

SAFETY DATA SHEET

Date of Original Issue: January 12, 2015

Revision Number: Revision Date:

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

1.1 PRODUCT IDENTIFIER

Product name: Daptomycin lyophilized vials

REACH reg.#: Medicinal product, the mixture does not legally require an SDS and REACH pre-registration

1.2 RELEVANT IDENTIFIED USES OF THE SUBSTANCE OR MIXTURE AND USES ADVISED AGAINST

Antibiotic

Product Formulation Name: Daptomycin lyophilized vials

Synonyms: Daptomycin

1.3 DETAILS OF THE SUPPLIER OF THE SAFETY DATA SHEET

Xellia Pharmaceuticals ApS

Dalslandsgade 11 2300 Copenhagen S

Denmark

Responsible person for the safety data sheet (e-mail): sales@xellia.com

1.4 EMERGENCY TELEPHONE NUMBER

Xellia: 32 64 5500 in Denmark

Xellia: + 45 32 64 5500 outside of Denmark

Poison Control Center (USA): 877 800 5553 CANUTEC (Canadian Transportation): 613 996 6666 CHEMTREC (USA Transportation): 800 424 9300

UN #: No applicable information found

COMMENTS: To the best of our knowledge, this MSDS conforms to the requirements of USA OSHA 29 CFR 1910.1200, 1907/2006/EC, 453/2010/EC and Canadian Hazardous Products Act. You are urged to consider laws and regulations applicable to your state and country.

SECTION 2: HAZARDS IDENTIFICATION

EMERGENCY OVERVIEW

This is a medicinal product that may affect body functions. When inside vials the hazard is considered negligible.

2.1 CLASSIFICATION OF THE SUBSTANCE OR MIXTURE

Skin Sens. 1;H317 (May cause an allergic skin reaction) CLP:

2.2 LABEL ELEMENTS:

Contents: Daptomycin



WARNING

H317: May cause an allergic skin reaction.

Avoid breathing dust/fume/gas/mist/vapors/spray

Wear protective gloves/protective clothing/eye protection/face protection.

2.3 OTHER HAZARDS:

None known.

PBT/vPvB: The substance is not considered PBT/vPvB according to criteria in Annex XIII.

SECTION 3: Composition/information on ingredients

3.1 SUBSTANCES:

Active Ingredient Name: Daptomycin

Component	Approximate Percent by Weight	CAS#	RTECS Number
Daptomycin	100	103060-53-3	-

Comments: Product composition ranges shown are typical values for health, safety and environmental use and are not intended as specifications.

SECTION 4: First aid measures

4.1 DESCRIPTION OF FIRST AID MEASURES:

Eye contact: Flush eyes for 15 minutes with plenty of water. If irritation persists or signs of toxicity occur, seek medical attention. **Skin contact:** Remove contaminated clothing and clean before reuse. Wash all exposed areas of skin with plenty of soap and water.

Get medical attention if irritation or rash develops.

Ingestion: Do not induce vomiting. Call a physician or poison control center. Do not give anything by mouth to an unconscious

person. Immediately transport to a medical care facility and see a physician.

Inhalation: Move individual to fresh air. Get medical attention if breathing difficulty occurs. If not breathing, provide artificial

respiration assistance (mouth-to-mouth) and call a physician immediately.

SECTION 5: Firefighting measures

5.1 EXTINGUISHING MEDIA:

Water, carbon dioxide, dry chemical, foam, or other alternatives.

5.2 SPECIAL HAZARDS ARISING FROM THE SUBSTANCE OR MIXTURE:

General hazards: May be combustible at high temperature.

Hazardous combustion products: Oxides of carbon and nitrogen and corrosive hydrogen chloride.

Flash point and method:

Flammable limits:

Auto ignition temperature:

Flammable class:

No applicable information identified.

5.3 ADVICE FOR FIREFIGHTERS:

No applicable information identified. Use water spray to cool fire-exposed containers and structures.

SECTION 6: Accidental release measures

6.1 PERSONAL PRECAUTIONS, PROTECTIVE EQUIPMENT AND EMERGENCY RESPONSE:

Material intended clinical uses only. Handle all pharmaceutical products in a way that will avoid contact with and inhalation of dust, fumes, mists, and / or vapors associated with the product.

