



Revision Date 19-Apr-2012

Revision Number 4

SECTION 1. IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

Product Identifier Product Description: Cat No.

Dibutylgermanium dichloride 381110000; 381110010; 381110050

Relevant identified uses of the substance or mixture and uses advised againstRecommended UseLaboratory chemicalsUses advised againstNo Information available

Details of the supplier of the safety data sheetCompanyAcros Organics BVBAJanssen Pharmaceuticalaan 3a2440 Geel, BelgiumE-mail addressbegel.sdsdes

begel.sdsdesk@thermofisher.com

Emergency Telephone Number

For information in the US, call: 001-800-ACROS-01 For information in Europe, call: +32 14 57 52 11

Emergency Number, Europe: +32 14 57 52 99 Emergency Number, US: 001-201-796-7100

CHEMTREC Phone Number, US: 001-800-424-9300 CHEMTREC Phone Number, Europe: 001-703-527-3887

SECTION 2. HAZARDS IDENTIFICATION

Classification of the substance or mixture REGULATION (EC) No 1272/2008

Acute oral toxicity	Category 3
Acute dermal toxicity	Category 3
Acute Inhalation Toxicity - Dusts and Mists	Category 3
Skin Corrosion/irritation	Category 1 B
Serious Eye Damage/Eye Irritation	Category 1

Classification according to EU Directives 67/548/EEC or 1999/45/EC

For the full text of the R-phrases and H-Statements mentioned in this Section, see Section 16		
Symbol(s)	T - Toxic	
R-phrase(s)	R29 - Contact with water liberates toxic gas	
	R34 - Causes burns	
Risk Combination Phrases	R23/24/25 - Toxic by inhalation, in contact with skin and if swallowed	





Dibutylgermanium dichloride

Revision Date 19-Apr-2012

SECTION 2. HAZARDS IDENTIFICATION

Signal WordDangerHazard StatementsH311 - Toxic in contact with skinH314 - Causes severe skin burns and eye damageH301 - Toxic if swallowedH331 - Toxic if inhaledEUH029 - Contact with water liberates toxic gas

Precautionary Statements - EU (§28, 1272/2008)

P301 + P310 - IF SWALLOWED: Immediately call a POISON CENTER or doctor/ physician

P280 - Wear protective gloves/ protective clothing/ eye protection/ face protection

P312 - Call a POISON CENTER or doctor/ physician if you feel unwell

P302 + P350 - IF ON SKIN: Gently wash with plenty of soap and water

P301 + P330 + P331 - IF SWALLOWED: rinse mouth. Do NOT induce vomiting

P305 + P351 + P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing

P304 + P340 - IF INHALED: Remove to fresh air and keep at rest in a position comfortable for breathing

P402 + P404 - Store in a dry place. Store in a closed container

Other Hazards

No information available.

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Component	EC-No.	Weight %	CAS-No	67/548/EEC Classification	CLP Classification - Regulation (EC) No 1272/2008	REACH No.
Germane, dibutyldichloro- 4593-81-1	EEC No. 224-986-9	98	4593-81-1	T; R23/24/25 R29 C; R34	Skin Corr. 1B (H314) Acute Tox. 3 (H301) Acute Tox. 3 (H311) Acute Tox. 3 (H331) (EUH029)	-





Revision Date 19-Apr-2012

For the full text of the R-phrases and H-Statements mentioned in this Section, see Section 16

SECTION 4. FIRST AID MEASURES

Description of first aid measures Eye Contact	Immediate medical attention is required. Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes.
Skin Contact	Wash off immediately with soap and plenty of water while removing all contaminated clothes and shoes. Immediate medical attention is required.
Ingestion	Do not induce vomiting. Call a physician immediately. Clean mouth with water.
Inhalation	Remove from exposure, lie down. Move to fresh air. If breathing is difficult, give oxygen. If not breathing, give artificial respiration. Immediate medical attention is required.
Notes to Physician	Treat symptomatically

SECTION 5. FIRE-FIGHTING MEASURES

Extinguishing media

Suitable Extinguishing Media

Carbon dioxide (CO₂). Dry chemical. chemical foam.

Extinguishing media which must not be used for safety reasons Water.

Special hazards arising from the substance or mixture

Contact with water liberates toxic gas. Water reactive. Produce flammable gases on contact with water.

Advice for fire-fighters

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Ensure adequate ventilation

Environmental precautions

Prevent further leakage or spillage if safe to do so

Methods and material for containment and cleaning up

SAFETY DATA SHEET



Dibutylgermanium dichloride

Revision Date 19-Apr-2012

Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust). Keep in suitable, closed containers for disposal.

SECTION 7. HANDLING AND STORAGE

Precautions for Safe Handling

Do not breathe dust. Do not breathe vapors or spray mist. Do not get in eyes, on skin, or on clothing. Use only in area provided with appropriate exhaust ventilation.

Conditions for safe storage, including any incompatibilities

Keep in a dry, cool and well-ventilated place. Keep container tightly closed. Store contents under argon. Corrosives area.

