

This safety data sheet was created pursuant to the requirements of:
UK REACH Regulations (SI 2019/758 as amended)

Revision date 14-Dec-2025

Revision Number 1

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

1.1. Product identifier

Product Code(s) 128043

Safety data sheet number 128043

Product Name KRATON G POLYMERS (SEP(S)) UNDUSTED

Synonyms KRATON G1701, KRATON G1702, KRATON G1703

Additional Product Information Suffix examples HU MU VU

Pure substance/mixture Mixture

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

Recommended use Industrial use

1.3. Details of the supplier of the safety data sheet

Supplier

Univar Solutions UK Ltd
Aquarius House
6 Mid Point Business Park
Bradford
GBR

For further information, please contact

E-mail address SDS.EMEA@univarsolutions.com

Non-Emergency Telephone Number +44 1274 267300 / +44 1274 267306

1.4. Emergency telephone number

Emergency Telephone SGS - +32 (0)3 575 55 55 (24h)

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Not classified

2.2. Label elements

Not classified

Hazard statements

Not classified

Unknown aquatic toxicity

Contains 0 % of components with unknown hazards to the aquatic environment.

2.3. Other hazards

Dust can form an explosive mixture with air. Static charges generated by emptying package in or near flammable vapour may cause flash fire. When suspended in air dust can pose an explosion hazard.

SECTION 3: Composition/information on ingredients**3.1 Substances**

Not applicable

3.2 Mixtures

The product contains no substances which at their given concentration, are considered to be hazardous to health

Chemical name	Weight-%	EC No (EU Index No)	UK REACH registration number	Classification according to GB CLP (SI 2020/1567 as amended)	Specific concentration limit (SCL)	M-Factor	M-Factor (long-term)
STYRENE-ETHYLENE/PROPYLENE-(STYRENE)(SEP(S)) 68648-89-5	90 - 100%	-	-	Not classified	-	-	-

Full text of H- and EUH-phrases: see section 16

This product does not contain candidate substances of very high concern at a concentration $\geq 0.1\%$ (UK REACH Article 59)

SECTION 4: First aid measures**4.1. Description of first aid measures****General advice**

Get medical attention if symptoms occur. First aid personnel should wear appropriate protective equipment during any rescue.

Inhalation

IF INHALED: Remove to fresh air and keep at rest in a position comfortable for breathing. Rinse mouth thoroughly with water. Get medical attention if symptoms occur.

Eye contact

Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. Do not rub affected area. Remove contact lenses, if present and easy to do. Continue rinsing. Get medical attention if symptoms occur.

Skin contact

IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower. If burned by contact with hot material, molten material adhering to skin should be cooled as quickly as possible with water, and see a physician for removal of adhering material and treatment of burn. Get medical attention if symptoms occur.

Ingestion

Rinse mouth thoroughly with water. Do not induce vomiting without medical advice. Never give anything by mouth to an unconscious person. Get medical attention if symptoms occur.

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

Symptoms	Exposure may cause temporary irritation, redness, or discomfort.
Inhalation	Inhalation of vapours/fumes generated by heating this product may cause respiratory irritation with throat discomfort, coughing or difficulty breathing. Inhalation of dusts may cause respiratory irritation.
Eyes	Solid particles trapped behind the eyelid may cause abrasive damage,. Contact with product at elevated temperatures can result in thermal burns.
Dermal	Contact with product at elevated temperatures can result in thermal burns.
Ingestion	May cause discomfort if swallowed

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

Note to doctors	Treat symptomatically.
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SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable Extinguishing Media	Water spray. Dry chemical. Carbon dioxide (CO ₂).
Large Fire	CAUTION: Use of water spray when fighting fire may be inefficient.
Unsuitable extinguishing media	Do not scatter spilled material with high pressure water streams.

5.2. Special hazards arising from the substance or mixture

Specific hazards arising from the chemical	When heated and in case of fire, toxic vapours/gases may be formed. Dust can form an explosive mixture with air. Static charges generated by emptying package in or near flammable vapour may cause flash fire.
Hazardous combustion products	Carbon oxides. Low molecular weight hydrocarbons.

