Safety data sheet legislation

This SDS is an English translation of COMMISSION REGULATION (EU) 2020/878, without any country-specific NZYtech

## CZ0508 - Levanase 32B, Bacillus subtilis

Date of	compilation: 23/06/20	20 Revised: 12/10/2023	Version: 2 (Replaced 1)
SECT	TION 1: IDENTIFIC	ATION OF THE SUBSTANCE/M	1IXTURE AND OF THE COMPANY/UNDERTAKING
1.1	Product identifier	: CZ0508 - Levanase 32B, Bacillus	s subtilis
		Glycerol	
	CAS:	56-81-5	
	EC:	200-289-5	
	Index:	Non-applicable	
	REACH:	01-2119471987-18-XXXX	
	Other means of id	entification:	
	Non-applicable		
1.2	Relevant identifie	d uses of the substance or mixt	ture and uses advised against:
	Relevant uses: Labo	ratory. For professional users only.	
	Uses advised agains	t: All uses not specified in this secti	ion or in section 7.3
1.3	Details of the sup	plier of the safety data sheet:	
	NZYTech Estrada do Paco do I 1649-038 Lisboa - L info@nzytech.com www.nzytech.com	_umiar Campus do Lumiar - Edif. E, isboa - Portugal	r/c
1.4	Emergency teleph	one number: Contact Local Poise	on Information Center or Local Emergency Number
SECT	TION 2: HAZARDS	IDENTIFICATION **	
2.1	Classification of t	ne substance or mixture:	

## CLP Regulation (EC) No 1272/2008:

Classification of this product has been carried out in accordance with CLP Regulation (EC) No 1272/2008.

Eye Irrit. 2: Eye irritation, Category 2, H319 Repr. 1B: Reproductive toxicity, Category 1B, H360D Skin Irrit. 2: Skin irritation, Category 2, H315

Label elements: 2.2

#### CLP Regulation (EC) No 1272/2008:

Labelling of packages where the contents do not exceed 125 ml:

Danger



#### Hazard statements:

Repr. 1B: H360D - May damage the unborn child.

#### **Precautionary statements:**

P201: Obtain special instructions before use.

P280: Wear protective gloves/face protection/protective clothing/respiratory protection/protective footwear.

P308+P313: IF exposed or concerned: Get medical advice/attention.

P501: Dispose of contents/container in accordance with regulations on hazardous waste or packaging and packaging waste respectively.

#### Substances that contribute to the classification

Imidazole (CAS: 288-32-4)

#### Additional Labelling:

Restricted to professional users

#### 2.3 **Other hazards:**

\*\* Changes with regards to the previous version

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# **NZYtech**

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## SECTION 2: HAZARDS IDENTIFICATION \*\* (continued)

Product does not meet PBT/vPvB criteria

Endocrine-disrupting properties: The product does not meet the criteria.

\*\* Changes with regards to the previous version

#### SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

#### 3.1 Substance:

#### Chemical description: Mixture of substances

#### Components:

In accordance with Annex II of Regulation (EC) No 1907/2006 (point 3), the product contains:

	Identification	Chemical name/Classification			
CAS:	288-32-4	Imidazole <sup>(1)</sup>		Self-classified	
EC: Index: REACH:	206-019-2 Non-applicable 01-2119485825-24- XXXX	Regulation 1272/2008	Acute Tox. 4: H302; Eye Dam. 1: H318; Repr. 1B: H360D; Skin Corr. 1C: H314 - Danger	(I) (I) (I) (I) (I) (I) (I) (I) (I) (I)	1 - <2,5 %

<sup>(1)</sup> Substances presenting a health or environmental hazard which meet criteria laid down in Regulation (EU) No. 2020/878

To obtain more information on the hazards of the substances consult sections 11, 12 and 16.

#### 3.2 Mixture:

#### Non-applicable

Acute toxicity estimate for the substance in Part 3 of Annex VI to Regulation (EC) No 1272/2008 or as determined in accordance with Annex I to that Regulation:

Identification	Acu	Genus	
Imidazole	LD50 oral	500 mg/kg (ATEi)	
CAS: 288-32-4	LD50 dermal	Non-applicable	
EC: 206-019-2	LC50 inhalation	Non-applicable	

## SECTION 4: FIRST AID MEASURES

#### 4.1 Description of first aid measures:

The symptoms resulting from intoxication can appear after exposure, therefore, in case of doubt, seek medical attention for direct exposure to the chemical product or persistent discomfort, showing the SDS of this product.

## By inhalation:

This product does not contain substances classified as hazardous for inhalation, however, in case of symptoms of intoxication remove the person affected from the exposure area and provide with fresh air. Seek medical attention if the symptoms get worse or persist.

