS contains valuable information critical to the safe handling and proper use of the product. This SDS should be retained and available for employees and other users of this product.
Classification of the substance or mixture	:	Not classified.
GHS label elements		
Signal word Hazard statements	:	No signal word. No known significant effects or critical hazards.

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#### **Precautionary statements**

General	:	Not applicable.
Prevention	:	Not applicable.
Response	:	Not applicable.
Storage	:	Not applicable.
Disposal	:	Not applicable.
Supplemental label elements	:	None known.
Hazards not otherwise classified	:	None known.

### Section 3. Composition/information on ingredients

Substance/mixture	:	Mixture
Chemical name	:	Mixture
Other means of identification	:	EM10032953

#### CAS number/other identifiers

Any concentration shown as a range is to protect confidentiality or is due to batch variation.

There are no ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified as hazardous to health or the environment, are PBTs, vPvBs or Substances of equivalent concern, or have been assigned a workplace exposure limit and hence require reporting in this section.

Occupational exposure limits, if available, are listed in Section 8.

#### **Section 4. First aid measures**

#### **Description of necessary first aid measures**

Eye contact	:	Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Get medical attention if irritation occurs.
Inhalation	:	Remove victim to fresh air and keep at rest in a position comfortable for breathing. Get medical attention if symptoms occur.
Skin contact	:	Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.
Ingestion	:	Wash out mouth with water. Remove victim to fresh air and keep at rest in a position comfortable for breathing. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Do not induce vomiting unless directed to do so by

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#### medical personnel. Get medical attention if symptoms occur.

#### Most important symptoms/effects, acute and delayed

#### Potential acute health effects

Eye contact	:	No known significant effects or critical hazards.
Inhalation	:	No known significant effects or critical hazards.
Skin contact	:	No known significant effects or critical hazards.
Ingestion	:	No known significant effects or critical hazards.
Over-exposure signs/symptoms	5	
Eye contact	:	No specific data.
Inhalation	:	No specific data.
Skin contact	:	No specific data.
Ingestion	:	No specific data.
Indication of immediate medic	al attentio	n and special treatment needed, if necessary
Notes to physician	:	Treat symptomatically. Contact poison treatment spec

Notes to physician	: Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.
Specific treatments	: No specific treatment.
Protection of first-aiders	: No action shall be taken involving any personal risk or without suitable training.

See toxicological information (Section 11)

## Section 5. Fire-fighting measures

#### **Extinguishing media**

Suitable extinguishing media Unsuitable extinguishing media	:	In case of fire, use water spray (fog), foam, dry chemical or $CO_2$ . None known.
Specific hazards arising from the chemical	:	No specific fire or explosion hazard.
Hazardous thermal decomposition products	:	No specific data.
Special protective actions for fire- fighters	:	Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.
Special protective equipment for fire-fighters	:	Fire-fighters should wear appropriate protective equipment and self- contained breathing apparatus (SCBA) with a full face-piece operated

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in positive pressure mode.

## Section 6. Accidental release measures

#### Personal precautions, protective equipment and emergency procedures

For non-emergency personnel For emergency responders	:	No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Put on appropriate personal protective equipment. If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".
Environmental precautions	:	Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).
Methods and materials for containme	ent a	nd cleaning up

Small spill	:	Move containers from spill area. Vacuum or sweep up material and place in a designated, labeled waste container. Dispose of via a licensed waste disposal contractor.
Large spill	:	Move containers from spill area. Prevent entry into sewers, water courses, basements or confined areas. Vacuum or sweep up material and place in a designated, labeled waste container. Dispose of via a licensed waste disposal contractor. Note: see Section 1 for emergency contact information and Section 13 for waste disposal.

## Section 7. Handling and storage

#### Precautions for safe handling

Protective measures Advice on general occupational hygiene	:	Put on appropriate personal protective equipment (see Section 8). Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.
Conditions for safe storage, including any incompatibilities	:	Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept

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upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination.

## Section 8. Exposure controls/personal protection

#### **Control parameters**

#### **Occupational exposure limits**

None. <b>Appropriate engineering controls</b>		Cood concerned wantilation should be sufficient to control worker
Environmental exposure controls	:	Good general ventilation should be sufficient to control worker exposure to airborne contaminants. Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.
Individual protection measures		
Hygiene measures Eye/face protection	:	Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location. Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: safety glasses with side-shields.
Skin protection		
Hand protection	:	Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary.
Body protection	:	Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
Other skin protection	:	Appropriate footwear and any additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
Respiratory protection	:	Use a properly fitted, particulate filter respirator complying with an approved standard if a risk assessment indicates this is necessary.
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Respirator selection must be based on known or anticipated exposure levels, the hazards of the product and the safe working limits of the selected respirator.