5.3. Advice for firefighters

Special protective equipment and precautions for fire-fighters	Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear. Use personal protection equipment.
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SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Personal precautions	Ensure adequate ventilation. Use personal protection recommended in Section 8. Avoid contact with eyes, skin and clothing. Avoid breathing dust. Avoid inhalation of fumes from molten product. Avoid contact with hot material. In case of spills, beware of slippery floors and surfaces. Keep unnecessary and unprotected personnel from entering.
For emergency responders	Use personal protection recommended in Section 8.

6.2. Environmental precautions

Environmental precautions	See Section 12 for additional Ecological Information.
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6.3. Methods and material for containment and cleaning up

Methods for containment	Prevent further leakage or spillage if safe to do so.
Methods for cleaning up	Remove spillage with vacuum cleaner. If not possible, collect spillage with shovel, broom or the like. Avoid generation of dust. Pick up and transfer to properly labelled containers. The product is immiscible with water and will spread on the water surface. Attempt to reclaim the free product. Insoluble in water.
Prevention of secondary hazards	Clean contaminated objects and areas thoroughly observing environmental regulations.

6.4. Reference to other sections

Reference to other sections	See section 8 for more information. See section 13 for more information.
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SECTION 7: Handling and storage

7.1. Precautions for safe handling

Advice on safe handling	Ensure adequate ventilation. Use personal protection recommended in Section 8. Avoid contact with eyes, skin and clothing. Do not breathe dust. Avoid generation of dust. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Static electricity and formation of sparks must be prevented. Ground container and transfer equipment to eliminate static electric sparks. Avoid contact with hot material. Avoid release to the environment. Observe good chemical hygiene practices. Since emptied containers retain product residue, follow all SDS and label warnings even after container is emptied. Maintain a fire watch if material reaches 280°C (536°F).
General hygiene considerations	Ensure that eyewash stations and safety showers are close to the workstation location. Remove and wash contaminated clothing and gloves, including the inside, before re-use. Handle in accordance with good industrial hygiene and safety practice.

7.2. Conditions for safe storage, including any incompatibilities

Storage Conditions	Store indoors. Keep away from heat, sparks and open flame. This material can accumulate static charge which may cause spark and become an ignition source. Prevent electrostatic charge build-up by using common bonding and grounding techniques. Extremes of temperature and direct sunlight. Keep container tightly closed in a dry and well-ventilated place. Store at ambient temperature and atmospheric pressure. Avoid generation of dust. Handle all packages and containers carefully to minimise spills. See section 10 for more information. Do not store outside. Care should be taken when storing and handling this product. Apart from the specific nature of the polymer product, conditions such as humidity, sunlight and temperature have an influence on the way the product behaves during storage and handling. Special attention should be paid to avoid inappropriate stacking of palletised bags or other package units. Indeed, polymer products may be dimensionally unstable under certain conditions. Do not stack Flexible Intermediate Bulk Containers (FIBCs) or palletised bags. Avoid storage under pressure or at elevated temperatures to minimise particulate clustering.
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7.3. Specific end use(s)

Specific use(s)	See section 1 for more information.
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Risk Management Methods (RMM)	The information required is contained in this Safety Data Sheet.
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SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Exposure Limits	This product, as supplied, does not contain any hazardous materials with occupational exposure limits established by the region specific regulatory bodies.
Biological occupational exposure limits	This product, as supplied, does not contain any hazardous materials with biological limits established by the region specific regulatory bodies.
Derived No Effect Level (DNEL) - Workers	No information available
Derived No Effect Level (DNEL) - General Public	No information available.
Predicted No Effect Concentration (PNEC)	No information available.

8.2. Exposure controls

Engineering controls	No information available.
<u>Personal protective equipment</u>	
Eye/face protection	Wear safety glasses with side shields (or goggles). Use eye protection according to EN ISO 16321-1. Wear a face shield when working with molten material.
Hand protection	Wear suitable gloves. Gloves must conform to standard EN 374. For molten product, use any type rubber thermal insulating gloves and other clothing as necessary to protect from thermal burns.
Skin and body protection	Wear appropriate clothing to prevent reasonably probable skin contact.
Respiratory protection	When workers are facing concentrations above the exposure limit they must use appropriate certified respirators.
General hygiene considerations	Ensure that eyewash stations and safety showers are close to the workstation location. Remove and wash contaminated clothing and gloves, including the inside, before re-use. Handle in accordance with good industrial hygiene and safety practice.
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.