#### By skin contact:

Remove contaminated clothing and footwear, rinse skin or shower the person affected if appropriate with plenty of cold water and neutral soap. In serious cases see a doctor. If the product causes burns or freezing, clothing should not be removed as this could worsen the injury caused if it is stuck to the skin. If blisters form on the skin, these should never be burst as this will increase the risk of infection.

#### By eye contact:

Rinse eyes thoroughly with lukewarm water for at least 15 minutes. Do not allow the person affected to rub or close their eyes. If the injured person uses contact lenses, these should be removed unless they are stuck to the eyes, in which case this could cause further damage. In all cases, after cleaning, a doctor should be consulted as quickly as possible with the SDS of the product.

#### By ingestion/aspiration:

Do not induce vomiting, but if it does happen keep the head down to avoid aspiration. Keep the person affected at rest. Rinse out the mouth and throat, as they may have been affected during ingestion.

#### 4.2 Most important symptoms and effects, both acute and delayed:

Acute and delayed effects are indicated in sections 2 and 11.

#### 4.3 Indication of any immediate medical attention and special treatment needed:

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## SECTION 4: FIRST AID MEASURES (continued)

Non-applicable

## SECTION 5: FIREFIGHTING MEASURES

#### 5.1 Extinguishing media:

#### Suitable extinguishing media:

Product is non-flammable under normal conditions of storage, handling and use. In the case of combustion as a result of improper handling, storage or use preferably use polyvalent powder extinguishers (ABC powder), in accordance with the Regulation on fire protection systems.

### Unsuitable extinguishing media:

Non-applicable

#### 5.2 Special hazards arising from the substance or mixture:

As a result of combustion or thermal decomposition reactive sub-products are created that can become highly toxic and, consequently, can present a serious health risk.

#### 5.3 Advice for firefighters:

Depending on the magnitude of the fire it may be necessary to use full protective clothing and self-contained breathing apparatus (SCBA). Minimum emergency facilities and equipment should be available (fire blankets, portable first aid kit,...) in accordance with Directive 89/654/EC.

#### Additional provisions:

Act in accordance with the Internal Emergency Plan and the Information Sheets on actions to take after an accident or other emergencies. Eliminate all sources of ignition. In case of fire, cool the storage containers and tanks for products susceptible to combustion, explosion or BLEVE as a result of high temperatures. Avoid spillage of the products used to extinguish the fire into an aqueous medium.

### SECTION 6: ACCIDENTAL RELEASE MEASURES

#### 6.1 Personal precautions, protective equipment and emergency procedures:

#### For non-emergency personnel:

Isolate leaks provided that there is no additional risk for the people performing this task. Personal protection equipment must be used against potential contact with the spilt product (See section 8). Evacuate the area and keep out those who do not have protection.

#### For emergency responders:

Wear protective equipment. Keep unprotected persons away. See section 8.

#### 6.2 Environmental precautions:

This product is not classified as hazardous to the environment. Keep product away from drains, surface and ground water.

#### 6.3 Methods and material for containment and cleaning up:

It is recommended:

Absorb the spillage using sand or inert absorbent and move it to a safe place. Do not absorb in sawdust or other combustible absorbents. For any concern related to disposal consult section 13.

#### 6.4 Reference to other sections:

See sections 8 and 13.

#### SECTION 7: HANDLING AND STORAGE

#### 7.1 Precautions for safe handling:

A.- General precautions for safe use

Comply with the current legislation concerning the prevention of industrial risks with regards manually handling weights. Maintain order, cleanliness and dispose of using safe methods (section 6).

B.- Technical recommendations for the prevention of fires and explosions



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## CZ0508 - Levanase 32B, Bacillus subtilis

