



SAFETY DATA SHEET GRIPDECK WEARCOAT PLUS HARDENER

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier

Product name GRIPDECK WEARCOAT PLUS HARDENER

Internal identification GRIPDECKWEARCOATPLUSH/10

1.2. Relevant identified uses of the substance or mixture and uses advised against

Identified uses Component of Car Park Decking Repair System

Uses advised against No specific uses advised against are identified.

1.3. Details of the supplier of the safety data sheet

Supplier

Don Construction Products Ltd.,
Hawthorn House
Helions Bumpstead Road
Haverhill
Suffolk
CB9 7AA
Tel: 01538 361799 Mon-Fri 08:30 - 17:00 (excl bank holidays)
Fax: 01538 361899
E-Mail: info.uk@dcp-int.com

1.4. Emergency telephone number

Emergency telephone 01538 361799 Mon-Fri 8.30am - 5.00pm (excluding Bank Holidays)

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification (EC 1272/2008)

Physical hazards Not Classified

Health hazards Acute Tox. 4 - H332 Skin Sens. 1 - H317 STOT SE 3 - H335

Environmental hazards Not Classified

Classification (67/548/EEC or 1999/45/EC) Xn; R20. Xi; R37. R43

Human health See Section 11 for additional information on health hazards.

Environmental The product will harden into a solid mass in contact with water and moisture. The resultant material is not biodegradable.

2.2. Label elements

GRIPDECK WEARCOAT PLUS HARDENER

Pictogram



Signal word

Warning

Hazard statements

H317 May cause an allergic skin reaction.
 H332 Harmful if inhaled.
 H335 May cause respiratory irritation.

Precautionary statements

P260 Do not breathe gas, fume, vapours or spray.
 P264 Wash contaminated skin thoroughly after handling.
 P280 Wear protective gloves/ protective clothing/ eye protection/ face protection.
 P302+P352 IF ON SKIN: Wash with plenty of water.
 P304+P340 IF INHALED: Remove person to fresh air and keep comfortable for breathing.
 P313 Get medical advice/ attention.

Contains

HEXAMETHYLENE DIISOCYANATE, OLIGOMERISATION PRODUCT, HEXAMETHYLENE-DI-ISOCYANATE

Supplementary precautionary statements

P271 Use only outdoors or in a well-ventilated area.
 P284 [In case of inadequate ventilation] wear respiratory protection.
 P403+P233 Store in a well-ventilated place. Keep container tightly closed.
 P501 Dispose of contents/ container in accordance with national regulations.

2.3. Other hazards

SECTION 3: Composition/information on ingredients

3.2. Mixtures

HEXAMETHYLENE DIISOCYANATE, OLIGOMERISATION PRODUCT

60-100%

CAS number: 28182-81-2

Classification

Acute Tox. 4 - H332
 Skin Sens. 1 - H317
 STOT SE 3 - H335

Classification (67/548/EEC or 1999/45/EC)

R43.

HEXAMETHYLENE-DI-ISOCYANATE

<0.5%

CAS number: 822-06-0

EC number: 212-485-8

Classification

Acute Tox. 4 - H302
 Acute Tox. 1 - H330
 Skin Irrit. 2 - H315
 Eye Irrit. 2 - H319
 Resp. Sens. 1 - H334
 Skin Sens. 1 - H317
 STOT SE 3 - H335

Classification (67/548/EEC or 1999/45/EC)

T;R23 R42/43 Xi;R36/37/38

The Full Text for all R-Phrases and Hazard Statements are Displayed in Section 16.

Composition comments

Polyisocyanate pre-polymer

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SECTION 4: First aid measures

4.1. Description of first aid measures

General information	Remove affected person from source of contamination.
Inhalation	Move affected person to fresh air at once. Get medical attention.
Ingestion	Rinse mouth thoroughly with water. Give plenty of water to drink. Do not induce vomiting. Get medical attention.
Skin contact	Remove contaminated clothing immediately and wash skin with soap and water. Get medical attention if irritation persists after washing.
Eye contact	Rinse immediately with plenty of water. Continue to rinse for at least 15 minutes and get medical attention.

4.2. Most important symptoms and effects, both acute and delayed

General information	The severity of the symptoms described will vary dependent on the concentration and the length of exposure.
Inhalation	Harmful if inhaled. May cause respiratory irritation.
Ingestion	May cause discomfort if swallowed.
Skin contact	May cause an allergic skin reaction.
Eye contact	May cause temporary eye irritation.

