

# SAFETY DATA SHEET DEPOSITROL\* PY5203

## 1. Product and Company Identification

Material name	DEPOSITROL PY5203
Version #	2.0
Revision date	04/02/2014
Supersedes date	12/05/2011
Chemical description	Polyacrylic acid, aqueous solution
CAS #	Mixture
Product application	Deposit control agent

#### Company/undertaking identification

GE Betz, Inc. 4636 Somerton Road Trevose, PA 19053 T 215 355 3300, F 215 953 5524

#### Emergency telephone

(800) 877 1940

2. Hazards Identification	
Emergency overview	CAUTION
	Acidic. May cause slight irritation to the skin. May cause slight irritation to the eyes. Vapors, gases, mists or aerosols may cause slight irritation to the upper respiratory tract.
Potential health effects	
Eyes	May cause slight irritation to the eyes.
Skin	May cause slight irritation to the skin.
Inhalation	Primary route of exposure Vapors, gases, mists or aerosols may cause slight irritation to the upper respiratory tract.
Ingestion	No evidence of adverse effects from available information. May cause slight gastrointestinal irritation.
Target organs	No evidence of potential chronic effects.
Signs and symptoms	May cause redness or itching of skin. Inhalation may cause irritation of respiratory tract.
Medical conditions aggravated by exposure	None known.

# 3. Composition / Information on Ingredients

Non-hazardous components	CAS #
Polyacrylic acid	9003-01-4
Water	7732-18-5
Sodium sulphate	7757-82-6

Information for specific product ingredients as required by the U.S. OSHA HAZARD COMMUNICATION STANDARD is listed. Refer to additional sections of this MSDS for our assessment of the potential hazards of this formulation. Percentages are all expressed as wt/wt.

### 4 First Aid Measures

4. First Aid Measures	
First aid procedures	
Eye contact	If easy to do remove contact lenses. Keep eyelids apart. Flush immediately with plenty of running water. Immediately contact a physician for additional treatment.
Skin contact	Wash with water. Remove contaminated clothing. If irritation persists, seek medical advice.
Inhalation	Remove to fresh air. Seek medical attention.
Ingestion	Do not feed anything by mouth to an unconscious or convulsive victim. Do NOT induce vomiting! Immediately contact a physician. If the victim is fully conscious dilute contents of stomach using 3-4 glasses of water.
Notes to physician	No special instructions.
5. Fire Fighting Measures	
Extinguishing media	
Suitable extinguishing media	Carbon dioxide, dry chemicals, foam, water spray (fog).
Unsuitable extinguishing media	None.
Protection of firefighters	
Protection of firefighters Specific hazards arising from the chemical	Acidic. Fire may produce irritating, corrosive and/or toxic gases. Oxides of carbon evolved in fire.
Specific hazards arising from	Acidic. Fire may produce irritating, corrosive and/or toxic gases. Oxides of carbon evolved in fire. Wear full protective clothing, including helmet, self-contained positive pressure or pressure demand breathing apparatus, protective clothing and face mask.
Specific hazards arising from the chemical Protective equipment and	Wear full protective clothing, including helmet, self-contained positive pressure or pressure demand

### 6. Accidental Release Measures

Personal precautions	Acidic. Avoid inhalation of vapors or mists. Protective clothing. Please refer also to section no. 8 'Exposure controls' for further information.
Environmental precautions	Prevent from entering sewers or the immediate environment. Accidental release of large quantities into the aquatic environment may harm aquatic organisms.
Methods for cleaning up	Spills of the product are very slippery. Absorb onto inert material and dispose of according to Controlled Waste Regulations. Remove small spills with plenty of water. Place in waste disposal container. Spread sand/grit.

## 7. Handling and Storage

Handling	Acidic. Do not mix with alkaline material.
Storage	Store containers closed when not in use. Protect from freezing. Do not store at elevated temperatures.