	TION 7: HANDLING AND STORAGE (	continued)				
	TION 7. HANDLING AND STORAGE (C					
	Product is non-flammable under norm to avoid the generation of electrostal conditions and materials that should C Technical recommendations on gener	tic charges that can a be avoided.	iffect flammable p			
	PREGNANT WOMEN SHOULD NOT BI necessary safety conditions (emerge equipment, especially on the hands a	E EXPOSED TO THIS ncy showers and eye nd face (See section &	PRODUCT. Trans wash stations in o 3). Limit manual tr	close proximity), ransfers to small	using personal	protection
	drink during the process, washing ha D Technical recommendations to preven	nt environmental risks	-			
	It is recommended to have absorbent	material available at	close proximity to	the product (Se	e subsection 6.3	3)
7.2	Conditions for safe storage, including	g any incompatibilit	ies:			
	A Technical measures for storage					
	Store in a cool, dry, well-ventilated loo	cation				
B General conditions for storage						
Avoid sources of heat, radiation, static electricity and contact with food. For additional information see subsection 10.5						ction 10.5
7.3	Specific end use(s):					
	Except for the instructions already specifi	ied it is not necessary	to provide any sp	ecial recommend	lation regarding	the uses of this
	product.					
	TION 8: EXPOSURE CONTROLS/PERS Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational exp	e limits have to be mo	nitored in the wor			try-specific
5ECT 3.1	<b>Control parameters:</b> Substances whose occupational exposure legislation):	e limits have to be mo	nitored in the wor bstances containe	ed in the product		
	Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational exp DNEL (Workers):	e limits have to be mo	nitored in the wor bstances containe Short	ed in the product	Long	) exposure
	Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational expo DNEL (Workers): Identification	e limits have to be mor osure limits for the su	nitored in the wor bstances containe Short Systemic	ed in the product exposure Local	Long	g exposure
	Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational exp DNEL (Workers):	e limits have to be mo	nitored in the wor bstances containe Short	ed in the product	Long	) exposure
	Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational expo DNEL (Workers): Identification Imidazole	e limits have to be mo osure limits for the su Oral	nitored in the wor bstances containe Short Systemic Non-applicable	ed in the product exposure Local Non-applicable	Long Systemic Non-applicable	g exposure Local Non-applicable
	Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational expo DNEL (Workers): Identification Imidazole CAS: 288-32-4	e limits have to be mo osure limits for the su Oral Dermal	nitored in the wor bstances containe Short Systemic Non-applicable Non-applicable	ed in the product exposure Local Non-applicable Non-applicable	Systemic Non-applicable 1,5 mg/kg	g exposure Local Non-applicable Non-applicable
	Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational expo DNEL (Workers): Identification Imidazole CAS: 288-32-4 EC: 206-019-2	e limits have to be mo osure limits for the su Oral Dermal	nitored in the wor bstances containe Short Systemic Non-applicable Non-applicable	ed in the product exposure Local Non-applicable Non-applicable	Systemic Non-applicable 1,5 mg/kg	g exposure Local Non-applicable Non-applicable
	Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational expo DNEL (Workers): Identification Imidazole CAS: 288-32-4 EC: 206-019-2 DNEL (General population):	e limits have to be mo osure limits for the su Oral Dermal	nitored in the wor bstances containe Short Systemic Non-applicable Non-applicable	ed in the product exposure Local Non-applicable Non-applicable	Systemic Non-applicable 1,5 mg/kg	g exposure Local Non-applicable Non-applicable
	Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational expo DNEL (Workers): Identification Imidazole CAS: 288-32-4 EC: 206-019-2 DNEL (General population): Non-applicable	e limits have to be mo osure limits for the su Oral Dermal	nitored in the wor bstances containe Short Systemic Non-applicable Non-applicable	ed in the product exposure Local Non-applicable Non-applicable	Systemic Non-applicable 1,5 mg/kg	g exposure Local Non-applicable Non-applicable
	Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational expo DNEL (Workers): Identification Imidazole CAS: 288-32-4 EC: 206-019-2 DNEL (General population): Non-applicable PNEC:	e limits have to be mo osure limits for the su Oral Dermal	nitored in the wor bstances containe Short Systemic Non-applicable Non-applicable	ed in the product exposure Local Non-applicable Non-applicable	Long Systemic Non-applicable 1,5 mg/kg 10,6 mg/m <sup>3</sup>	g exposure Local Non-applicable Non-applicable
	Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational expo DNEL (Workers): Identification Imidazole CAS: 288-32-4 EC: 206-019-2 DNEL (General population): Non-applicable PNEC: Identification	e limits have to be mor osure limits for the su Oral Dermal Inhalation STP Soil	nitored in the wor bstances containe Short Non-applicable Non-applicable Non-applicable	ed in the product  a exposure  Local  Non-applicable  Non-applicable  Fresh water  Marine water	Long       Systemic       Non-applicable       1,5 mg/kg       10,6 mg/m <sup>3</sup>	J exposure Local Non-applicable Non-applicable Non-applicable
	Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational expo DNEL (Workers): Identification Imidazole CAS: 288-32-4 EC: 206-019-2 DNEL (General population): Non-applicable PNEC: Identification Imidazole	e limits have to be mor osure limits for the su Oral Dermal Inhalation STP Soil Intermittent	nitored in the wor bstances containe Short Systemic Non-applicable Non-applicable Non-applicable	ed in the product exposure Local Non-applicable Non-applicable Non-applicable Fresh water Karine water Sediment (Fresh	Systemic       Non-applicable       1,5 mg/kg       10,6 mg/m <sup>3</sup>	y exposure Local Non-applicable Non-applicable Non-applicable ,13 mg/L ,013 mg/L ,336 mg/kg
3.1	Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational expo DNEL (Workers): Identification Imidazole CAS: 288-32-4 EC: 206-019-2 DNEL (General population): Non-applicable PNEC: Identification Imidazole CAS: 288-32-4 EC: 206-019-2	e limits have to be mor osure limits for the su Oral Dermal Inhalation STP Soil	nitored in the wor bstances containe Short Non-applicable Non-applicable Non-applicable	ed in the product  a exposure  Local  Non-applicable  Non-applicable  Fresh water  Marine water	Systemic       Non-applicable       1,5 mg/kg       10,6 mg/m <sup>3</sup>	J exposure Local Non-applicable Non-applicable Non-applicable
	Control parameters: Substances whose occupational exposure legislation): There are no applicable occupational expo DNEL (Workers): Identification Imidazole CAS: 288-32-4 EC: 206-019-2 DNEL (General population): Non-applicable PNEC: Identification Imidazole CAS: 288-32-4	e limits have to be mor osure limits for the su Oral Dermal Inhalation STP Soil Intermittent Oral	nitored in the wor bstances containe Short Non-applicable Non-applicable Non-applicable 10 mg/L 0,043 mg/kg 1,3 mg/L Non-applicable	ed in the product exposure Local Non-applicable Non-applicable Non-applicable Fresh water Karine water Sediment (Fresh	Systemic       Non-applicable       1,5 mg/kg       10,6 mg/m <sup>3</sup>	y exposure Local Non-applicable Non-applicable Non-applicable ,13 mg/L ,013 mg/L ,336 mg/kg