4.3. Indication of any immediate medical attention and special treatment needed

Notes for the doctor	Treat symptomatically.
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SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media	Extinguish with foam, carbon dioxide or dry powder.
Unsuitable extinguishing media	Do not use water, if avoidable.

5.2. Special hazards arising from the substance or mixture

Specific hazards	Oxides of carbon. Oxides of nitrogen. Hydrogen cyanide (HCN).
Hazardous combustion products	Oxides of carbon. Oxides of nitrogen. When heated, vapours/gases hazardous to health may be formed.

5.3. Advice for firefighters

Protective actions during firefighting	No specific firefighting precautions known.
Special protective equipment for firefighters	Wear positive-pressure self-contained breathing apparatus (SCBA) and appropriate protective clothing.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Personal precautions	Wear suitable protective equipment, including gloves, goggles/face shield, respirator, boots, clothing or apron, as appropriate. Use suitable respiratory protection if ventilation is inadequate. Avoid contact with skin and eyes.
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6.2. Environmental precautions

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Environmental precautions Avoid discharge into drains or watercourses or onto the ground.

6.3. Methods and material for containment and cleaning up

Methods for cleaning up Contain spillage with sand, earth or other suitable non-combustible material. Containers with collected spillage must be properly labelled with correct contents and hazard symbol. Do not close container tightly. Risk of excess pressure build-up.

6.4. Reference to other sections

Reference to other sections For personal protection, see Section 8. See Section 11 for additional information on health hazards. For waste disposal, see section 13.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Usage precautions Avoid inhalation of vapours. Provide adequate ventilation.

Advice on general occupational hygiene Do not eat, drink or smoke when using this product. Good personal hygiene procedures should be implemented.

7.2. Conditions for safe storage, including any incompatibilities

Storage precautions Keep separate from food, feedstuffs, fertilisers and other sensitive material. Store in tightly-closed, original container in a dry, cool and well-ventilated place.

7.3. Specific end use(s)

Specific end use(s) The identified uses for this product are detailed in Section 1.2.

SECTION 8: Exposure Controls/personal protection

8.1. Control parameters

Occupational exposure limits

HEXAMETHYLENE-DI-ISOCYANATE

Long-term exposure limit (8-hour TWA): WEL 0.02 mg/m³(Sen)

Short-term exposure limit (15-minute): WEL 0.07 mg/m³(Sen)

WEL = Workplace Exposure Limit

HEXAMETHYLENE DIISOCYANATE, OLIGOMERISATION PRODUCT (CAS: 28182-81-2)

DNEL

Workers - Inhalation; Long term local effects: 0.5 mg/m³

Consumer - Inhalation; Short term systemic effects: 1 mg/m³

8.2. Exposure controls

Protective equipment



Appropriate engineering controls

Provide adequate general and local exhaust ventilation. Avoid inhalation of vapours. Observe any occupational exposure limits for the product or ingredients.

Personal protection

Always check applicability with your supplier of protective equipment.

Eye/face protection

If there is a risk of splashing, wear chemical resistant goggles or visor approved to BS EN166.

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Hand protection	Chemical-resistant, impervious gloves complying with an approved standard should be worn if a risk assessment indicates skin contact is possible. Nitrile gloves to BSEN374 are recommended. Break through times can vary depending on thickness, use and source. Change gloves regularly.
Other skin and body protection	Wear suitable protective clothing as protection against splashing or contamination. Wear apron or protective clothing in case of contact.
Hygiene measures	Use engineering controls to reduce air contamination to permissible exposure level. Provide eyewash station. Remove contaminated clothing and wash the skin thoroughly with soap and water after work. Do not eat, drink or smoke when using this product.
Respiratory protection	In the case of hypersensitivity of the respiratory tract (eg asthmatics and those who suffer from chronic bronchitis) it is inadvisable to work with this product. In case of inadequate ventilation use a respirator suitable for organic vapours. Consult respirator manufacturer for specific advice.
Environmental exposure controls	Residues and empty containers should be taken care of as hazardous waste according to local and national provisions.

