



SAFETY DATASHEET ENZYMATIC PREPARATION

SECTION 1: Identification of the mixture and the company

1.1. Product Identifier

Product name: SCOTTZYME SPECTRUM

Synonyms: Liquid enzymatic preparation

Unique formula identifier (UFI): MA1U-F9VQ-HS15-QN05

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

Use: Biocatalyst for food industry.

1.3. Details of the supplier of the safety datasheet

Company: Solyve - ZAC Normandial – 14460 COLOMBELLES - France

Telephone n°

+33 (0)2 31 35 05 30 (working hours)

Manager's email: fguillamin@episens.fr

1.4. Emergency telephone number

In France: contact ORFILA (INRS) +33 (0)1 45 42 59 59 (24/7)

This number will give the contact details of all French poison centres which provide free medical help (excluding call cost).

European assistance number: 112

SECTION 2: Hazards identification

2.1. Classification of the mixture according to Regulation (EC) No 1272/2008

Classification: Resp. Sens. Cat 1
Eye Irrit. Cat 2
Skin Irrit. Cat 2
STOT SE Cat 3

2.2 Labelling

Signal word: Danger

Hazard pictogram:



Hazard statements: H334 - May cause allergy or asthma symptoms or breathing difficulties if inhaled.
H319 - Causes serious eye irritation.
H315 - Causes skin irritation.
H335 - May cause respiratory irritation.

Precautionary statements:

P261 - Avoid breathing dust/fume/gas/mist/vapours/spray.

P284 - In case of inadequate ventilation wear respiratory protection.

P304+P340+ P312 - IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. Call a POISON CENTER or doctor/physician if you feel unwell.

P342 + 311 - If experiencing respiratory symptoms: Call a POISON CENTER or doctor/physician.

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

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

P337+P313 - If eye irritation persists: Get medical advice/attention.

P264 - Wash hands thoroughly after handling.

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

P332+P313 - If skin irritation occurs: Get medical advice/attention.

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

P405- Store locked up.

P271 – Use only outdoors or in well-ventilated area.

P362 + 364 – Take off contaminated clothing and wash it before reuse.

2.3. Other hazards

The mixture is not considered as a PBT or VPVB substance.

SECTION 3: Composition/Information on ingredients

3.1. Substance: not applicable

3.2. Mixture:

Dangerous ingredients

Chemical name	CAS N°	CE N°	IUB N°	%	CLP Classification (Reg. 1272/2008)
Polygalacturonase	9032-75-1	232-885-6	3.2.1.15	1 – 5 %	Resp. Sens. 1 ; H334
Pectin esterase	9025-98-3	232-807-0	3.1.1.11	1 – 5 %	Resp. Sens. 1 ; H334
Pectin lyase	9033-35-6	232-894-5	4.2.2.10	1 – 5 %	Resp. Sens. 1 ; H334
Cellulase	9012-54-8	232-734-4	3.2.1.4	1 – 5 %	Resp. Sens. 1 ; H334
Protease	9001-92-7	2332-642-4	3.4.23.18	1 – 5 %	Resp. Sens. 1 ; H334 Eye Irrit. 2 : H319 Skin Irrit. 2 : H315 STOT SE 3 : H335

The other ingredients are not listed as they have no impact on the classification of the substance.

For the full text of the H phrases mentioned in this section, see section 16.

SECTION 4: First aid measures

4.1. Description of the first aid measures

General information: Protection of rescue workers: Wear appropriate individual protective equipment (see Section 8). Transport the affected person into the open air. Remove contaminated shoes and clothing.

Inhalation:	In the event of inhalation, take into the open air. Do not allow the person to get cold. Keep the victim resting in a semi-seated position. In the absence of breathing, use artificial respiration. Consult a doctor.
Ingestion:	In the event of ingestion, rinse the mouth with water (only if the person is conscious). Consult a doctor if symptoms develop.
Contact with the skin:	Rinse thoroughly in running water. Remove contaminated shoes and clothing. Consult a doctor if symptoms develop.
Contact with the eyes:	Rinse thoroughly in running water. Consult a doctor if symptoms develop.
First aid facilities:	Ensure that automatic eye baths and safety showers are located close to the workstations.

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

Inhalation:	Inhalation of drops or spray may cause irritation to the respiratory system. May entail sensitisation via inhalation. Sensitive people may develop asthma following inhalation of this substance.
Ingestion:	Ingestion of the product may entail gastrointestinal problems.
Contact with the skin:	Prolonged or repeated contact with the skin may cause irritation.
Contact with the eyes:	May cause irritation of the eyes (redness).

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

No specific treatment.

SECTION 5: Firefighting Measures

5.1. Extinguishing media

Small fire:	Use chemical powders or carbonic gas.
Major fire:	Use appropriate extinguishers for the surrounding materials.

5.2. Special hazards arising from the mixture

Unusual risks of fire/explosion

No risk identified in the current state of knowledge.

Risk linked to the products of thermal breakdown

In the event of fire, may cause toxic and/or corrosive breakdown products.

5.3. Advice for firefighters

Special measures to combat fire

Water from the fire-fighting system that has been contaminated by this product must be kept in a closed environment and must not be spilt into the aquatic environment or any drain or evacuation pipe

Protection of participants

Wear appropriate protective clothing. Stand-alone isolating respiratory protection.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment, and emergency procedures

Avoid contact with eyes, skin and clothing. Use appropriate protective equipment (see Section 8). Consult a specialist immediately.

6.2. Environmental precautions

No special measure is required.

6.3. Methods and material for containment and cleaning up

Small accidental spillage or leak: Avoid the formation of dust or spray. Mop up with appropriate material. Place in an appropriate container. Clean the area affected with plenty of water.

