

# Material Safety Data Sheet

Canada  
English

## 1 . Product and company identification

|                              |   |  |
|------------------------------|---|--|
| <b>Product name</b>          | DARVAN® 7-N   | <u><a href="#">In case of emergency</a></u>                                  |
| <b>Supplier/Manufacturer</b> | Vanderbilt Minerals, LLC<br>30 Winfield Street<br>Norwalk, CT 06855 | 1-203-295-2140<br>Chemtrec: 1-800-424-9300<br>Outside US:<br>+1-703-527-3887 |
| <b>Chemical name</b>         | Not available.  |  |
| <b>Synonym</b>               | Sodium polymethacrylate and water                                   |  |
| <b>Material uses</b>         | Dispersing agent.   |  |
| <b>Code</b>                  | 14395   |  |

## 2 . Hazards identification

|                           |  |
|---------------------------|--|
| <b>Physical state</b>     | Liquid.  |
| <b>Color</b>              | Colorless.   |
| <b>Odor</b>               | None.  |
| <b>Emergency overview</b> | <b>CAUTION!</b><br><b>MAY CAUSE SKIN IRRITATION.</b><br>Avoid contact with skin.<br><br>Keep container closed. Use only with adequate ventilation. Wash thoroughly after handling. |
| <b>Routes of entry</b>    | Dermal contact. Eye contact. Inhalation.   |

See toxicological information (Section 11)

## 3 . Composition/information on ingredients

| <u>Name</u>             | <u>CAS number</u> | <u>% by weight</u> |
|-------------------------|-------------------|--------------------|
| water                   | 7732-18-5         | 74 - 76            |
| sodium polymethacrylate | 54193-36-1        | 24 - 26            |

## 4 . First aid measures

|                                   |  |
|-----------------------------------|--|
| <b>Eye contact</b>                | Check for and remove any contact lenses. Immediately flush eyes with plenty of water for at least 15 minutes, occasionally lifting the upper and lower eyelids. Get medical attention if symptoms occur.   |
| <b>Skin contact</b>               | In case of contact, immediately flush skin with plenty of water for at least 15 minutes while removing contaminated clothing and shoes. Wash clothing before reuse. Clean shoes thoroughly before reuse. Get medical attention if symptoms occur.                                      |
| <b>Inhalation</b>                 | Move exposed person to fresh air. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. Loosen tight clothing such as a collar, tie, belt or waistband. Get medical attention if symptoms occur. |
| <b>Ingestion</b>                  | Wash out mouth with water. Do not induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. Get medical attention if symptoms occur.   |
| <b>Protection of first-aiders</b> | No action shall be taken involving any personal risk or without suitable training.   |

## 4 . First aid measures

**Notes to physician** No specific treatment. Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.

## 5 . Fire-fighting measures

**Flammability of the product** In a fire or if heated, a pressure increase will occur and the container may burst.

### Extinguishing media

**Suitable**

Use an extinguishing agent suitable for the surrounding fire.

**Not suitable**

None known.

**Special exposure hazards**

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.

**Hazardous thermal decomposition products**

Decomposition products may include the following materials:  
carbon dioxide  
carbon monoxide  
metal oxide/oxides

**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 in positive pressure mode.

**Special remarks on fire hazards**

When water has evaporated, the residue will burn. Containers may explode (due to build-up of pressure) when exposed to extreme heat.

## 6 . Accidental release measures

**Personal precautions**

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 (see Section 8).

**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 for cleaning up

**Small spill**

Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.

**Large spill**

Stop leak if without risk. Move containers from spill area. Prevent entry into sewers, water courses, basements or confined areas. Wash spillages into an effluent treatment plant or proceed as follows. Contain and collect spillage with non-combustible, absorbent material e.g. sand, earth, vermiculite or diatomaceous earth and place in container for disposal according to local regulations (see Section 13). Dispose of via a licensed waste disposal contractor. Note: see Section 1 for emergency contact information and Section 13 for waste disposal.

## 7 . Handling and storage

**Handling**

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.