SECTION 9: Physical and Chemical Properties

9.1. Information on basic physical and chemical properties

Appearance	Colourless to pale yellow liquid.
Odour	Slight.
Odour threshold	Not determined.
pH	Not applicable.
Melting point	Not applicable.
Initial boiling point and range	>200°C @
Flash point	169.5°C
Evaporation rate	Not applicable.
Evaporation factor	Not applicable.
Flammability (solid, gas)	Not applicable.
Upper/lower flammability or explosive limits	Not applicable.
Other flammability	Not applicable.
Vapour pressure	<0.000001 hPa @ 20°C
Vapour density	Not determined.
Relative density	1.13 @ 20°C
Bulk density	Not determined.
Solubility(ies)	Insoluble in water.
Partition coefficient	Not applicable.
Auto-ignition temperature	449°C
Decomposition Temperature	Not applicable.
Viscosity	2500 - 4500 mPa s @ 23°C

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Explosive properties	Not applicable.
Explosive under the influence of a flame	Not considered to be explosive.
Oxidising properties	Not known.
Comments	Information given is applicable to the product as supplied.

9.2. Other information

Other information	None.
Refractive index	Not determined.
Particle size	Not applicable.
Molecular weight	Not determined.
Volatility	Not determined.
Saturation concentration	Not determined.
Critical temperature	Not determined.
Volatile organic compound	Not determined.

SECTION 10: Stability and reactivity

10.1. Reactivity

Reactivity	The product will harden into a solid mass in contact with water and moisture.
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10.2. Chemical stability

Stability	Stable under the prescribed storage conditions.
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10.3. Possibility of hazardous reactions

Possibility of hazardous reactions	Under normal conditions of storage and use, hazardous reactions will not occur. No potentially hazardous reactions known.
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10.4. Conditions to avoid

Conditions to avoid	Water, moisture.
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10.5. Incompatible materials

Materials to avoid	Amines. Alcohols, glycols. Reacts with water forming carbon dioxide. Risk of bursting owing to increased pressure in closed containers.
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10.6. Hazardous decomposition products

Hazardous decomposition products	Oxides of carbon. Oxides of nitrogen.
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SECTION 11: Toxicological information

11.1. Information on toxicological effects

Toxicological effects	No information available.
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Acute toxicity - oral

Notes (oral LD₅₀)	No specific test data are available.
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Acute toxicity - dermal

Notes (dermal LD₅₀)	No specific test data are available.
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Acute toxicity - inhalation

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Notes (inhalation LC₅₀)	No specific test data are available.
ATE inhalation (dusts/mists mg/l)	1.04167708
<u>Skin corrosion/irritation</u>	
Skin corrosion/irritation	Irritating to skin.
Animal data	No specific test data are available.
Human skin model test	No specific test data are available.
Extreme pH	No specific test data are available.
<u>Serious eye damage/irritation</u>	
Serious eye damage/irritation	Irritation of eyes is assumed.
<u>Respiratory sensitisation</u>	
Respiratory sensitisation	Sensitising.
<u>Skin sensitisation</u>	
Skin sensitisation	Sensitising.
<u>Germ cell mutagenicity</u>	
Genotoxicity - in vitro	No specific test data are available.
Genotoxicity - in vivo	No specific test data are available.
<u>Carcinogenicity</u>	
Carcinogenicity	No information available.
Target organ for carcinogenicity	No specific target organs known.
IARC carcinogenicity	Not listed.
<u>Reproductive toxicity</u>	
Reproductive toxicity - fertility	No specific test data are available.
Reproductive toxicity - development	Not considered to be toxic to the reproductive system.
<u>Specific target organ toxicity - single exposure</u>	
STOT - single exposure	No specific test data are available.
<u>Specific target organ toxicity - repeated exposure</u>	
STOT - repeated exposure	May cause damage to organs through prolonged or repeated exposure.
General information	The product contains small quantities of isocyanate. May cause respiratory allergy. May cause respiratory system irritation.
Inhalation	Harmful if inhaled.
Ingestion	May cause discomfort if swallowed.
Skin contact	May cause an allergic skin reaction.
Eye contact	May cause temporary eye irritation.
Acute and chronic health hazards	No specific health hazards known.

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Route of entry	Inhalation Skin and/or eye contact
Target organs	Respiratory system, lungs Skin
Medical symptoms	Skin irritation. Gas or vapour in high concentrations may irritate the respiratory system. Symptoms following overexposure may include the following: Headache. Fatigue. Nausea, vomiting. Prolonged or repeated exposure may cause the following adverse effects: Allergic rash. General respiratory distress, unproductive cough. Difficulty in breathing.
Medical considerations	Skin disorders and allergies. Chronic respiratory and obstructive airway diseases.