Specific End Uses

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

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 limit values	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) Predicted No Effect Concentration (PNEC)	No information available. No information available.
Exposure controls	
Engineering Measures	Ensure adequate ventilation, especially in confined areas Ensure that eyewash stations and safety showers are close to the workstation location
Personal protective equipment Eye Protection Hand Protection Skin and body protection Respiratory Protection	Goggles Protective gloves Wear appropriate protective gloves and clothing to prevent skin exposure Follow the OSHA respirator regulations found in 29 CFR 1910.134 or European Standard EN 149. Use a NIOSH/MSHA or European Standard EN 149 approved respirator if exposure limits are exceeded or if irritation or other symptoms are experienced
Hygiene Measures Environmental exposure controls	Handle in accordance with good industrial hygiene and safety practice No information available.

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Physical State Appearance pH Liquid Clear No information available.





Dibutylgermanium dichloride

Revision Date 19-Apr-2012

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Boiling Point/Range Melting Point/Range Flash Point Autoignition Temperature Specific Gravity Molecular Formula Molecular Weight 242°C / 467.6°F@ 760 mmHg No information available. No information available. No information available. 1.208 C8 H18 Cl2 Ge 257.73

SECTION 10. STABILITY AND REACTIVITY

Reactivity

Chemical Stability

Stable under normal conditions. Moisture sensitive.

Possibility of Hazardous Reactions

Hazardous Polymerization	Hazardous polymerization does not occur.
Hazardous Reactions .	No information available.

Conditions to Avoid

Incompatible products, Exposure to moist air or water.

Incompatible Materials

Strong oxidizing agents, Powdered metals.

Hazardous Decomposition Products

Hydrogen chloride gas. Carbon monoxide (CO). Carbon dioxide (CO₂).

SECTION 11. TOXICOLOGICAL INFORMATION

Information on Toxicological Effects

Acute Toxicity Product Information

No acute toxicity information is available for this product

Component Information

Component	LD50 Oral	LD50 Dermal	LC50 Inhalation
Germane, dibutyldichloro-	100 mg/kg (Rat)		

SAFETY DATA SHEET



Dibutylgermanium dichloride

Revision Date 19-Apr-2012

Chronic Toxicity Carcinogenicity	There are no known carcinogenic chemicals in this product
Sensitization	No information available.
Mutagenic Effects	No information available
Reproductive Effects	No information available.
Developmental Effects	No information available.
Target Organs	No information available.
Other Adverse Effects	The toxicological properties have not been fully investigated. See actual entry in RTECS for complete information
Endocrine Disruptor Information	None known

SECTION 12. ECOLOGICAL INFORMATION

Toxicity

Ecotoxicity effects

Contains no substances known to be hazardous to the environment or that are not degradable in waste water treatment plants

Persistence and degradability

No information available

Bioaccumulative potential

No information available.

Mobility in soil

No information available.

Results of PBT and vPvB assessment

Other adverse effects

No information available

SECTION 13. DISPOSAL CONSIDERATIONS

Waste treatment methods	
Waste from Residues / Unused Products	Dispose of in accordance with local regulations
Contaminated Packaging	Empty containers should be taken to local recyclers for disposal





Dibutylgermanium dichloride

Revision Date 19-Apr-2012

SECTION 14. TRANSPORT INFORMATION

IMDG/IMO

UN-No	2922
Hazard Class	8
Subsidiary Hazard Class	6.1
Packing Group	III
Proper Shipping Name	CORROSIVE LIQUID, TOXIC, N.O.S.

ADR

UN-No	2922
Hazard Class	8
Subsidiary Hazard Class	6.1
Packing Group	III
Proper Shipping Name	CORROSIVE LIQUID, TOXIC, N.O.S.

IATA

UN-No	2922
Hazard Class	8
Subsidiary Hazard Class	6.1
Packing Group	III
Proper Shipping Name	CORROSIVE LIQUID, TOXIC, N.O.S.*

SECTION 15. REGULATORY INFORMATION

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

International Inventories

Component	EINECS	ELINCS	NLP	TSCA	DSL	NDSL	PICCS	ENCS	CHINA	AICS	KECL
Germane, dibutyldichloro-	224-986-9	-		Х	-	Х	-	-	-	-	-

Legend

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

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

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

PICCS - Philippines Inventory of Chemicals and Chemical Substances

ENCS - Japan Existing and New Chemical Substances

CHINA - China Inventory of Existing Chemical Substances

AICS - Inventory of Chemical Substances

KECL - Existing and Evaluated Chemical Substances





Revision Date 19-Apr-2012

Chemical Safety Assessment

SECTION 16. OTHER INFORMATION

Full text of R-phrases referred to under sections 2 and 3 R29 - Contact with water liberates toxic gas R34 - Causes burns R23/24/25 - Toxic by inhalation, in contact with skin and if swallowed

Revision Date Revision Summary Reason for revision 19-Apr-2012

Not applicable

This safety data sheet complies with the requirements of Regulation (EC) No. 1907/2006

Disclaimer The information provided on 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 guide for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered as 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 material or in any process, unless specified in the text.

End of Safety Data Sheet