## Section 9. Physical and chemical properties

#### **Appearance**

Physical state	:	solid [Pellets.]
Color		NO PIGMENT
Odor		Faint odor.
Odor threshold		Not available.
pH	- I.	Not available.
Melting point		Not available.
Boiling point		Not available.
Flash point		Not available.
Burning time		Not available.
Burning rate		Not available.
Evaporation rate		Not available.
Flammability (solid, gas)		Not available.
Lower and upper explosive		Lower: Not available.
(flammable) limits		<b>Upper:</b> Not available.
Vapor pressure	:	Not available.
Vapor density		Not available.
Relative density		Not available.
Solubility		Not available.
Solubility in water	:	insoluble in water.
·		
Partition coefficient: n-	:	Not available.
octanol/water		
Auto-ignition temperature	:	Not available.
Decomposition temperature	:	Not available.
SADT	:	Not available.
Viscosity	:	Dynamic: Not available.
-		Kinematic: Not available.

## Section 10. Stability and reactivity

Reactivity	:	No specific test data related to reactivity available for this product or its ingredients.
Chemical stability	:	Stable under recommended storage and handling conditions (see Section 7).
Possibility of hazardous reactions	:	Under normal conditions of storage and use, hazardous reactions will not occur.
Conditions to avoid Incompatible materials	:	Keep away from extreme heat and oxidizing agents. Keep away from strong acids.

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		Oxidizer.
Hazardous decomposition products	:	Under normal conditions of storage and use, hazardous decomposition products should not be produced.

## Section 11. Toxicological information

This mixture has not been evaluated as a whole for health effects. Exposure effects listed are based on existing health data for the individual components which comprise the mixture.

#### **Information on toxicological effects**

Acute toxicity		
Conclusion/Summary	:	Mixture.Not fully tested.
Irritation/Corrosion		
Conclusion/Summary Skin Eyes Respiratory Sensitization	:	Mixture.Not fully tested. Mixture.Not fully tested. Mixture.Not fully tested.
Conclusion/Summary Skin Respiratory	:	Mixture.Not fully tested. Mixture.Not fully tested.
<u>Mutagenicity</u> Conclusion/Summary	:	Mixture.Not fully tested.
<u>Carcinogenicity</u> Conclusion/Summary	:	Mixture.Not fully tested.
<u>Reproductive toxicity</u> Conclusion/Summary	:	Mixture.Not fully tested.
<u>Teratogenicity</u>		
Conclusion/Summary	:	Mixture.Not fully tested.
Specific target organ toxicity (sin Not available.	ngle expo	<u>osure)</u>

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<b>Specific target organ toxicity (repea</b> Not available.	ited e	exposure)
Aspiration hazard Not available.		
Information on the likely routes of exposure	:	Not available.
Potential acute health effects		
Eye contact Inhalation Skin contact	:	No known significant effects or critical hazards. No known significant effects or critical hazards. No known significant effects or critical hazards.
Ingestion	:	No known significant effects or critical hazards.
Symptoms related to the physical, ch	nemi	cal and toxicological characteristics
Eye contact Inhalation Skin contact Ingestion <u>Delayed and immediate effects and a</u> <u>Short term exposure</u> Potential immediate effects Potential delayed effects	: : : 1 <u>lso c</u>	No specific data. No specific data. No specific data. No specific data. <b>Ehronic effects from short and long term exposure</b> Not available. Not available.
Long term exposure		
Potential immediate effects Potential delayed effects	:	Not available. Not available.
Potential chronic health effects		
Conclusion/Summary	:	Mixture.Not fully tested.
General	:	No known significant effects or critical hazards.

Numerical measures of toxicity

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#### Acute toxicity estimates

Not available.

## Section 12. Ecological information

**Toxicity** 

Product/ingredient name	Result	Species	Exposure
NEUSoft 30% BaSO4			
Remarks - Acute - Aquatic	Chemicals are not readil	y available as they are bound with	thin the polymer matrix.
invertebrates.:			
Conclusion/Summary	: Chemicals a polymer ma	re not readily available as they a trix.	are bound within the
Persistence and degradability			
Conclusion/Summary	: Chemicals a polymer ma	re not readily available as they a trix.	are bound within the
Conclusion/Summary	: Chemicals a polymer ma	re not readily available as they a trix.	are bound within the
Bioaccumulative potential <u>Mobility in soil</u>			
Soil/water partition coefficien (KOC)	nt : Not availabl	e.	
Other adverse effects	: No known s	ignificant effects or critical haza	ırds.

## Section 13. Disposal considerations

Disposal methods	:	The generation of waste should be avoided or minimized wherever possible. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. This material and its container must be
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disposed of in a safe way. Empty containers or liners may retain some product residues. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

United States - RCRA Acute hazardous waste "P" List: Not listed

United States - RCRA Toxic hazardous waste "U" List: Not listed

#### **Section 14. Transport information**

U.S. DOT Classification	:	Not regulated for transportation.
ICAO/IATA	:	Not classified as dangerous good under transport regulations.
IMO/IMDG (maritime)	:	Not classified as dangerous good under transport regulations.