HEXAMETHYLENE DIISOCYANATE, OLIGOMERISATION PRODUCT

Acute toxicity - inhalation

ATE inhalation (dusts/mists mg/l)	1.5
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HEXAMETHYLENE-DI-ISOCYANATE

Acute toxicity - oral

ATE oral (mg/kg)	500.0
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Acute toxicity - inhalation

ATE inhalation (dusts/mists mg/l)	0.005
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SECTION 12: Ecological Information

Ecotoxicity	The product should not be allowed to enter drains, sewers or watercourses.
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12.1. Toxicity

Toxicity	Not measured. Do not allow to enter waterways or drains
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Acute toxicity - fish	Not determined
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Acute toxicity - aquatic invertebrates	Not determined.
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Acute toxicity - aquatic plants	Not determined.
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Acute toxicity - microorganisms	Not determined.
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Acute toxicity - terrestrial	Not determined.
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Chronic toxicity - fish early life stage	Not determined.
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Short term toxicity - embryo and sac fry stages	Not determined.
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Chronic toxicity - aquatic invertebrates	Not determined.
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12.2. Persistence and degradability

Persistence and degradability	The product reacts with water to form a solid, insoluble reaction product which is not biodegradable.
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Phototransformation	Not determined.
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Stability (hydrolysis)	Not determined.
Biodegradation	Not readily biodegradable.
Biological oxygen demand	Not determined.
Chemical oxygen demand	Not determined.

12.3. Bioaccumulative potential

Bioaccumulative potential	No data available on bioaccumulation.
Partition coefficient	Not applicable.

12.4. Mobility in soil

Mobility	The product is non-volatile.
Adsorption/desorption coefficient	Not determined.
Henry's law constant	Not determined.
Surface tension	Not determined.

12.5. Results of PBT and vPvB assessment

Results of PBT and vPvB assessment	This substance is not classified as PBT or vPvB according to current EU criteria.
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12.6. Other adverse effects

Other adverse effects	None known.
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SECTION 13: Disposal considerations

13.1. Waste treatment methods

General information	Residues and empty containers should be taken care of as hazardous waste according to local and national provisions.
Disposal methods	Should be disposed of via licensed waste operators to an approved incineration unit.

SECTION 14: Transport information

General	The product is not covered by international regulations on the transport of dangerous goods (IMDG, IATA, ADR/RID).
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14.1. UN number

14.2. UN proper shipping name

14.3. Transport hazard class(es)

Transport labels	No transport warning sign required.
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14.4. Packing group

14.5. Environmental hazards

Environmentally hazardous substance/marine pollutant	No.
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14.6. Special precautions for user

14.7. Transport in bulk according to Annex II of MARPOL and the IBC Code

SECTION 15: Regulatory information

GRIPDECK WEARCOAT PLUS HARDENER

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture

National regulations	Control of Substances Hazardous to Health Regulations 2002 (as amended).
Guidance	Workplace Exposure Limits EH40. Safety Data Sheets for Substances and Preparations.
Authorisations (Title VII Regulation 1907/2006)	No specific authorisations are known for this product.
Restrictions (Title VIII Regulation 1907/2006)	No specific restrictions on use are known for this product.

15.2. Chemical safety assessment

No chemical safety assessment has been carried out.

SECTION 16: Other information

General information	Don Construction Products Ltd. Technical Datasheet.
Key literature references and sources for data	Health and Safety Executive Guidance Note EH40 (amended annually). Workplace Exposure Limits.
Revision comments	Section 1 update
Revision date	01/03/2017
Revision	10
Supersedes date	25/05/2016
SDS status	Approved.
Risk phrases in full	R23 Toxic by inhalation. R36/37/38 Irritating to eyes, respiratory system and skin. R42/43 May cause sensitisation by inhalation and skin contact. R43 May cause sensitisation by skin contact.
Hazard statements in full	H302 Harmful if swallowed. H302 Harmful if swallowed. H315 Causes skin irritation. H315 Causes skin irritation. H317 May cause an allergic skin reaction. H317 May cause an allergic skin reaction. H319 Causes serious eye irritation. H319 Causes serious eye irritation. H330 Fatal if inhaled. H330 Fatal if inhaled. H332 Harmful if inhaled. H332 Harmful if inhaled. H334 May cause allergy or asthma symptoms or breathing difficulties if inhaled. H335 May cause respiratory irritation. H335 May cause respiratory irritation. EUH208 Contains HEXAMETHYLENE-DI-ISOCYANATE. May produce an allergic reaction.

This information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process. Such information is, to the best of the company's knowledge and belief, accurate and reliable as of the date indicated. However, no warranty, guarantee or representation is made to its accuracy, reliability or completeness. It is the user's responsibility to satisfy himself as to the suitability of such information for his own particular use.