according to Regulation (EC) No. 453/2010



Date Issued: 06/28/2022

SDS No: HOOF GRIP PRO PART A-EU

HOOF GRIP PRO PART A

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

1.1. Product identifier

Product name : HOOF GRIP PRO PART A
UFI : 6AX2-V02V-R00J-VU77

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

Relevant identified uses : Polyurethane resin

1.3. Details of the supplier of the safety data sheet

Manufacturer

Chem Select

10980 Arrow Route #106

Rancho Cucamonga, CA 91730

Emergency Phone : (800) 985-2012

1.4. Emergency telephone number

CHEMTREC (USA & Canada): (800) 424-9300

or (703) 527-3887 CCN# 2820

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification according to Regulation (EC) No 1272/2008 [CLP]

Health : Acute Toxicity (Inhalation), Category 4

Skin Irritation, Category 2 Eye Irritation, Category 2A

Respiratory Sensitization, Category 1 Skin Sensitization, Category 1 Carcinogenicity, Category 2

Target Organ Toxicity (Single exposure), Category 3
Target Organ Toxicity (Repeated exposure), Category 2

2.2. Label elements

Contains 4,4'-Methylenediphenyl diisocyanate and Methylenediphenyl diisocyanate isomers.

Classification according to Regulation (EC) No 1272/2008 [CLP]

Hazard pictogram(s) :



(!)

Health hazard

Exclamation mark

Signal Word : DANGER

Hazard statement(s) : H332: Harmful if inhaled.

H315: Causes skin irritation.

H317: May cause an allergic skin reaction. H319: Causes serious eye irritation.

H334: May cause allergy or asthma symptoms or breathing difficulties if inhaled.

H335: May cause respiratory irritation.

according to Regulation (EC) No. 453/2010



Date Issued: 06/28/2022

SDS No: HOOF GRIP PRO PART A-EU

HOOF GRIP PRO PART A

Precautionary statement(s)

Prevention: P280: Wear protective gloves/protective clothing/eye protection/face protection.

P285: In case of inadequate ventilation wear respiratory protection.

Response: P302+P352: IF ON SKIN: Wash with plenty of soap and water.

P305+P351+P338: IF IN EYES: Rinse cautiously with water for several minutes. Remove

contact lenses, if present and easy to do. Continue rinsing.

Storage : P403+P233: Store in a well-ventilated place. Keep container tightly closed.

Disposal : P501: Dispose of contents/container in accordance with

local/regional/national/international regulations.

2.3. Other hazards

Other hazards : Contains diisocyanates. Persons previously sensitized to isocyanates may develop

cross-sensitization reaction to other isocyanates.

SECTION 3: Composition / information on ingredients

3.1. Substances

Not Applicable

3.2. Mixtures

Chemical Name	CAS	EINECS No.	% w/w	Classification according to Regulation (EC) No 1272/2008 [CLP]
4,4'-Diphenylmethane diisocyanate	101-68-8	202-966-0	50 - 55	H332; H315; H319; H334; H317; H335; H351; H373
Benzene, 1,1'-methylenebis[isocyanato-, homopolymer	39310-05-9	609-645-8	16 - 19	H315; H317; H319; H334; H335
Benzene, 1,1'-methylenebis[isocyanato-	26447-40-5	247-714-0	5 - 6	H332; H315; H319; H334; H317; H335; H351; H373
Phosphoric Acid, Triethyl Ester	78-40-0	201-114-5	1 - 4	H302; H319

For full text of H-statements: see SECTION 16.

SECTION 4: First aid measures

4.1. Description of first aid measures

Following eyes : Immediately flush with plenty of water. After initial flushing, remove any contact lenses

and continue flushing for at least 15 minutes. Get medical advice/attention.

Following skin : Immediately wash skin with soap and plenty of water. Remove contaminated clothing.

Get medical advice/attention if irritation or rash develops. Wash clothing before reuse.

Following ingestion : If swallowed, call a physician immediately. Do not induce vomiting unless directed to do

so by medical personnel. Provided the patient is conscious, wash out mouth with water.

Never give anything by mouth to an unconscious person.

Following inhalation : Remove to fresh air. If not breathing, if breathing is irregular or if respiratory arrest

occurs, provide artificial respiration or oxygen by trained personnel. Get immediate

medical attention.