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## CZ0508 - Levanase 32B, Bacillus subtilis

Image: Second							
Winter Presentation Yate protectionFilter mask for gases and vapoursC.T. Specific protection for the handsEN 405:2002+A1:2010Contaminant comes with warni recommended to use isolation ed contaminant comes with warni recommended to use isolation edC Specific protection for the handsImage: CEN StandardRemarksImage: CEN StandardRemarksRemarksImage: CEN Standard	Pictogram		PPE	Labelling	CEN Standard		Remarks
Performan         PPE         Labelling         CEN Standard         Remarks           Windstart         Chemical protective gloves (Material: PVC, Breakthrough Um: > Held min, Thickness: 0.7 mm)         EN ISO 21420:2020         Replace the gloves at any sign of de protection           D Eye and face protection         Face shield         EN ISO 21420:2020         Clean daily and disinfect periodically the manufacturer's information sub risk of splashing.           E Body protection         Face shield         EN IGS 2002 EN IGS 2002 EN IGS 2002 EN IGS 2002 EN IGS 2002 EN ISS 2002 EN ISS 2003 EN ISS 2	respiratory tra			CATIN	EN 405:2002+A1:2010	c	place when there is a taste or smell of th ontaminant inside the face mask. If the contaminant comes with warnings it is commended to use isolation equipment
Image: Change of the second	C Specific prote	ection for the	hands				
Mardelony hand protectionMaterial: PVC, Breaktfriough 0.7 mm)EN ISO 21420:2020Replace the gloves at any sign of deD. Eye and face protectionPretogram PPE Labelling CEN Standard Remarks EN 166:2002 EN 150 4007:2018Mardelony face protectionRenarksEn top: 2002 EN 150 4007:2018Cen standardRemarksCen standardRemarksEn top: 2002 EN 150 4007:2018Clean daily and disinfect periodically the manufacturer's in sisk of splashing.E- Body protectionEt togram PPE Labelling CEN Standard Remarks EN 150:2005+A1:2009 EN 150 4007:2018ProtectionMardelony complete protection against chemical rotection riskEN 150:20345:2011 EN 150:2044+1:2011,150:38 EN 150:3864+1:2011,150:3864+1:2011 EN 150:3864+1:2011,1	Pictogram	1	PPE	Labelling	CEN Standard		Remarks
PictogramPPELabellingCEN StandardRemarksWindstory face protectionFace shieldCEN StandardCEN 166:2002 EN 166:2002 EN 168:2002 EN 168:2002 EN 150 4007:2018Clean daily and disinfect periodically the manufacturer's instructions. Us risk of splashing.F. Body protectionPPELabellingCEN StandardRemarksFor professional use only. Clean p EN 150 4007:2018For professional use only. Clean p EN 150 13982- 1:2004/A1:2010 EN 150 6539:2013 EN 150 20345:2011 EN 203864-1:2011, 150 3864-4:2011 EN 203 205 204 205 204 205 204 205 204 205 204 205 204 205 204 205 204 205 204 205 204 205		(Material: time: > 48	PVC, Breakthrough 80 min, Thickness:	CAT III	EN ISO 21420:2020	Rep	lace the gloves at any sign of deterioration
Image: Constraint of the second sec	D Eye and face	protection					
Image: Constraint of the product of	Pictogram	1	PPE	Labelling	CEN Standard		Remarks
PictogramPPELabellingCEN StandardRemarksImage: Constraint of the product of the produc			ēace shield	CAT II	EN 167:2002 EN 168:2002		n daily and disinfect periodically according nanufacturer's instructions. Use if there risk of splashing.
Image: Content of the product of th	E Body protecti	ion				•	
Image: Note: The second seco	Pictogram	1	PPE	Labelling	CEN Standard		Remarks
Image: Note: The protection against chemical risk       Image: The protection against chemical risk       Image: The protection against chemical risk       Image: The protection against chemical risk       The protection risk         <		protectio	n against chemical		EN 168:2002 EN ISO 13982- 1:2004/A1:2010 EN ISO 6529:2013 EN ISO 6530:2005		r professional use only. Clean periodicall ording to the manufacturer's instructions
Emergency measure       Standards       Emergency measure       Standards         Image: Ansize the standards       Ansize the standards       Image: Ansize the standards	protection	protectio ot	n against chemical risk			R	eplace boots at any sign of deterioration.