6.2 ENVIRONMENTAL PRECAUTIONS:

Water spill: Do not empty into drains.

Land spill: Vacuum material with appropriate dust collection in place. Be aware of potential for dust explosion when using

electrical equipment. If a vacuum is not available, lightly mist material and remove by sweeping or wet wiping. Wear

appropriate equipment including eye protection, to avoid exposure.

Release notes: If the spill could potentially enter any waterway, including intermittent dry creeks, contact the local authorities. In the

USA, contact the USA Coast Guard National Response Center toll free 800 424 8802.

6.3 METHODS AND MATERIALS FOR CONTAINMENT AND CLEANING UP:

For spilled powder, isolate area around spill. Put on suitable protective clothing and equipment as specified by site spill control procedures. Collect the spilled powder using techniques that minimize powder migration. Clean affected area with soap and water. Absorb any liquid with an inert absorbent material (e.g. absorbent pad). Dispose of materials according to the applicable federal, state, or local regulations. If a spill occurs after reconstitution, absorb liquid with suitable material and clean affected area with soap and water. Dispose of materials according to the applicable federal, state, or local regulations

6.4 REFERENCES TO OTHER SECTIONS:

See section 1 for emergency contact information, section 8 for personal protective equipment details, and section 13 for disposal information.

SECTION 7: Handling and storage

7.1 PRECAUTIONS FOR SAFE HANDLING:

No special precautions are required for hazard control. Employees with known allergies to Daptomycin or related antibiotics should consult a health and/or safety professional prior to handling open containers of this material.

Work hygienic practices: Facilities storing or using this material should be equipped with emergency eyewash. Good personal hygiene practices should always be followed.

7.2 CONDITIONS FOR SAFE STORAGE, INCLUDING ANY INCOMPATIBILITIES:

For product protection, follow storage recommendations noted on the product case label, the primary container label, or the product insert. Keep dry, and away from sources of ignition.

7.3 SPECIFIC END USES:

See section 1.

Daptomycin

SECTION 8: Exposure controls/personal protection

8.1 CONTROL PARAMETERS:

OSHA'S hazardous components (29 CFR 1910.1020) **EXPOSURE LIMITS AND GUIDELINES**

ACGIH TLV OSHA PEL OTHER OEL ppm mg/m³ ppm mg/m³ ppm mg/m³ TWA NL NL NL NL 0.1 NL STEL NI NI NI NI NI NI

Other country exposure limits: Not listed.

[CAS 103060-53-3]

8.2 EXPOSURE CONTROLS:

Appropriate engineering controls: Respiratory protection is normally not needed during intended product use. If dust is generated, provide local exhaust ventilation to control airborne levels below the OEL listed above.

Personal protective equipment:

Eyes and face: Wear safety glasses with side shields or goggles as appropriate when handling this material.

Skin: Chemical resistant gloves (nitrile or latex) and body covering.

Respiratory: Use an approved respirator suitable to provide level of protection required.

Comments: This product is not specifically listed by OSHA as hazardous. However, this material may cause sensitization or an allergic response with minimal exposure. Under conditions of overexposure, the material may be hazardous.

SECTION 9: Physical and chemical properties

9.1 INFORMATION ON BASIC PHYSICAL AND CHEMICAL PROPERTIES:

Physical state: Powder (Solid in vials).

Appearance: Pale yellow to light brown powder.

Pale yellow to light brown. Color:

Odor: Slightly musty.

Odor threshold: No applicable information found. 5-6 (1% aqueous solution) pH: . Vapour pressure: No applicable information found. No applicable information found. Vapour density: **Evaporation rate:** No applicable information found.

Not applicable. Freezing point:

Melting point: No applicable information found.

Boiling point: No applicable information found as this is a powder.

Flash point: No applicable information found. **Decomposition temperature:** No applicable information found. Flammability: No applicable information found.

Upper/lower flammability or explosive limits (vol-%): No applicable information found.

Auto-ignition temperature: No applicable information found.

Soluble in water: Soluble.

Density: No applicable information found.

Specific gravity: No applicable information found as this is a powder.

Viscosity: No applicable information found. **Explosive properties:** No applicable information found. Oxidising properties: No applicable information found.

Molecular formula: C72 H101 N17 O26

Molecular weight: 1619.71

Coefficient of oil and water: No applicable information found.