**Storage**

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

## 8 . Exposure controls/personal protection

| Occupational exposure limits   |           | TWA (8 hours) |                   |       | STEL (15 mins) |                   |       | Ceiling |                   |       |           |
|--------------------------------|-----------|---------------|-------------------|-------|----------------|-------------------|-------|---------|-------------------|-------|-----------|
| Ingredient                     | List name | ppm           | mg/m <sup>3</sup> | Other | ppm            | mg/m <sup>3</sup> | Other | ppm     | mg/m <sup>3</sup> | Other | Notations |
| No exposure limit value known. |           |               |                   |       |                |                   |       |         |                   |       |           |

### Consult local authorities for acceptable exposure limits.

#### Recommended monitoring procedures

If this product contains ingredients with exposure limits, personal, workplace atmosphere or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment. Reference should be made to appropriate monitoring standards. Reference to national guidance documents for methods for the determination of hazardous substances will also be required.

#### Engineering measures

Good general ventilation should be sufficient to control worker exposure to airborne contaminants.

#### Hygiene measures

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.

#### Personal protection

##### Respiratory

Use a properly fitted, air-purifying or air-fed respirator complying with an approved standard if a risk assessment indicates this is necessary. 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.

##### Hands

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.

Recommended: Protective gloves should be worn under normal conditions of use.

##### Eyes

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 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. Recommended: splash goggles

##### Skin

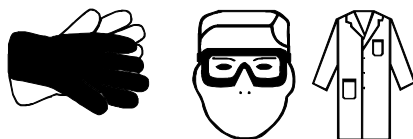
Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.

Recommended: lab coat

#### Environmental exposure controls

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.

#### Personal protective equipment (Pictograms)



## 9 . Physical and chemical properties

|                                  |  |
|----------------------------------|--|
| <b>Physical state</b>            | Liquid.  |
| <b>Color</b>                     | Colorless.   |
| <b>Odor</b>                      | None.  |
| <b>pH</b>                        | 9 to 11.5  |
| <b>Boiling point</b>             | >100°C (>212°F)  |
| <b>Flash point</b>               | Closed cup: >93°C (>199.4°F) [Pensky-Martens.]   |
| <b>Evaporation rate</b>          | <1 (butyl acetate = 1)   |
| <b>Flammability (solid, gas)</b> | When water has evaporated, the residue will burn. Containers may explode (due to build-up of pressure) when exposed to extreme heat. |
| <b>Vapor density</b>             | >1 [Air = 1]   |
| <b>Density</b>                   | 1.13 to 1.17 g/cm <sup>3</sup>   |
| <b>Relative density</b>          | 1.13 to 1.17   |
| <b>Solubility</b>                | Soluble in the following materials: cold water.  |

## 10 . Stability and reactivity

|  |  |
|--|--|
| <b>Chemical stability</b>                      | The product is stable.   |
| <b>Possibility of hazardous reactions</b>      | Under normal conditions of storage and use, hazardous reactions will not occur.  |
| <b>Hazardous polymerization</b>                | Under normal conditions of storage and use, hazardous polymerization will not occur.   |
| <b>Conditions to avoid</b>                     | No specific data.  |
| <b>Materials to avoid</b>                      | No specific data.  |
| <b>Hazardous decomposition products</b>        | Under normal conditions of storage and use, hazardous decomposition products should not be produced.                                 |
| <b>Incompatibility with various substances</b> | Reactive or incompatible with the following materials: oxidizing materials.  |
| <b>Conditions of reactivity</b>                | When water has evaporated, the residue will burn. Containers may explode (due to build-up of pressure) when exposed to extreme heat. |

## 11 . Toxicological information

### Acute toxicity

| <b>Product/ingredient name</b> | <b>Result</b> | <b>Species</b> | <b>Dose</b>  | <b>Exposure</b> |
|--------------------------------|---------------|----------------|--------------|-----------------|
| DARVAN® 7-N                    | LD50 Dermal   | Rabbit         | >5000 mg/kg  | -               |
|                                | LD50 Oral     | Rat            | >20000 mg/kg | -               |

**Conclusion/Summary** Not available.

### Chronic toxicity

**Conclusion/Summary** Not available.

### Irritation/Corrosion

#### **Conclusion/Summary**

**Skin** May cause skin irritation. (Primary skin irritation index (rabbits): 0.25)

**Eyes** Non-irritating to the eyes. (Rabbit)

### Sensitizer

**Conclusion/Summary** Not available.

### Carcinogenicity

**Conclusion/Summary** Not available.

### Mutagenicity

## 11 . Toxicological information

|                                     |                |
|-------------------------------------|----------------|
| <b>Conclusion/Summary</b>           | Not available. |
| <b><u>Teratogenicity</u></b>        |                |
| <b>Conclusion/Summary</b>           | Not available. |
| <b><u>Reproductive toxicity</u></b> |                |
| <b>Conclusion/Summary</b>           | Not available. |
| <b>Other information</b>            | Not available. |