ANSI Z358-1 ISO 3864-1:2011, ISO 3864-4:2011       Image: Control of the second state	F Additional em	nergency mea	sures				
Image: Interpretence with the community legislation for the protection of the environment it is recommended to avoid enviror spillage of both the product and its container. For additional information see subsection 7.1.D       Iso 3864-1:2011, ISO 38         Volatile organic compounds:       Image: Iso 3864-1:2011, ISO 3864-4:2011       Image: Iso 3864-1:2011, ISO 38	Emergenc	cy measure	St	andards	Emergency me	asure	Standards
In accordance with the community legislation for the protection of the environment it is recommended to avoid enviror spillage of both the product and its container. For additional information see subsection 7.1.D <b>Volatile organic compounds:</b>	Emergen	cy shower				ons	DIN 12 899 ISO 3864-1:2011, ISO 3864-4:2011
In accordance with the community legislation for the protection of the environment it is recommended to avoid enviror spillage of both the product and its container. For additional information see subsection 7.1.D <b>Volatile organic compounds:</b>	Environmental	exposure co	ontrols:				
	In accordance wi spillage of both t	ith the commu the product a	unity legislation f nd its container.				
	With regard to Di	irective 2010/	75/EU, this prod	luct has the follo	owing characteristics:		
V.O.C. (Supply): 0 % weight	V.O.C. (Supp	ly):	0 % v	weight			
V.O.C. density at 20 °C: 0 kg/m <sup>3</sup> (0 g/L)			0 kg/	m³ (0 a/l )			
Average carbon number: Non-applicable	V.O.C. densit	ly at 20 °C:	U Kg/I				

## SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

## 9.1 Information on basic physical and chemical properties:

\*Not relevant due to the nature of the product, not providing information property of its hazards.



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-CT	compilation: 23/06/2020 Revised: 12/10/2023	S (continued)					
	For complete information see the product datasheet.	S (continued)					
	Appearance:						
	Physical state at 20 °C:	Liquid					
	Appearance:	Not available					
	Colour:	Colourless					
	Odour:	Odourless					
	Odour threshold:	Non-applicable *					
	Volatility:	Non applicable					
	Boiling point at atmospheric pressure:	Non-applicable *					
	Vapour pressure at 20 °C:	Non-applicable *					
	Vapour pressure at 50 °C:	Non-applicable *					
	Evaporation rate at 20 °C:	Non-applicable *					
	Product description:						
	Density at 20 °C:	1110,8 kg/m³					
	Relative density at 20 °C:	1,111					
	Dynamic viscosity at 20 °C:	Non-applicable *					
	Kinematic viscosity at 20 °C:	Non-applicable *					
	Kinematic viscosity at 40 °C:	Non-applicable *					
	Concentration:	Non-applicable *					
	pH:	7,2					
	Vapour density at 20 ºC:	Non-applicable *					
	Partition coefficient n-octanol/water 20 °C:	Non-applicable *					
	Solubility in water at 20 ºC:	Non-applicable *					
	Solubility properties:	Non-applicable *					
	Decomposition temperature:	Non-applicable *					
	Melting point/freezing point:	Non-applicable *					
	Flammability:						
	Flash Point:	Non Flammable (>60 °C)					
	Flammability (solid, gas):	Non-applicable *					
	Autoignition temperature:	480 °C					
	Lower flammability limit:	Non-applicable *					
	Upper flammability limit:	Non-applicable *					
	Particle characteristics:						
	Median equivalent diameter:	Non-applicable					
2	Other information:						
	Information with regard to physical hazard clas	ises:					
	Explosive properties:	Non-applicable *					
	Oxidising properties:	Non-applicable *					
	Corrosive to metals:	Non-applicable *					
	Heat of combustion:	Non-applicable *					
	Aerosols-total percentage (by mass) of flammable components:	Non-applicable *					
	Other safety characteristics:	Non applicable *					
	Surface tension at 20 °C:	Non-applicable *					