## Section 15. Regulatory information

U.S. Federal regulations	:	<b>United States - TSCA 12(b) - Chemical export notification:</b> None of the components are listed.
		United States - TSCA 4(a) - Final Test Rules: Not listed
		United States - TSCA 4(a) - Final Fest Rules. Not listed
		United States - TSCA 4(a) - Free Friendly list. Not listed
		United States - TSCA 4(a) - Priority risk review: Not listed
		United States - TSCA 4(1) - Final significant new use rules: Not
		listed
		United States - TSCA 5(a)2 - Proposed significant new use rules:
		Not listed
		United States - TSCA 5(e) - Substances consent order: Not listed
		United States - TSCA 6 - Final risk management: Not listed
		United States - TSCA 6 - Proposed risk management: Not listed
		United States - TSCA 8(a) - Chemical risk rules: Not listed
		United States - TSCA 8(a) - Dioxin/Furane precusor: Not listed
		United States - TSCA 8(a) - Chemical Data Reporting (CDR): Not determined
		United States - TSCA 8(a) - Preliminary assessment report
		(PAIR): Not listed
		United States - TSCA 8(c) - Significant adverse reaction (SAR):
		Not listed
		United States - TSCA 8(d) - Health and safety studies: Not listed
		United States - EPA Clean water act (CWA) section 307 - Priority
		pollutants: Not listed
		United States - EPA Clean water act (CWA) section 311 -
		Hazardous substances: Not listed
		United States - EPA Clean air act (CAA) section 112 - Accidental
		release prevention - Flammable substances: Not listed

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		United States - EPA Clean air act (CAA) section 112 - Accidental release prevention - Toxic substances: Not listed United States - Department of commerce - Precursor chemical: Not listed	
Clean Air Act Section 112(b) Hazardous Air Pollutants (HAPs)	:	Not listed	
Clean Air Act Section 602 Class I Substances	:	Not listed	
Clean Air Act Section 602 Class II Substances	:	Not listed	
DEA List I Chemicals (Precursor Chemicals)	:	Not listed	
DEA List II Chemicals (Essential Chemicals)	:	Not listed	
US. EPA CERCLA Hazardous Substances (40 CFR 302)			
not applicable SARA 311/312			
Classification	:	Not applicable.	
Composition/information on ingredia No products were found. SARA 313 Not applicable.	<u>ents</u>		
<u>State regulations</u> Massachusetts	:	The following components are listed: Barium sulfate	

Massachusetts	: The following components are listed: Barium sulfate
New York	: None of the components are listed.
New Jersey	: The following components are listed: Barium sulfate
Pennsylvania	: The following components are listed: Barium sulfate

#### California Prop. 65

This PolyOne product does not contain any chemical known to the State of California to cause cancer, or birth defects or other reproductive harm, in concentrations that require a warning notice under California's Proposition 65. This statement relies in part on information provided by the buyer of this PolyOne product. PolyOne does not control or have complete knowledge of the end uses to which that buyer or any other entity in the chain of distribution and marketing may put this PolyOne product. Therefore, the buyer of this PolyOne product, each entity that uses this PolyOne product in formulating another product, and each entity in the chain of distribution and marketing of any product that includes the material in this PolyOne product must make its own decision as to giving a Proposition 65 warning.

United States inventory (TSCA 8b) : All components are listed or exempted.

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Canada inventory	:	At least one component is not listed in DSL but all such components are listed in NDSL.
International regulations		
International lists	:	<ul> <li>Australia inventory (AICS): Not determined.</li> <li>Taiwan inventory (CSNN): Not determined.</li> <li>Malaysia Inventory (EHS Register): Not determined.</li> <li>EINECS: All components are listed or exempted.</li> <li>Japan inventory: Not determined.</li> <li>China inventory (IECSC): All components are listed or exempted.</li> <li>Korea inventory: All components are listed or exempted.</li> <li>New Zealand Inventory of Chemicals (NZIoC): Not determined.</li> <li>Philippines inventory (PICCS): Not determined.</li> </ul>
Chemical Weapons Convention List Schedule I Chemicals	:	Not listed
<b>Chemical Weapons Convention</b>	:	Not listed
List Schedule II Chemicals Chemical Weapons Convention List Schedule III Chemicals	:	Not listed

### Section 16. Other information

<u>History</u>		
Date of printing	:	10/14/2015
Date of issue/Date of revision	:	10/13/2015
Date of previous issue	:	06/30/2014
Version	:	1.1
Key to abbreviations	:	ATE = Acute Toxicity Estimate BCF = Bioconcentration Factor GHS = Globally Harmonized System of Classification and Labelling of Chemicals IATA = International Air Transport Association IBC = Internediate Bulk Container IMDG = International Maritime Dangerous Goods LogPow = logarithm of the octanol/water partition coefficient MARPOL 73/78 = International Convention for the Prevention of Pollution From Ships, 1973 as modified by the Protocol of 1978. ("Marpol" = marine pollution) UN = United Nations
References	:	Not available.

#### Notice to reader

To the best of our knowledge, the information contained herein is accurate. However, neither the abovenamed supplier, nor any of its subsidiaries, assumes any liability whatsoever for the accuracy or completeness of the information contained herein. Final determination of suitability of any material is the

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sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards that exist. Particularly this information may not be valid for such material used in conjunction with any other materials or in any process, unless specified in the text.