SECTION 9: Physical and chemical properties**9.1. Information on basic physical and chemical properties**

Physical state	Solid
Appearance	Powder
Colour	white clear
Odour	Odourless.
Odour threshold	No information available

<u>Property</u>	<u>Values</u>	<u>Remarks • Method</u>
Melting point / freezing point		No information available.
Initial boiling point and boiling range		Not applicable.

Flammability		No information available.
Flammability Limit in Air		Not applicable.
Upper flammability or explosive limits		
Lower flammability or explosive limits		
Flash point		Not applicable.
Autoignition temperature		No information available.
Decomposition temperature		No information available.
pH		Not applicable.
pH (as aqueous solution)		No information available.
Kinematic viscosity		No information available.
Dynamic viscosity		No information available.
Water solubility	Insoluble in water	
Solubility(ies)		No information available.
Partition coefficient		No information available.
Vapour pressure		Not applicable.
Relative density	≥ 0.88 - ≤ 0.95	@ 20 °C.
Bulk density		No information available
Liquid Density	No information available	No information available
Relative vapour density		Not applicable.
Particle characteristics		No information available.
Particle Size	No information available	
Particle Size Distribution	No information available	
Explosive properties	No information available	
Oxidising properties	No information available	
9.2. Other information		
Evaporation rate	Not applicable	

SECTION 10: Stability and reactivity

10.1. Reactivity

Reactivity	The product is stable and non-reactive under normal conditions of use, storage and transport.
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10.2. Chemical stability

Stability	Stable under normal conditions.
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Explosion data

Sensitivity to mechanical impact	None.
Sensitivity to static discharge	None.

10.3. Possibility of hazardous reactions

Possibility of hazardous reactions	Risk of self-heating and self-ignition under long term exposure to high temperatures.
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10.4. Conditions to avoid

Conditions to avoid	Extremes of temperature and direct sunlight.
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10.5. Incompatible materials

Incompatible materials	Strong oxidising agents. Strong acids. Alkali.
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10.6. Hazardous decomposition products

Hazardous decomposition products	Carbon oxides. Low molecular weight hydrocarbons.
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SECTION 11: Toxicological information**11.1. Information on toxicological effects****Information on likely routes of exposure****Product Information**

Inhalation	Inhalation of vapours/fumes generated by heating this product may cause respiratory irritation with throat discomfort, coughing or difficulty breathing. Inhalation of dusts may cause respiratory irritation.
Eye contact	Solid particles trapped behind the eyelid may cause abrasive damage,. May cause slight eye irritation. Contact with product at elevated temperatures can result in thermal burns.
Skin contact	Contact with product at elevated temperatures can result in thermal burns.
Ingestion	May cause discomfort if swallowed. Ingestion is not likely to be a primary route of occupational exposure.

Symptoms related to the physical, chemical and toxicological characteristics

Symptoms Exposure may cause temporary irritation, redness, or discomfort.

Acute toxicity**Numerical measures of toxicity**

The following values are calculated based on chapter 3.1 of the GHS document

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Skin corrosion/irritation Non-irritating during normal use. Contact with product at elevated temperatures can result in thermal burns.

STYRENE-ETHYLENE/PROPYLENE-(STYRENE)(SEP(S)) (68648-89-5)

Method	Species	Exposure route	Effective dose	Exposure time	Results
	Rabbit	Dermal			non-irritant

Serious eye damage/eye irritation Solid particles trapped behind the eyelid may cause abrasive damage,. May cause slight eye irritation. Contact with product at elevated temperatures can result in thermal burns.

Respiratory or skin sensitisation Not a skin sensitiser. Not a respiratory sensitiser.

STYRENE-ETHYLENE/PROPYLENE-(STYRENE)(SEP(S)) (68648-89-5)

Method	Species	Exposure route	Results
Guinea pig maximisation test (GPMT)	Guinea pig	Dermal	Not a skin sensitiser

Germ cell mutagenicity No information available.