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ate of compilation: 23/06/2020 Revised: 12/10/2023 Version: 2 (Replaced 1)							
SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES (continued)							
	Refraction index: Non-applicable *						
	*Not relevant due to the nature o	f the product, not providing info	ormation property of its hazards.				
SECT	ION 10: STABILITY AND	REACTIVITY					
10.1	Reactivity:						
10.2	No hazardous reactions are expected because the product is stable under recommended storage conditions. See section 7 from Safety Data Sheet. 2 Chemical stability:						
	Chemically stable under the	indicated conditions of st	torage, handling and use.				
10.3	Possibility of hazardous	reactions:					
	Under the specified condition	ons, hazardous reactions t	hat lead to excessive temp	peratures or pressure are r	not expected.		
10.4	0.4 Conditions to avoid:						
	Applicable for handling and storage at room temperature:						
	Shock and friction	Contact with air	Increase in temperature	Sunlight	Humidity		
	Not applicable	Not applicable	Not applicable	Not applicable	Not applicable		
10.5	Incompatible materials:						
	Acids	Water	Oxidising materials	Combustible materials	Others		

#### **10.6 Hazardous decomposition products:**

Avoid strong acids

See subsection 10.3, 10.4 and 10.5 to find out the specific decomposition products. Depending on the decomposition conditions, complex mixtures of chemical substances can be released: carbon dioxide (CO<sub>2</sub>), carbon monoxide and other organic compounds.

Precaution

Not applicable

Avoid alkalis or strong bases

#### SECTION 11: TOXICOLOGICAL INFORMATION

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

Not applicable

The experimental information related to the toxicological properties of the product itself is not available

#### Dangerous health implications:

In case of exposure that is repetitive, prolonged or at concentrations higher than the recommended occupational exposure limits, adverse effects on health may result, depending on the means of exposure:

- A- Ingestion (acute effect):
  - Acute toxicity: Based on available data, the classification criteria are not met, however, it contains substances classified as dangerous for consumption. For more information see section 3.
  - Corrosivity/Irritability: The consumption of a considerable dose can cause irritation in the throat, abdominal pain, nausea and vomiting.
- B- Inhalation (acute effect):
  - Acute toxicity : Based on available data, the classification criteria are not met, as it does not contain substances classified as hazardous for inhalation. For more information see section 3.
  - Corrosivity/Irritability: Based on available data, the classification criteria are not met. However, it does contain substances classified as hazardous for this effect. For more information see section 3.
- C- Contact with the skin and the eyes (acute effect):
  - Contact with the skin: Produces skin inflammation.
  - Contact with the eyes: Produces eye damage after contact.
- D- CMR effects (carcinogenicity, mutagenicity and toxicity to reproduction):
  - Carcinogenicity: Based on available data, the classification criteria are not met, as it does not contain substances classified as hazardous for the effects mentioned. For more information see section 3.
  - IARC: Non-applicable
  - Mutagenicity: Based on available data, the classification criteria are not met, as it does not contain substances classified as hazardous for this effect. For more information see section 3.
  - Reproductive toxicity: May damage the unborn child.