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

Eyes : Causes serious eye irritation.

Skin : Causes skin irritation. May cause an allergic skin reaction.

according to Regulation (EC) No. 453/2010



Date Issued: 06/28/2022

SDS No: HOOF GRIP PRO PART A-EU

HOOF GRIP PRO PART A

Inhalation : Harmful if inhaled. May cause an allergic respiratory reaction.

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

Notes to physician : Symptomatic and supportive therapy as needed. Following severe exposure medical

follow-up should be monitored for at least 48 hours.

SECTION 5: Fire fighting measures

5.1. Extinguishing media

Extinguishing media : Water spray (fog), carbon dioxide, dry chemical, or alcohol-resistant foam. Do not use

water jet.

5.2. Special hazards arising from the substance or mixture

Hazardous combustion products

: Carbon monoxide, carbon dioxide, nitrogen oxides, hydrogen cyanide, and phosphorus

oxides.

5.3. Advice for firefighters

Fire fighting procedures

: Cool fire exposed containers with water spray. Remove containers from the fire area if

possible. Do not release runoff from fire control methods to sewers or waterways.

Fire fighting equipment

: Firefighters should wear positive pressure self-contained breathing apparatus (SCBA) and consider use of unmanned hose holders or monitor nozzles for fighting large fires.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

General procedures

: Refer to section 8 of SDS for personal protection details. All emergency and nonemergency responders must have recommended PPE prior to addressing any release of material. In addition, ensure adequate ventillation of area, and/or use personal respirators with vapor cartridges for large releases or a release in a confined location. If necessary, review local/regional release reporting requirements only after the release has been adequately contained.

Special protective equipment

: None needed under normal conditions of use.

Release notes

: Composition and extent of any spill should be evaluated against local regulations and

reported to the proper agencies, if necessary.

6.2. Environmental precautions

Water spill

: Do not discharge into drains, surface waters, or groundwater.

6.3. Methods and material for containment and cleaning up

Spill and Leak Procedures

: Evacuate unnecessary personnel from the spill area. Wear necessary personal protective equipment (PPE) as specified in the SDS or the site emergency response plan. Eliminate all sources of ignition. Ensure adequate ventilation. Dike and contain spill. Prevent product from entering drains or waterways. Absorb with non-combustible material (such as sand, earth, diatomaceous earth, or vermiculite) and transfer to a container for disposal according to local/national regulations.

6.4. Reference to other sections

Reference to other sections

: Section 8 and Section 13

SECTION 7: Handling and storage

7.1. Precautions for safe handling

according to Regulation (EC) No. 453/2010



Date Issued: 06/28/2022

SDS No: HOOF GRIP PRO PART A-EU

HOOF GRIP PRO PART A

General procedures

: Avoid contact with eyes, skin and clothing. Use only with adequate ventilation. Avoid breathing vapor over open containers. Avoid open container exposure to damp air. Avoid

breathing aerosols, mists, and vapors.

Handling

: Use appropriate personal protective equipment as specified in Section 8. Handle in a well-ventilated area. Handle and use in a manner consistent with good

industrial/manufacturing techniques and practices.

Storage

: Store in a dry and well-ventilated place, away from excessive heat in the original or similar container. Avoid sources of ignition and incompatible materials. Protect from freezing. Containers should be tightly sealed to prevent contamination with foreign

materials. Avoid unnecessary contact.

7.2. Conditions for safe storage, including any incompatibilities

Storage temperature : 65-80°F (18-27°C)

Shelf life : 3 months from date of shipment under manufacturers recommended storage conditions.

7.3. Specific end use(s)

Specific end use(s) : Polyurethane resin for professional/industrial applications

SECTION 8: Exposure controls / personal protection

8.1. Control parameters

Control parameters : No data available

8.2. Exposure controls

Engineering controls

: Use process enclosures, local exhaust ventilation, or other engineering controls to

control airborne levels below recommended exposure limits.

Eye/face protection

: Safety goggles or glasses are recommended. Plastic face shields should be used for complete face protection to protect against possible splashing or spraying of material.

ANSI Z87.1, EN 166, or approved equivalent.

Skin protection

: Chemical-resistant gloves and chemical goggles, face-shield, and synthetic apron or coveralls should be used to prevent contact with eyes, skin, or clothing. Select gloves in accordance with EU standard EN 374 and eye protection in accordance with EU

standard EN 166.