Component Information**STYRENE-ETHYLENE/PROPYLENE-(STYRENE)(SEP(S)) (68648-89-5)**

Method	Species	Results
	in vitro S. typhimurium	Negative

Carcinogenicity	No information available.
Reproductive toxicity	This product does not contain any known or suspected reproductive hazards.
STOT - single exposure	Not classified.
STOT - repeated exposure	Not classified.
Aspiration hazard	Based on available data the classification criteria are not met.
Other adverse effects	Styrene-Ethylene/Propylene-(Styrene) (SEP(S)). Cytotoxicity Study using the Colony Assay in Chinese Hamster Lung Cells (V79): No significant and/or relevant adverse effects reported.; for a representative substance. In Vitro Haemolysis Study in Red Blood Cells, Japanese MHLW, no significant and/or relevant adverse effects reported.; for a representative substance. USP Muscle Implantation Study in Rabbits – 7 Day: No significant and/or relevant adverse effects reported.; for a representative substance.

SECTION 12: Ecological information

12.1. Toxicity

Ecotoxicity	The environmental impact of this product has not been fully investigated.
Unknown aquatic toxicity	Contains 0 % of components with unknown hazards to the aquatic environment.

STYRENE-ETHYLENE/PROPYLENE-(STYRENE)(SEP(S)) (68648-89-5)

Method	Species	Endpoint type	Effective dose	Exposure time	Results
	Fish Oncorhynchus mykiss (rainbow trout)	LC50	> 1000 mg/L	96 hours	

12.2. Persistence and degradability

Persistence and degradability	No information available.
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12.3. Bioaccumulative potential

Bioaccumulation	There is no data for this product.
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12.4. Mobility in soil

Mobility in soil	No information available.
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12.5. Results of PBT and vPvB assessment

PBT and vPvB assessment	The product does not contain any substance(s) classified as PBT or vPvB.
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12.6. Other adverse effects

No information available.

SECTION 13: Disposal considerations**13.1. Waste treatment methods**

Waste from residues/unused products Dispose of in accordance with local regulations. Dispose of waste in accordance with environmental legislation.

Contaminated packaging Do not reuse empty containers.

SECTION 14: Transport information**IATA**

14.1 UN number or ID number Not regulated
14.2 UN proper shipping name Not regulated
14.3 Transport hazard class(es) Not regulated
14.4 Packing group Not regulated
14.5 Environmental hazards No
14.6 Special precautions for user
Special Provisions None

IMDG

14.1 UN number or ID number Not regulated
14.2 UN proper shipping name Not regulated
14.3 Transport hazard class(es) Not regulated
14.4 Packing group Not regulated
14.5 Environmental hazards No
14.6 Special precautions for user
Special Provisions None
14.7 Maritime transport in bulk according to IMO instruments No information available

RID

14.1 UN number or ID number Not regulated
14.2 UN proper shipping name Not regulated
14.3 Transport hazard class(es) Not regulated
14.4 Packing group Not regulated
14.5 Environmental hazards No
14.6 Special precautions for user
Special Provisions None

ADR

14.1 UN number or ID number Not regulated
14.2 UN proper shipping name Not regulated
14.3 Transport hazard class(es) Not regulated
14.4 Packing group Not regulated
14.5 Environmental hazards No
14.6 Special precautions for user
Special Provisions None

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture**National regulations****Authorisations and/or restrictions on use:**

This product does not contain substances subject to authorisation (UK REACH - Annex XIV).

This product does not contain substances subject to restriction (UK REACH - Annex XVII).