## 8. Exposure Controls / Personal Protection

Engineering controls	Handle in accordance with good industrial hygiene and safety procedures.	
Personal protective equipment		
Eye / face protection	Safety goggles. or Splash proof chemical goggles.	
Skin protection	Rubber, butyl, viton or neoprene gloves. Wash off after each use. Replace as necessary.	
Respiratory protection	If air-purifying respirator use is appropriate, use a respirator with acid gas cartridges and dust/mist prefilters.	
General hygiene considerations	Wash hands after handling.	
Material name: DEPOSITROL* PY5203	Page: 2	

# 9. Physical & Chemical Properties

•	
Appearance	
Physical state	Liquid
Color	Colorless to yellow
Odor	Mild
Odor threshold	Not available.
pH (concentrated product)	2.4
pH in aqueous solution	2.7 (5% SOL.)
Vapor pressure	18 mm Hg
Vapor pressure temp.	70 °F (21 °C)
Vapor density	< 1 (Air = 1)
Boiling point	212 °F (100 °C)
Melting point/Freezing point	28 °F (-2 °C)
Solubility (water)	100 %
Specific gravity (70°F, 21°C)	1.203
Flash point	> 200 °F (> 93 °C) P-M(CC)
Flammability limits in air, upper, % by volume	Not available.
Flammability limits in air, lower, % by volume	Not available.
Auto-ignition temperature	Not available.
Evaporation rate	< 1 (Ether = 1)
Viscosity	490 cps
Viscosity temperature	70 °F (21 °C)
Percent volatile	0 (Estimated)
Pour point	33 °F (1 °C)

# 10. Chemical Stability & Reactivity Information

Chemical stability	Stable under normal storage conditions.
Conditions to avoid	Protect from freezing. Avoid storage below 10°C
Incompatible materials	Avoid contact with strong oxidizers. Avoid contact with strong bases. Contact with strong bases may cause a violent reaction releasing heat.
Hazardous decomposition products	Oxides of carbon evolved in fire.

# 11. Toxicological Information

### Toxicological data

Product	Species	Test Results
DEPOSITROL PY5203 (CAS M	1ixture)	
Acute		
Dermal		
LD50	Rabbit	2025 mg/kg
Oral		
LD50	Rat	> 5000 mg/kg
Carcinogenicity		
IARC Monographs. Ov	erall Evaluation of Carcinogenicity	

Polyacrylic acid (CAS 9003-01-4)

Skin corrosion/irritation

3 Not classifiable as to carcinogenicity to humans.

	Species	Test Results
Mixture)		
0% Mortality	Sheepshead Minnow	16000 mg/L, Static Acute Bioassay, 96 hour, (pH adjusted)
LC50	Ceriodaphnia	640 mg/L, Static Renewal Bioassay, 48 hour, (pH adjusted)
	Fathead Minnow	7500 mg/L, Static Renewal Bioassay, 96 hour, (pH adjusted)
	Mysid Shrimp	3250 mg/L, Static Acute Bioassay, 48 hour (pH adjusted)
NOEL	Ceriodaphnia	87 mg/L, Static Renewal Bioassay, 48 hou (pH adjusted)
	Fathead Minnow	2100 mg/L, Static Renewal Bioassay, 96 hour, (pH adjusted)
	Mysid Shrimp	1000 mg/L, Static Acute Bioassay, 48 hour (pH adjusted)
LC50	Daphnia magna	1045 mg/L, Static Renewal Bioassay, 48 hour, (pH adjusted)
NOEL	Daphnia magna	845 mg/L, Static Renewal Bioassay, 48 hour, (pH adjusted)
LC50	Rainbow Trout	582 mg/L, Static Acute Bioassay, 96 hour, (pH adjusted)
NOEL	Rainbow Trout	360 mg/L, Static Acute Bioassay, 96 hour, (pH adjusted)
/		
	LC50 NOEL LC50 NOEL LC50	0% MortalitySheepshead MinnowLC50CeriodaphniaFathead MinnowMysid ShrimpNOELCeriodaphniaFathead MinnowMysid ShrimpLC50Daphnia magnaNOELDaphnia magnaLC50Rainbow TroutNOELRainbow Trout

