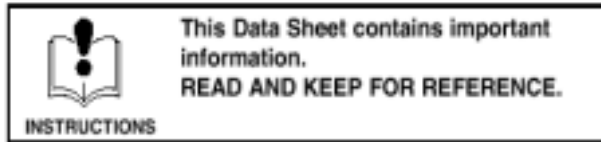


Material Safety Data Sheet



MSD035

Rev. A
Updated: 3/04



1.0 CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Product Name: Desiccant Drying Media
Chemical Name: Amorphous Silicon Dioxide

Graco Inc.
P.O. Box 1441
60 11th Ave. NE
Minneapolis, MN 55440-1441

Emergency Information

Health Emergency (RMPC): (303)- 623-5716

Chemical Spills (Chemtrec): (800)- 424-9300

Part Number(s): 297209

Use: Drying moisture from air.

**CHEMICAL NAME
FAMILY:**

Synthetic Amorphous

SYNONYMS:

Amorphous Silicon Dioxide, Silica Gel, Silicic Acid
TEL-TALE® Indicating Gel

**CHEMICAL NOTATION
OR STRUCTURE:**

$\text{SiO}_2, x\text{H}_2\text{O} + \text{CoCl}_2$

INGREDIENTS:

Amorphous Silica, Cobalt Chloride (CoCl_2)

Synthetic amorphous silica, not to be confused with crystalline silica such as quartz, cristobalite or tridymite or with diatomaceous earth or other naturally occurring forms of amorphous silica that frequently contain crystalline forms

CAS REGISTRY NO:

Silica Gel: 63231-67-4 (Revised 1990 SiO_2 : 112926-00-8)
Cobalt Chloride: 7646-79-9

RTECS NO:

VV7322000 (Silica Gel)
GF9800000 (Cobalt Chloride)

HEALTH INFORMATION

PRECAUTIONS IN USE:

Avoid prolonged breathing of the dust or contact of dust with the skin. The drying action of this material can cause irritation of the mucous membranes of the nose and throat and irritation of the skin. If its use requires manual handling, wear long sleeves and close-weave cotton gloves with tight-fitting wristlets. If dusty conditions prevail, use of an approved NIOSH/MSHA dust mask is recommended.

When pouring into a container of flammable liquid, ground both containers electrically to prevent a static electric spark.

FIRST AID:

EYES: Immediately wash from eyes with large amounts of water, occasionally lifting upper & lower eye lids. If irritation occurs and persists, seek medical attention.

SKIN: Wash with soap & water.

INGESTION: Material will pass through body normally.

INHALATION: Remove to fresh air.

TOXICOLOGY

ANIMAL TOXICOLOGY

TESTS FOR DOT HAZARD CLASSIFICATION:

48-hour oral LD₅₀ (rat) est. > 31,600 mg/kg

48-hour dermal LD₅₀ (rabbit) est. > 2,000 mg/kg

Not considered an ocular irritant.

TESTS FOR FDA APPROVAL FOR USE IN FOODS: Not a food-grade product.

Cobalt chloride is considered GRAS (generally recognized as safe) as a trace mineral added to animal feeds (approximately 10 PPM) by FDA

HUMAN TOXICOLOGY:

Silica gel is a synthetic amorphous silica not to be confused with crystalline silica. Epidemiological studies indicate low potential for adverse health effects. Silica gel is considered by Davison to be a nuisance dust. In the activated form, silica gel acts as a desiccant and can cause a drying irritation of the mucous membranes and skin in cases of severe exposure. Cobalt chloride can cause dermatitis and irritation of nasal passages and lungs. Davison knows of no medical conditions abnormally aggravated by exposure to this product. The primary route of entry is inhalation.

ENVIRONMENTAL DATA

Not known to have any adverse effect on the aquatic environment. The silica base is insoluble and nontoxic. Cobalt chloride may leach away if contacted with water.

TYPICAL CHEMICAL & PHYSICAL INFORMATION

APPEARANCE:	Clear blue granules
pH IN 5% SLURRY:	Approximately 6.5 -7.5
ODOR:	None
SPECIFIC GRAVITY:	2.1
BULK DENSITY:	Approximately 47-48 lbs/ft. ³
SOLUBILITY IN WATER:	Silica gel base insoluble Cobalt chloride may leach out.
APPROXIMATE ANALYSIS:	SiO ₂ (Ignited Basis) - 99.7 (CoCl ₂ sublimes) LOI @ 1760 F - 6.5% Crystalline Silica - Not detectable Cobalt Chloride - 0.9%
STABILITY:	Stable
REACTIVITY:	Reacts with HF
FIRE & EXPLOSION DATA:	Non-flammable

REGULATORY STATUS

OSHA-	Silica gel - PEL = 6 mg/m ³ Cobalt chloride - PEL = not listed in 29 CFR 1910.1000.
NIOSH-	Silica Gel - Animal tests conducted in 1976-78. 18 month exposure at 15 mg/m ³ showed silica deposition in respiratory macrophages and lymph nodes, minimis lung function impairment, and no silicosis.
EPA-	This product contains no toxic chemicals in excess of the applicable de minimis concentration as specified under § 313 of Title III SARA.
ACGIH-	Silica Gel - TLV = 10 mg/m ³ (Silica gel); Cobalt Chloride - TLV = not listed.
USDA-	Not applicable
FDA-	Not a food-grade product. For food or pharmaceutical use, FP grades of Syloid should be specified.
DOT-	Not classified as a hazardous material.

HANDLING INFORMATION

STORAGE AND TRANSPORTATION:	Keep containers tightly sealed to protect product quality.
DISPOSAL:	Dispose in an approved landfill according to federal, state and local regulations. Cover promptly to avoid blowing of dust.
SPILLAGE AND CLEANUP:	Sweep or vacuum up.
CONTAINERS:	Drums, cans.

SPECIAL INFORMATION

Prepared By: Joe Tix	Graco, Inc.
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This Material Safety Data Sheet and the information it contains is offered to you in good faith as accurate. We have reviewed any information contained in this data sheet which we have received from sources outside our company. We believe that information to be correct, but cannot guarantee its accuracy or completeness. Health and safety precautions in this Data Sheet may not be adequate for all individuals and/or situations. It is the users' obligation to evaluate and use this product safely and to comply with all applicable laws and regulations. No statement made in this data sheet shall be construed as a permission or recommendation for the use of any product in a manner that might infringe existing patents. No warranty is made, either express or implied.

NOTES: NA = Not Applicable; NE = Not Established; UN = Unavailable

All written and visual data contained in this document reflects the latest product information available at the time of publication.

Graco reserves the right to make changes at any time without notice.

Sales Offices: Minneapolis, Detroit,

International Offices: Belgium, Korea, Hong Kong, Japan

GRACO INC. P.O. BOX 1441 MINNEAPOLIS, MN 55440-1441

www.graco.com

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