Persistent Organic Pollutants

Not applicable

Export Notification requirements

Not applicable

Named dangerous substances per COMAH Regulations 2015 (as amended)

Not applicable

The Ozone-Depleting Substances Regulations 2015

Not applicable

The Biocidal Products Regulations 2001 (as amended)

Not applicable

The Water Environment (Water Framework Directive) (England and Wales) Regulations 2017 (as amended)

Not applicable

Poisons Act 1972 (Explosive Precursors) Regulations (as Amended)

Not applicable

International Inventories

TSCA

Contact supplier for inventory compliance status

DSL/NDL

Contact supplier for inventory compliance status

EINECS/ELINCS

Contact supplier for inventory compliance status

ENCS

Contact supplier for inventory compliance status

IECSC

Contact supplier for inventory compliance status

KECI

Contact supplier for inventory compliance status

PICCS

Contact supplier for inventory compliance status

AIIC

Contact supplier for inventory compliance status

NZIoC

Contact supplier for inventory compliance status

Legend:

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory

DSL/NDL - Canadian Domestic Substances List/Non-Domestic Substances List

EINECS/ELINCS - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances

ENCS - Japan Existing and New Chemical Substances

IECSC - China Inventory of Existing Chemical Substances

KECL - Korean Existing and Evaluated Chemical Substances

PICCS - Philippines Inventory of Chemicals and Chemical Substances

AIIC - Australian Inventory of Industrial Chemicals

NZIoC - New Zealand Inventory of Chemicals

15.2. Chemical safety assessment**Chemical Safety Report**

No Chemical Safety Assessment has been carried out for this substance/mixture

SECTION 16: Other information

Key or legend to abbreviations and acronyms used in the safety data sheet**Legend**

SVHC: Substances of Very High Concern for Authorisation:

Legend Section 8: Exposure controls/personal protection

TWA TWA (time-weighted average) STEL STEL (Short Term Exposure Limit)
 Ceiling Maximum limit value * Skin designation
 + Sensitisers
 Revision Note ***Indicates updated data since last publication

Classification procedure

Classification according to Regulation (EC) No. 1272/2008 [CLP]	Method Used
Acute oral toxicity	Calculation method
Acute dermal toxicity	Calculation method
Acute inhalation toxicity - gas	Calculation method
Acute inhalation toxicity - vapour	Calculation method
Acute inhalation toxicity - dust/mist	Calculation method
Skin corrosion/irritation	Calculation method
Serious eye damage/eye irritation	Calculation method
Respiratory sensitisation	Calculation method
Skin sensitisation	Calculation method
Mutagenicity	Calculation method
Carcinogenicity	Calculation method
Reproductive toxicity	Calculation method
STOT - single exposure	Calculation method
STOT - repeated exposure	Calculation method
Acute aquatic toxicity	Calculation method
Chronic aquatic toxicity	Calculation method
Aspiration hazard	Calculation method
Ozone	Calculation method

Key literature references and sources for data used to compile the SDS

Agency for Toxic Substances and Disease Registry (ATSDR)
 U.S. Environmental Protection Agency ChemView Database
 European Food Safety Authority (EFSA)
 European Chemicals Agency (ECHA) Committee for Risk Assessment (ECHA_RAC)
 European Chemicals Agency (ECHA) (ECHA_API)
 Environmental Protection Agency
 Acute Exposure Guideline Level(s) (AEGL(s))
 U.S. Environmental Protection Agency Federal Insecticide, Fungicide, and Rodenticide Act
 U.S. Environmental Protection Agency High Production Volume Chemicals
 Food Research Journal
 Hazardous Substance Database
 International Uniform Chemical Information Database (IUCLID)
 National Institute of Technology and Evaluation (NITE)
 Australian National Industrial Chemicals Notification and Assessment Scheme (NICNAS)
 NIOSH (National Institute for Occupational Safety and Health)
 National Library of Medicine's ChemID Plus (NLM CIP)
 National Library of Medicine's PubMed database (NLM PUBMED)
 U.S. National Toxicology Program (NTP)
 New Zealand's Chemical Classification and Information Database (CCID)
 Organisation for Economic Co-operation and Development Environment, Health, and Safety Publications
 Organisation for Economic Co-operation and Development High Production Volume Chemicals Programme
 Organisation for Economic Co-operation and Development Screening Information Data Set
 World Health Organization

Prepared By Lisa Bland

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This material safety data sheet complies with the requirements of UK REACH Regulations (SI 2019/758 as amended)
Take note of Directive 98/24/EC on the protection of the health and safety of workers from the risks related to chemical agents at work

Disclaimer

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The 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, unless specified in the text.

End of Safety Data Sheet