# 12. Ecological Information

# Ecotoxicity

- COD (mgO2/g)	637
- BOD 5 (mgO2/g)	6
- BOD 28 (mgO2/g)	24
- Closed Bottle Test (% Degradation in 28 days)	8
- Zahn-Wellens Test (% Degradation in 28 days)	5
- TOC (mg C/g)	291

## 13. Disposal Considerations

Waste codes Disposal instructions	Industrial Liquid Waste According to Controlled Waste Regulations.
	Via an authorized waste disposal contractor to an approved waste disposal site, observing all local and national regulations.
Contaminated packaging	According to Controlled Waste Regulations.
	Via an authorized waste disposal contractor to an approved waste disposal site, observing all local and national regulations.

### 14. Transport Information

### DOT

Not regulated as dangerous goods.

Some containers may be DOT exempt, please check BOL for exact container classification.

#### TDG

Not regulated as a dangerous good.

### IATA

Not regulated as dangerous goods.

Material name: DEPOSITROL\* PY5203

### IMDG

Not regulated as dangerous goods.

### 15. Regulatory Information

### **US federal regulations**

US EPCRA (SARA Title III) Section 313 - Toxic Chemical: Listed substance

None listed.

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)

Not regulated.

### CERCLA (Superfund) reportable quantity

None listed.

#### Superfund Amendments and Reauthorization Act of 1986 (SARA)

Hazard categories	Immediate Hazard - No Delayed Hazard - No Fire Hazard - No Pressure Hazard - No Reactivity Hazard - No		
SARA 302 Extremely hazardous substance	No		
SARA 311/312 Hazardous chemical	No		
Inventory status			
Country(s) or region	Inventory name		On inventory (yes/no)*
Canada	Domestic Substances List (DS	SL)	Yes
Canada	Non-Domestic Substances Li	st (NDSL)	No
United States & Puerto Rico	Toxic Substances Control Act	: (TSCA) Inventory	Yes
*A "Yes" indicates that all compone	nts of this product comply with the	inventory requirements administered by the governing	country(s)
Food and drug administration	21 CFR 176.170 (components	s of paper and paperboard in contact with aqueou	is and fatty foods)
State regulations			
US - California Proposition 65	- CRT: Listed date/Carcinogen	ic substance	
No ingredient listed.			
US - California Proposition 65	- CRT: Listed date/Developme	ntal toxin	
No ingredient listed.			
US - California Proposition 65	- CRT: Listed date/Female rep	roductive toxin	
No ingredient listed.			
US - California Proposition 65	<ul> <li>CRT: Listed date/Male reproc</li> </ul>	Juctive toxin	
No ingredient listed.			
US - Massachusetts RTK - Subs			
Sodium sulphate (CAS 775			
US - Pennsylvania RTK - Hazar			
Sodium sulphate (CAS 775	7-82-6)	Listed.	
US - Rhode Island RTK			
Not regulated.			

# 16. Other Information

List of abbreviations	CAS: Chemical Abstract Service Registration Number TSRN indicates a Trade Secret Registry Number is used in place of the CAS number. ACGIH: American Conference of Governmental Industrial Hygienists NOEL: No Observed Effect Level STEL: Short Term Exposure Limit LC50: Lethal Concentration, 50% TWA: Time Weighted Average BOD: Biochemical Oxygen Demand COD: Chemical Oxygen Demand TOC: Total Organic Carbon IATA: International Air Transport Association IMDG: International Maritime Dangerous Goods Code LD50: Lethal Dose, 50% NFPA: National Fire Protection Association
HMIS® ratings	Health: 1 Flammability: 1 Physical hazard: 0 Personal protection: B
NFPA ratings	Health: 1 Flammability: 1 Instability: 0 Special hazards: NONE
This data sheet contains changes from the previous version in section(s):	Product and Company Identification: Product and Company Identification
Prepared by	This MSDS has been prepared by GE Water & Process Technologies Regulatory Department (1-215-355-3300).

\* Trademark of General Electric Company. May be registered in one or more countries.