Respiratory protection

Exhaust ventilation recommended. An organic vapor cartridge or fresh air supplied respirator may be necessary for certain applications. Consider the type of application, environmental concentrations, and other materials being used concurrently when determining respirator use and selection. Select in accordance with EU Standard EN 140

or EN 136, or other applicable regulations and good industrial hygene practice.

Protective clothing

: Wear protective clothing as needed to avoid skin contact.

Work hygienic practices

: Contaminated clothing should be changed and washed before reuse. Eating, drinking and smoking in immediate work area should be prohibited. Wash hands before eating.

Other precautions

: Facilities storing or utilizing this material should be equipped with an eyewash facility and

a safety shower. Training is important. Follow all label precautions.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state : Liquid

according to Regulation (EC) No. 453/2010



Date Issued: 06/28/2022

SDS No: HOOF GRIP PRO PART A-EU

HOOF GRIP PRO PART A

Colour : Pale yellow
Odour : Slightly musty
pH : No data available
Melting point : No data available
Freezing point : No data available
Boiling point : No data available

Flash point :> 126.7°C Pensky-Martens CC

Flammability : No data available
Vapor pressure : No data available
Vapor density : No data available

Specific gravity : 1.151 (water=1) at 25°C

Solubility in water : Reacts with water

Partition coefficient: n-octanol/water : N/A

Auto-ignition temperature : No data available

Decomposition temperature : < 300°C

Viscosity #1 : 1480 Centipoise at 25°C
Viscosity #2 : 1285 Centistokes at 25°C

9.2. Other information

(VOC) : < 0.1 g/l Calculated. Theoretical VOC minus water and exempt solvents.

SECTION 10: Stability and reactivity

10.1. Reactivity

Reactivity : Hazardous reactions will not occur under normal transport or storage conditions.

10.2. Chemical stability

Chemical stability : This product is stable under normal ambient conditions of temperature and pressure.

10.3. Possibility of hazardous reactions

Possibility of hazardous reactions

: Reaction with water produces carbon dioxide. Exothermic reaction with materials containing active hydrogen groups. The reaction becomes progressively more vigorous and can be violent at higher temperatures if the miscibility of the reaction partners is good or is supported by stirring or by the presence of solvents. MDI is insoluble with, and heavier than water and sinks to the bottom but reacts slowly at the interface. A solid water-insoluble layer of polyurea is formed at the interface by liberating carbon dioxide gas.

10.4. Conditions to avoid

Conditions to avoid : High temperatures, moisture, and freezing conditions.

10.5. Incompatible materials

Incompatible materials: Water, amines, acids, bases, and strong oxidizing agents.

10.6. Hazardous decomposition products

Hazardous decomposition products

: Carbon monoxide, carbon dioxide, nitrogen oxides, hydrogen cyanide, and phosphorus oxides.

according to Regulation (EC) No. 453/2010



Date Issued: 06/28/2022

SDS No: HOOF GRIP PRO PART A-EU

HOOF GRIP PRO PART A

SECTION 11: Toxicological information

11.1. Information on hazard classes as defined in Regulation (EC) No 1272/2008

Acute

Chemical Name	Oral LD ₅₀	Dermal LD ₅₀	Inhalation LC ₅₀	
4,4'-Diphenylmethane diisocyanate	> 2000 mg/kg Rat	> 9400 mg/kg Rabbit	2.24 mg/l Rat (1 h, dust/mist)	
Benzene, 1,1'-methylenebis[isocyanato-, homopolymer	No data available	No data available	No data available	
Benzene, 1,1'-methylenebis[isocyanato-	> 2000 mg/kg Rat	> 9400 mg/kg Rabbit	2.24 mg/l Rat (1 h, dust/mist)	
Phosphoric Acid, Triethyl Ester	1600 mg/kg Rat	> 20000 mg/kg Rabbit	8817 mg/l Rat (4 h)	

Skin corrosion/irritation : Causes skin irritation.

Serious eye damage/irritation : Causes serious eye irritation.

Respiratory or skin sensitisation : May cause sensitization by inhalation and skin contact.