OTHER INFORMATION:

None relevant.

9.2 OTHER INFORMATION:

None relevant.

SECTION 10: Stability and reactivity

10.1 REACTIVITY: No applicable information found.

10.2 CHEMICAL STABILITY: Stable at normal temperatures and pressures. **10.3 POSSIBILITY OF HAZARDOUS REACTIONS:** No applicable information found.

10.4 CONDITIONS TO AVOID: Avoid heat, moisture, and sunlight.

10.5 INCOMPATIBLE MATERIALS: May react with strong oxidizing agents (e.g., peroxides, permanganates, nitric acid, etc.)

10.6 HAZARDOUS DECOMPOSITION PRODUCTS: If heated to very high temperatures, the product may form hazardous decomposition products such as oxides of carbon and nitrogen and corrosive hydrogen chloride.

SECTION 11: Toxicological information

11.1 INFORMATION ON TOXICOLOGICAL EFFECTS:

Acute Toxicity - Not determined for the product formulation. Information for the ingredients is as follows:

Acute dermal LD₅₀: >500 mg/kg, rabbit; no deaths or toxicity >2000 mg/kg, rat, no deaths or toxicity >2000 mg/m³, rat (4 hours); no deaths

Eye effects: Sligth irritant (rabbit)
Skin effects: Sligth irritant (rabbit)
Sensitization: Sensitizer (human)

Target organs: Muscles, nervous system and kidney.

Carcinogenicity:

Listed by IARC: No Listed by NTP: No Listed by OSHA: No

Mutagenicity:No applicable information found.Reproductive effects:No applicable information found.Teratogenic effects:Negative in rats and rabbits.

SECTION 12: Ecological information

12.1 TOXICITY:
No applicable information found.
12.2 PERSISTENCE AND DEGRADABILITY:
No applicable information found.
12.3 BIOACCUMULATIVE POTENTIAL:
No applicable information found.
12.4 MOBILITY IN SOIL:
No applicable information found.

12.5 RESULTS OF PBT AND VPVB ASSESSMENT: The substance is not considered PBT/vPvB according to criteria in

Annex XIII.

12.6 OTHER ADVERSE EFFECTS: The substance is possibly harmful for the aquatic environment, due

to is antibiotic properties.

SECTION 13: Disposal considerations

13.1 WASTE TREATMENT METHODS:

Disposal (includes Spills, Empty Containers): Dispose of any cleanup materials and waste residue according to applicable laws and regulations.

SECTION 14: Transport information

14.1 UN NUMBER:
Not regulated.
14.2 UN PROPER SHIPPING NAME:
Not relevant.
14.3 TRANSPORT HAZARD CLASS(ES):
Not relevant.
Not relevant.
Not relevant.
Not relevant.
Not relevant.
None.

14.7 TRANSPORT IN BULK ACCORDING TO ANNEX II MARPOL 73/78 AND THE IBC CODE: Not relevant.

USA DOT (DEPARTMENT OF TRANSPORTATION)

Proper Shipping Name: Not regulated CANADA TRANSPORT OF DANGEROUS GOODS

Proper Shipping Name: Not regulated.

AIR (ICAO/IATA)

Proper Shipping Name: Not regulated.

VESSEL (IMO/IMDG)

Proper Shipping Name: Not regulated.

EUROPEAN TRANSPORTATION:

ADR/RID HAZARD CLASSIFICATION: Not regulated. U.S. CUSTOMS HARMONIZATION NUMBER: Not regulated.

SECTION 15: Regulatory information

15.1 SAFETY, HEALTH AND ENVIRONMENTAL REGULATION/LEGISLATION SPECIFIC FOR THE SUBSTANCE OR MIXTURE:

This section contains selected regulatory information for possible use by Xellia Pharmaceuticals. This section is not intended to be a complete listing of all applicable regulations. You are urged to consider laws and regulations applicable to your state and country.

EUROPEAN COMMUNITY

Regulation (EC) No 1907/2006 of the European Parliament and of the Council of 18 December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH),

Council Directive 94/33/EC of 22 June 1994 on the protection of young people at work:

Must not be used by persons under 18 years of age.