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	compilation: 23/06/2020	Revised: 12/10/2023	```	eplaced 1)				
ECT.	ION 11: TOXICOLOGICA	L INFORMATION (cont	inued)					
	E- Sensitizing effects:							
	hazardous with sensitisi - Skin: Based on availa hazardous for this effec	<ul> <li>Respiratory: Based on available data, the classification criteria are not met, as it does not contain substances classified as hazardous with sensitising effects. For more information see section 3.</li> <li>Skin: Based on available data, the classification criteria are not met, as it does not contain substances classified as hazardous for this effect. For more information see section 3.</li> <li>Specific target organ toxicity (STOT) - single exposure:</li> </ul>						
	Based on available data, this effect. For more inf	, the classification criteria a formation see section 3.	are not met, as it doe	s not contain sub	stances classified as h	azardous for		
	G- Specific target organ tox	icity (STOT)-repeated exp	osure:					
	it does not contain subs - Skin: Based on availa	toxicity (STOT)-repeated e tances classified as hazard ble data, the classification t. For more information se	dous for this effect. criteria are not met,	For more informa	tion see section 3.			
	Based on available data, this effect. For more inf <b>Other information:</b>	the classification criteria a ormation see section 3.	are not met, as it doe	s not contain sub	stances classified as h	azardous for		
	Non-applicable							
	Specific toxicology inforr	nation on the substance	es:					
		Identification		Ac	cute toxicity	Genus		
	Imidazole			LD50 oral	500 mg/kg (ATEi)			
	CAS: 288-32-4			LD50 dermal	>2000 mg/kg			
	EC: 206-019-2			LC50 inhalation	>5 mg/L			
	Endocrine disrupting pro	•	meet the criteria					
	Endocrine disrupting pro Endocrine-disrupting proper Other information	•	meet the criteria.					
	Endocrine-disrupting proper	•	meet the criteria.					
	Endocrine-disrupting proper Other information	•	meet the criteria.					
SECT.	Endocrine-disrupting proper Other information	ties: The product does not	meet the criteria.					
	Endocrine-disrupting proper Other information Non-applicable	ties: The product does not		duct itself is not a	nyailabla			
he e	Endocrine-disrupting proper Other information Non-applicable	ties: The product does not IFORMATION ed to the eco-toxicological	properties of the pro			or this offect		
™he e≫ Based	Endocrine-disrupting proper Other information Non-applicable	FORMATION IFORMATION If to the eco-toxicological ication criteria are not met	properties of the pro			or this effect.		
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- CONTINUED ON NEXT PAGE -

Revised: 12/10/2023



This SDS is an English translation of COMMISSION REGULATION (EU) 2020/878, without any country-specific

legislation

## CZ0508 - Levanase 32B, Bacillus subtilis

Date of compilation: 23/06/2020

Revised: 12/10/2023

Version: 2 (Replaced 1)

## 13.1 Waste treatment methods:

SECTION 13: DISPOSAL CONSIDERATIONS

Code	Description	Waste class (Regulation (EU) No 1357/2014)
	It is not possible to assign a specific code, as it depends on the intended use by the user	Dangerous

#### Type of waste (Regulation (EU) No 1357/2014):

HP10 Toxic for reproduction

#### Waste management (disposal and evaluation):

Consult the authorized waste service manager on the assessment and disposal operations in accordance with Annex 1 and Annex 2 (Directive 2008/98/EC). As under 15 01 (2014/955/EC) of the code and in case the container has been in direct contact with the product, it will be processed the same way as the actual product. Otherwise, it will be processed as non-dangerous residue. Waste should not be disposed of to drains. See paragraph 6.2.

#### Regulations related to waste management:

In accordance with Annex II of Regulation (EC) No 1907/2006 (REACH) the community or state provisions related to waste management are stated

Community legislation: Directive 2008/98/EC, 2014/955/EU, Regulation (EU) No 1357/2014

## SECTION 14: TRANSPORT INFORMATION

### Transport of dangerous goods by land:

With regard to ADR 2023 and RID 2023:

14.2 14.3 14.4 14.5	Labels: Packing group: Environmental hazards: Special precautions for user	Non-applicable Non-applicable Non-applicable Non-applicable No
	Special regulations: Tunnel restriction code:	Non-applicable Non-applicable
	Physico-Chemical properties:	see section 9
	Limited quantities:	Non-applicable
14.7	Maritime transport in bulk according to IMO instruments:	Non-applicable
Transpor	t of dangerous goods by sea:	
With rega	rd to IMDG 40-20:	
14.1	UN number or ID number:	Non-applicable
14.2	UN proper shipping name:	Non-applicable
14.3	Transport hazard class(es):	Non-applicable
	Labels:	Non-applicable
	Packing group:	Non-applicable
	Marine pollutant:	No
14.6	- F	
	Special regulations:	Non-applicable
	EmS Codes:	
	Physico-Chemical properties:	see section 9
	Limited quantities:	Non-applicable
	Segregation group:	Non-applicable
14.7	Maritime transport in bulk according to IMO instruments:	Non-applicable
Transpo	rt of dangerous goods by air:	

Revised: 12/10/2023

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## CZ0508 - Levanase 32B, Bacillus subtilis