Germ cell mutagenicity : No data available

Carcinogenicity

Chemical name	IARC
4,4'-Diphenylmethane diisocyanate	3

Notes : 4,4'-Methylenediphenyl diisocyanate is classified as "Suspected of causing cancer"

(Carcinogen Category 2) by the EU CLP.

Reproductive toxicity : None Expected

STOT-single exposure : May cause respiratory irritation.

STOT-repeated exposure : May cause damage to organs through prolonged or repeated exposure.

Aspiration Hazard : No data available

11.2. Information on other hazards

SECTION 12: Ecological information

12.1. Toxicity

Toxicity : No specific ecological data are available for this product. Refer to Section 6 for information regarding accidental release and Section 15 for regulatory reporting

information.

Aquatic toxicity (acute)

96-hour LC₅₀ : > 1000 mg/l Brachydanio rerio

Notes : This information is based on 4,4'-Diphenylmethane diisocyanate.

12.2. Persistence and degradability

Persistence and degradability : This product is not stable in water and will hydrolyze sowly. Therefore it is poorly

biodegradable.

12.3. Bioaccumulative potential

according to Regulation (EC) No. 453/2010



Date Issued: 06/28/2022

SDS No: HOOF GRIP PRO PART A-EU

HOOF GRIP PRO PART A

Bioaccumulative potential

: No evidence of bioaccumulation of 4,4'-Diphenylmethane diisocyanate or its isomers.

12.4. Mobility in soil

Mobility in soil

: Due to rapid reaction in water, material will not evaporate into the atmosphere from the

water surface and adsorption to solid soil phase is not expected.

12.5. Results of PBT and vPvB assessment

Results of PBT and vPvB assessment: This product is not a PBT or vPvB.

12.6. Endocrine disrupting properties

Endocrine disrupting properties

: No data available

SECTION 12: Ecological information

Environmental data : No data available

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Disposal method

: The generation of waste should be avoided or minimized wherever possible. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe way. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Disposal of this product, solutions and any byproducts should at all times comply with the requirements of environmental protections and waste disposal legislation and any regional local authority requirements. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

Waste codes

: EU Waste Code (as sold): 080409 Waste Adhesives and Sealants containing organic solvents or other dangerous substances.

SECTION 14: Transport information

14.1-14.6: Not Regulated

14.7. Maritime transport in bulk according to IMO instruments

Transport in bulk: This product is not intended to be transported in bulk.

SECTION 15: Regulatory information

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

Restricted Substance - Chemicals Restricted under REACH Annex XVII

Reference Entry Number for individual conditions of restriction.

Chemical Name	CAS	EINECS No.	Entry No.
4,4'-Diphenylmethane diisocyanate	101-68-8	202-966-0	56, 74
Benzene, 1,1'-methylenebis[isocyanato-	26447-40-5	247-714-0	56

RoHS

: This product does not contain any of the hazardous substances listed. Therefore, the product conforms to the European Union (EU) Restriction of Hazardous Substances (RoHS) Directive 2002/95/EC.

General comments

: This product is classified and labeled in accordance with CLP Regulation. This product SDS complies with the requirements of Regulation (EC) No. 1907/2006 (REACH).

according to Regulation (EC) No. 453/2010



Date Issued: 06/28/2022

SDS No: HOOF GRIP PRO PART A-EU

HOOF GRIP PRO PART A

15.2. Chemical safety assessment	
Chemical safety assessment	: No data available
SECTION 16: Other information	
Relevant H-statements (number and full text)	: H302: Harmful if swallowed. H315: Causes skin irritation. H317: May cause an allergic skin reaction. H319: Causes serious eye irritation. H332: Harmful if inhaled. H334: May cause allergy or asthma symptoms or breathing difficulties if inhaled. H335: May cause respiratory irritation. H351: Suspected of causing cancer (state route of exposure if it is conclusively proven that no other routes of exposure cause the hazard). H373: May cause damage to organs (state all organs affected, if known) through prolonged or repeated exposure (state route of exposure if it is conclusively proven that no other routes of exposure cause the hazard).
Reason for issue	: Revision
Manufacturer disclaimer	: This information is furnished without warranty, expressed or implied, except that is accurate to the best knowledge of Chem Select. The data on this sheet relates only to the specific material designated herein. Chem Select assumes no legal responsibility for use or reliance upon this data.

use or reliance upon this data.