Large accidental spillage or leak: Avoid the formation of dust or spray. Prevent spillage into the drains, subsoil or confined areas. Contain if necessary. Mop up the product spilled with inert material (e.g. dry sand or dry earth) and place in a chemical waste container. Recycle if possible.

6.4. Reference to other sections

See section 8 for individual protective equipment and section 13 for waste disposal.

SECTION 7: Handling and Storage

7.1. Precautions for safe handling

Use in a closed circuit if possible. Use with adequate ventilation. Use appropriate protective equipment. Avoid any contact with the eyes, skin, respiratory system, and clothing.

7.2. Conditions for safe storage, including any incompatibilities

Store in a clean, dry place.

7.3. Specific end use(s)

Substance intended to catalyse reactions by enzymatic means during industrial processes.

Section 8: Exposure controls/Personal protection

8.1. Control parameters

Limits of professional exposure

Technical measures: Use only in a well-ventilated environment.

Hygiene measures: Do not eat, drink or smoke during use. Wash your hands after handling these compounds and before eating, smoking or going to the toilet, and at the end of the day.

8.2. Exposure controls

Individual protective equipment

Respiratory system: Wear a P3 dust mask.

Skin and body: Wear long-sleeved protective clothing.

Eyes: Full face mask / goggles.

Hands: Wear appropriate gloves (disposable nitrile gloves).

Control of exposure linked to protection of the environment

Notify the local authorities if significant leaks cannot be contained.

Wastewater must be evacuated to a purification plant.

The advice on personal protection is valid for high levels of exposure. Adapt personal protection according to the risk of exposure.

SECTION 9: Physical and Chemical Properties

9.1. Information on basic physical and chemical properties

Physical state:	Liquid.
Colour:	Brown.
Odour:	Slight odour of fermentation.
pH:	4 (Concentration 100%).
Solubility:	Soluble in water.
Density:	1,1

Melting/freezing point, olfactory threshold, initial boiling point and boiling interval, flashpoint, evaporation rate, flammability (solid, gas), steam pressure, steam density, partition coefficient (n-octanol/water), temperature of breakdown, temperature of auto-flammability, viscosity, explosive properties, oxidising properties: Data not available

9.2. Other information No information available.

SECTION 10: Stability and Reactivity

10.1. Reactivity:	Not relevant.
10.2. Chemical stability:	Stable under the recommended storage conditions.
10.3. Possibility of hazardous reactions:	N/A under normal conditions of use.
10.4. Conditions to avoid:	See sections 5 and 7.
10.5. Incompatible materials:	No special recommendations.
10.6. Hazardous decomposition products:	Does not break down under the stipulated conditions of handling and storage (see section 7)

SECTION 11: Toxicological Information

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

Potential acute effects on the health

Inhalation:	May entail sensitisation via inhalation.
Ingestion:	No information available.
Contact with the skin:	No information available.
Contact with the eyes:	No information available.

Acute toxicity: No information available.

Irritation/Corrosion No information available.

Sensitisation No information available.

Potential chronic effects on the health

Chronic effects:	Once sensitised, a strong allergic reaction may be triggered upon later exposure to very low levels.
Carcinogenicity:	No information available.
Mutagenicity:	No information available.
Teratogenicity:	No information available.
Effects on development:	No information available.
Effects on fertility:	No information available.

Chronic toxicity: No information available.

Carcinogenicity: No information available.

Mutagenicity: No information available.

Teratogenicity: No information available.

Toxicity for reproduction: No information available.

11.2. Information on other hazards

Data not available

SECTION 12: Ecological Information

12.1. Toxicity

Effects on the environment: No information available.

Eco-toxicity in the aquatic environment: No information available.

12.2. Persistence/degradability: No information available.

12.3. Bio accumulative potential No information available.

12.4. Mobility in soil: For data on the physical state and solubility, see section 9

12.5. Results of PBT and vPvB assessment See section 2.3.

12.6. Endocrine disruptive properties No information available.

12.7. Other adverse effects: No information available.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Dispose of waste in compliance with national/local environmental protection rules.

Wastewater must be evacuated to a purification plant.

The waste code must be allocated by the user according to the application of the product.

SECTION 14: Transport information

14.1 UN number	Not regulated
14.2 Un proper shipping name	Not applicable
14.3 Transport hazard class	Not applicable
14.4 Packing group	Not applicable
14.5 Environmental hazards	Not applicable
14.6 Special precautions for user	Not applicable

14.7 Maritime transport in bulk according to IMO instruments: not available

SECTION 15: Regulatory Information

15.1. Safety, health and environmental regulations/legislation specific to the mixture

The substance mixture complies with regulation n°649/2012 on the export and import of hazardous chemical products.

15.2. Chemical safety assessment

The substance has not been subject to an evaluation of chemical safety.

SECTION 16: Other information

Text of the H phrase mentioned in section 2

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

H319 - Causes serious eye irritation.

H315 - Causes skin irritation.

H335 - May cause respiratory irritation

Additional information

The format of this safety datasheet complies with regulation 2020/878.

A REACH registration number may be allocated to enzymes depending on their possible technical applications. Enzymes used as processing aids for the “food” or “feed” products are exempt from REACH registration, including the establishment of scenarios of exposure. The legislation in force applicable to these areas must be considered.

Disclaimer

The information contained in this safety datasheet is considered as true and accurate on the date of publication. However, the precision and exhaustiveness of this information, and any recommendation or suggestion, are given without guarantee. As the conditions of use are outside of the control of our company, it is down to the user to determine the conditions of safe use of this product. The information contained in this datasheet does not represent analytical specifications; for these specifications see our technical datasheet.

Reason for revision: the whole datasheet has been revised to ensure conformity with regulation 2020/878.