Council Directive 92/85/EEC of 19 October 1992 on the introduction of measures to encourage improvements in the safety and health at work of pregnant workers and workers who have recently given birth or are breastfeeding:

Not regulated. However, it is recommended, that the employer assess the working conditions and, if there is any risk to the safety or health and any effects on the pregnancy or breastfeeding of workers, take the necessary measures to adjust the working conditions.

Implementation of directive 2001/82/EC of the European Parliament and of the council of 6 November 2001 in the Community code relating to veterinary medical products:

Denmark: The Danish Medicines Agency (Lægemiddelstyrelsen) must be notified that this substance is produced, imported, exported, stored, sold, delivered, packed, possessed or in other ways handled in Denmark (Bekendtgørelse nr. 1226 af 7. December 2005 om omgang med visse stoffer og produkter hvis indhold kan anvendes som lægemidler til dyr.). For other countries: Please contact national authorities regarding notification of the substance.

UNITED STATES FEDERAL REGULATIONS

Superfund Amendments and Reauthorization Act (SARA) Title III 311/312 hazard categories:

Fire: No Pressure generating: No Reactivity: No Acute: Yes Chronic: No

313 Reportable Ingredients: Not listed.

Title III notes:

Comprehensive Response, Compensation, and Liability Act (CERCLA)

CERCLA RQ: Not listed

Toxic Substances Control Act (TSCA)

TSCA Regulatory: Not listed.

National Response Center: US Coast Guard National Center Response Telephone number is 800 424 8802.

UNITED STATES STATE REGULATIONS

California Proposition 65: Not listed.

CANADA

Workplace Hazardous Material Information System (WHMIS) hazard symbol and classification

WHMIS Controlled: Not regulated.

Canadian Environmental Protection Act: Not listed.

15.2 CHEMICAL SAFETY ASSESSMENT:

No CSR.

SECTION 16: Other information'

Reason for issue: EC regulation, REACH and CLP

Contact Information: See Section 1

Revision summary: 1-16

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Data sources: Micromedex DrugDex: Mosby's Drug Consult: Physicians Desk Reference.

Disclaimer: Information given herein is offered in good faith as accurate, but without guarantee. Conditions of use and suitability of the product for particular uses are beyond our control; all risks of use of the product are therefore assumed by the user. Nothing is intended as a recommendation for uses that infringe valid patents or as extending license under valid patents. Appropriate warnings and safe handling procedures should be provided to handlers and users.

Glossary:

ACGIH - American Conference of Governmental Hygienists

AIHA - American Industrial Hygiene Association

BEI - Biological Exposure Index

CAS - Chemical Abstract Service Registry Number

CSR - Chemical Safety Report

CERCLA - Comprehensive Environmental Response Compensation and Liability Act of 1989

CHEMTREC - Chemical Transportation Emergency Center

DOT - Department of Transportation (USA)

EC - European Community

EINECS - European Inventory of Existing Chemical Substances

ELINCS - European List of New Chemical Substances

EPA - Environmental Protection Agency

FDA - United States Food and Drug Administration

HEPA- High Efficiency Particulate Air (Filter)

HMIS - Hazardous Material Information System

IARC- International Agency on Research for Cancer

ICAO/IATA - International Civil Aviation Organization/International Air Transport Association

IMO - International Maritime Organization

LEL - Lower Explosive Limit

MSDS - Material Safety Data Sheet

MSHA - Mine Safety and Health Administration

NA - Not Applicable

NADA - New Animal Drug Application

NAIF - No Applicable Information Found

NCI - National Cancer Institute

ND - Not Determined

NFPA - National Fire Protection Association

NIOSH - National Institute for Occupational Health and Safety

NL - Not Listed

NOS - Not Otherwise Specified

NTP - National Toxicology Program

OEL - Occupational Exposure Limit

OSHA - Occupational Safety and Health Administration

PEL - Permissible Exposure Limit (USA)

RCRA - Resource Conservation and Recovery Act

RQ - Reportable Quantity

RTECS - Registry of Toxic Effects of Chemical Substances

SARA - Superfund Amendments and Reauthorization Act

STEL - Short Term Exposure Limit

TLV - Threshold Limit Value

TPQ - Threshold Planning Quantity

TSCA – Toxic Substances Control Act TWA – Time Weighted Average

UEL - Upper Explosive Limit

UN - United Nations

WEEL - Workplace Environmental Exposure Level (USA - AIHA)