## 12 . Ecological information

|                                   |   |
|-----------------------------------|---|
| <b>Environmental effects</b>      | No known significant effects or critical hazards. |
| <b><u>Aquatic ecotoxicity</u></b> |   |
| <b>Conclusion/Summary</b>         | Not available.                                    |
| <b><u>Biodegradability</u></b>    |   |
| <b>Conclusion/Summary</b>         | Not available.                                    |
| <b>Other adverse effects</b>      | No known significant effects or critical hazards. |

## 13 . Disposal considerations

|                       |  |
|-----------------------|--|
| <b>Waste disposal</b> | 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 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. |
|-----------------------|--|

Disposal should be in accordance with applicable regional, national and local laws and regulations.

## 14 . Transport information

| Regulatory information    | UN number      | Proper shipping name | Classes | PG* | Label | Additional information |
|---------------------------|----------------|----------------------|---------|-----|-------|------------------------|
| <b>DOT Classification</b> | Not regulated. | -                    | -       | -   |       | -                      |
| <b>TDG Classification</b> | Not regulated. | -                    | -       | -   |       | -                      |
| <b>ADR/RID Class</b>      | Not regulated. | -                    | -       | -   |       | -                      |
| <b>IMDG Class</b>         | Not regulated. | -                    | -       | -   |       | -                      |
| <b>IATA-DGR Class</b>     | Not regulated. | -                    | -       | -   |       | -                      |

PG\* : Packing group

## 15 . Regulatory information

**WHMIS (Canada)**

Not controlled under WHMIS (Canada).

**WHMIS (Canada)  
(Pictograms)**



**Canadian lists**

**CEPA Toxic substances:** None of the components are listed.  
**Canadian ARET:** None of the components are listed.  
**Canadian NPRI:** None of the components are listed.  
**Alberta Designated Substances:** None of the components are listed.  
**Ontario Designated Substances:** None of the components are listed.  
**Quebec Designated Substances:** None of the components are listed.

**Canada inventory**

All components are listed or exempted.

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations and the MSDS contains all the information required by the Controlled Products Regulations.

**International regulations**

**International lists**

**United States inventory (TSCA 8b):** All components are listed or exempted.  
**Europe inventory:** All components are listed or exempted.  
**Australia inventory (AICS):** All components are listed or exempted.  
**China inventory (IECSC):** All components are listed or exempted.  
**Japan inventory:** All components are listed or exempted.  
**Korea inventory:** All components are listed or exempted.  
**Malaysia Inventory (EHS Register):** Not determined.  
**New Zealand Inventory of Chemicals (NZIoC):** All components are listed or exempted.  
**Philippines inventory (PICCS):** All components are listed or exempted.  
**Taiwan inventory (CSNN):** Not determined.

## 16 . Other information

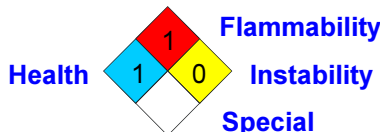
**Hazardous Material Identification System (U.S.A.)**

|                     |   |
|---------------------|---|
| Health              | 1 |
| Flammability        | 1 |
| Physical hazards    | 0 |
| Personal protection |   |

\* Chronic Potential

The customer is responsible for determining the PPE code for this material.

**National Fire Protection Association (U.S.A.)**



**Validation date** 4/17/2014.

**Print date** 4/17/2014.

**Date of previous issue** 5/14/2013.

**Information contact** **Vanderbilt Global Services, LLC  
Corporate Risk Management  
1-203-295-2143**

✔ Indicates information that has changed from previously issued version.

## 16 . Other information

Visit [www.vanderbiltminerals.com](http://www.vanderbiltminerals.com) for more information.

### Notice to reader

Information presented herein has been compiled from sources considered to be dependable and is accurate and reliable to the best of our knowledge and belief but is not guaranteed to be so. Nothing herein is to be construed as recommending any practice or any product in violation of any patent or in violation of any law or regulation. It is the user's responsibility to determine for himself the suitability of any material for a specific purpose and to adopt such safety precautions as may be necessary. We make no warranty as to the results to be obtained in using any material and, since conditions of use are not under our control, we must necessarily disclaim all liability with respect to the use of any material supplied by us.