23/06/2020 Revised: 12/2	10/2023	Version: 2 (Replaced 1)		
RANSPORT INFORMATION (	continued)			
With regard to IATA/ICAO 2023:				
UN number or ID number:	Non-applicable			
UN proper shipping name:	Non-applicable			
Transport hazard class(es):	Non-applicable			
Labels:	Non-applicable			
Packing group:	Non-applicable			
Environmental hazards:	No			
Special precautions for user				
Physico-Chemical properties:	see section 9			
Maritime transport in bulk according to IMO instruments:	Non-applicable			
	rd to IATA/ICAO 2023: UN number or ID number: UN proper shipping name: Transport hazard class(es): Labels: Packing group: Environmental hazards: Special precautions for user Physico-Chemical properties: Maritime transport in bulk according to IMO	UN number or ID number: UN proper shipping name: Transport hazard class(es): Labels:Non-applicable 		

#### SECTION 15: REGULATORY INFORMATION

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

Candidate substances for authorisation under the Regulation (EC) No 1907/2006 (REACH): Non-applicable

Substances included in Annex XIV of REACH ("Authorisation List") and sunset date: Non-applicable

Regulation (EC) No 1005/2009, about substances that deplete the ozone layer: Non-applicable

Article 95, REGULATION (EU) No 528/2012: Non-applicable

REGULATION (EU) No 649/2012, in relation to the import and export of hazardous chemical products: Non-applicable

#### Seveso III:

Non-applicable

## Limitations to commercialisation and the use of certain dangerous substances and mixtures (Annex XVII REACH, etc ....):

Product classified hazardous under the CMR. Sale and distribution to the general public is prohibited. Due to its CMR category, it is essential to apply the specific measures for workplace hazard prevention covered in articles 4 and 5 of the 2004/37/EC Directive and later modifications.

Shall not be used in:

--ornamental articles intended to produce light or colour effects by means of different phases, for example in ornamental lamps and ashtrays,

—tricks and jokes,

-games for one or more participants, or any article intended to be used as such, even with ornamental aspects.

#### Specific provisions in terms of protecting people or the environment:

It is recommended to use the information included in this safety data sheet as a basis for conducting workplace-specific risk assessments in order to establish the necessary risk prevention measures for the handling, use, storage and disposal of this product.

#### Other legislation:

The product could be affected by sectorial legislation

#### 15.2 Chemical safety assessment:

The supplier has not carried out evaluation of chemical safety.

#### SECTION 16: OTHER INFORMATION \*\*

#### Legislation related to safety data sheets:

The SDS shall be supplied in an official language of the country where the product is placed on the market. This safety data sheet has been designed in accordance with ANNEX II-Guide to the compilation of safety data sheets of Regulation (EC) No 1907/2006 (COMMISSION REGULATION (EU) 2020/878).

Modifications related to the previous Safety Data Sheet which concerns the ways of managing risks.:

\*\* Changes with regards to the previous version

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## CZ0508 - Levanase 32B, Bacillus subtilis

Date of compilation: 23/06/2020	Revised: 12/10/2023	Version: 2 (Replaced 1)
SECTION 16: OTHER INFORM	IATION ** (continued)	
COMMISSION REGULATION CLP Regulation (EC) No 127 · Hazard statements		ON 16):
Texts of the legislative p H315: Causes skin irritation H360D: May damage the u H319: Causes serious eye	1born child.	tion 2:
Texts of the legislative p		tion 3:
The phrases indicated do n individual components whi		; they are present merely for informative purposes and refer to the
CLP Regulation (EC) No Acute Tox. 4: H302 - Harm Eye Dam. 1: H318 - Causes Repr. 1B: H360D - May dan Skin Corr. 1C: H314 - Cause	ful if swallowed. s serious eye damage.	e damage.
Advice related to trainin		
	order to prevent industrial	risks for staff using this product and to facilitate their comprehension and label on the product.
Principal bibliographical		
http://echa.europa.eu http://eur-lex.europa.eu		
Abbreviations and acron	yms:	
ADR: European agreement IMDG: International maritin IATA: International Air Tra ICAO: International Civil Av COD: Chemical Oxygen De	me dangerous goods code nsport Association iation Organisation	Il carriage of dangerous goods by road
BOD5: 5day biochemical ox BCF: Bioconcentration factor LD50: Lethal Dose 50 LC50: Lethal Concentration	or	
EC50: Effective concentration LogPOW: Octanolwater part Koc: Partition coefficient of	on 50 tition coefficient <sup>-</sup> organic carbon	
UFI: unique formula identif IARC: International Agency		

\*\* Changes with regards to the previous version

The information contained in this safety data sheet is based on sources, technical knowledge and current legislation at European and state level, without being able to guarantee its accuracy. This information cannot be considered a guarantee of the properties of the product, it is simply a description of the security requirements. The occupational methodology and conditions for users of this product are not within our awareness or control, and it is ultimately the responsibility of the user to take the necessary measures to obtain the legal requirements concerning the manipulation, storage, use and disposal of chemical products. The information on this safety data sheet only refers to this product, which should not be used for needs other than those specified.