1. Identification

1.1. Product identifier

Product No  P8111
Product name  Thermolabile Proteinase K

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

Recommended use  This product is for research and development only
Uses advised against  No information available

1.3. Details of the supplier of the safety data sheet

Supplier Address
New England BioLabs
240 County Road
Ipswich, MA 01938
USA

For further information, please contact
Company Phone Number  978-927-5054, 800-632-5227 (toll free)
Telefax  978-921-1350
E-mail address  info@neb.com

1.4. Emergency telephone number

Europe  +1 978-380-2125

2. Hazard(s) identification

2.1. Classification of the substance or mixture

Regulation (EC) No 1272/2008
This mixture is classified as not hazardous according to regulation (EC) 1272/2008 [GHS]

2.2. Label elements

This mixture is classified as not hazardous according to regulation (EC) 1272/2008 [GHS]

Hazard statements
This mixture is classified as not hazardous according to regulation (EC) 1272/2008 [GHS]
EUH210 - Safety data sheet available on request

2.3. Other hazards

Other hazards  No information available
3. Composition/information on ingredients

3.1 Substances

Not applicable

3.2 Mixtures

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

4. First-aid measures

4.1. Description of first aid measures

Inhalation
Remove to fresh air.

Eye contact
Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids. Consult a physician.

Skin contact
Wash skin with soap and water. In the case of skin irritation or allergic reactions see a physician.

Ingestion
Clean mouth with water and drink afterwards plenty of water.

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

Symptoms
No information available.

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

Note to physicians
Treat symptomatically.

5. Fire-fighting measures

5.1. Extinguishing media

Suitable Extinguishing Media
Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.

Unsuitable Extinguishing Media
No information available.

5.2. Special hazards arising from the substance or mixture

Specific hazards arising from the chemical
No information available.

5.3. Advice for firefighters

Special protective equipment for fire-fighters
Firefighters should wear self-contained breathing apparatus and full firefighting turnout gear. Use personal protection equipment.

6. Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Personal precautions
Ensure adequate ventilation.
For emergency responders Use personal protection recommended in Section 8.

6.2. Environmental precautions

Environmental precautions See Section 12 for additional Ecological Information.

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 Take up mechanically, placing in appropriate containers for disposal.

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.

7. Handling and storage

7.1. Precautions for safe handling

Advice on safe handling Ensure adequate ventilation.

General hygiene considerations Handle in accordance with good industrial hygiene and safety practice.

7.2. Conditions for safe storage, including any incompatibilities

Storage Conditions Keep container tightly closed in a dry and well-ventilated place.

7.3. Specific end use(s)

Risk management methods [RMM] The information required is contained in this Safety Data Sheet.

8. Exposure controls/personal protection

8.1. Control parameters

Exposure Limits

Derived No Effect Level (DNEL) No information available.

Predicted No Effect Concentration (PNEC) No information available.

8.2. Exposure controls

Individual protection measures, such as personal protective equipment

Eye/face protection Wear safety glasses with side shields (or goggles).
Skin and body protection  Wear suitable protective clothing.

Respiratory protection  No protective equipment is needed under normal use conditions. If exposure limits are exceeded or irritation is experienced, ventilation and evacuation may be required.

General hygiene considerations  Handle in accordance with good industrial hygiene and safety practice.

Environmental exposure controls  No information available.

9. Physical and chemical properties

9.1. Information on basic physical and chemical properties

<table>
<thead>
<tr>
<th>Property</th>
<th>Values</th>
<th>Remarks • Method</th>
</tr>
</thead>
<tbody>
<tr>
<td>Physical state</td>
<td>Liquid</td>
<td></td>
</tr>
<tr>
<td>Appearance</td>
<td>Clear</td>
<td></td>
</tr>
<tr>
<td>Odor</td>
<td>None.</td>
<td></td>
</tr>
<tr>
<td>Odor threshold</td>
<td>No information available</td>
<td></td>
</tr>
<tr>
<td>pH</td>
<td>7.5</td>
<td></td>
</tr>
<tr>
<td>Melting point / freezing point</td>
<td>No data available</td>
<td>None known</td>
</tr>
<tr>
<td>Boiling point / boiling range</td>
<td>No data available</td>
<td>None known</td>
</tr>
<tr>
<td>Flash point</td>
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<td>None known</td>
</tr>
<tr>
<td>Evaporation rate</td>
<td>No data available</td>
<td>None known</td>
</tr>
<tr>
<td>Flammability (solid, gas)</td>
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<td>None known</td>
</tr>
<tr>
<td>Flammability Limit in Air</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Upper flammability or explosive limits</td>
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<td>None known</td>
</tr>
<tr>
<td>Lower flammability or explosive limits</td>
<td>No data available</td>
<td>None known</td>
</tr>
<tr>
<td>Vapor pressure</td>
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<td>None known</td>
</tr>
<tr>
<td>Vapor density</td>
<td>No data available</td>
<td>None known</td>
</tr>
<tr>
<td>Relative density</td>
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<td>None known</td>
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<tr>
<td>Water solubility</td>
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<tr>
<td>Solubility(ies)</td>
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</tr>
<tr>
<td>Partition coefficient</td>
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<td>None known</td>
</tr>
<tr>
<td>Autoignition temperature</td>
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</tr>
<tr>
<td>Decomposition temperature</td>
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</tr>
<tr>
<td>Kinematic viscosity</td>
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<td>None known</td>
</tr>
<tr>
<td>Dynamic viscosity</td>
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<td>None known</td>
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<tr>
<td>Explosive properties</td>
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<tr>
<td>Oxidizing properties</td>
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<td></td>
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</table>

9.2. Other information

<table>
<thead>
<tr>
<th>Property</th>
<th>Values</th>
<th>Remarks • Method</th>
</tr>
</thead>
<tbody>
<tr>
<td>Softening point</td>
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<td></td>
</tr>
<tr>
<td>Molecular weight</td>
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<td></td>
</tr>
<tr>
<td>VOC Content (%)</td>
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<td></td>
</tr>
<tr>
<td>Liquid Density</td>
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<td></td>
</tr>
<tr>
<td>Bulk density</td>
<td>No information available</td>
<td></td>
</tr>
</tbody>
</table>

10. Stability and reactivity

10.1. Reactivity

Reactivity  No information available.
10.2. Chemical stability

Stability: Stable under normal conditions.

Explosion data
   Sensitivity to mechanical impact: None.
   Sensitivity to static discharge: None.

10.3. Possibility of hazardous reactions

Possibility of hazardous reactions: None under normal processing.

10.4. Conditions to avoid

Conditions to avoid: None known based on information supplied.

10.5. Incompatible materials

Incompatible materials: None known based on information supplied.

10.6. Hazardous decomposition products

Hazardous decomposition products: None known based on information supplied.

11. Toxicological information

11.1. Information on toxicological effects

Information on likely routes of exposure

Product Information

   Inhalation: Specific test data for the substance or mixture is not available.
   Eye contact: Specific test data for the substance or mixture is not available.
   Skin contact: Specific test data for the substance or mixture is not available.
   Ingestion: Specific test data for the substance or mixture is not available.

Symptoms related to the physical, chemical and toxicological characteristics

Symptoms: No information available.

Numerical measures of toxicity

Acute toxicity

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

   ATEmix (oral) 25,200.00 mg/kg
   ATEmix (dermal) 20,000.00 mg/kg

Unknown acute toxicity

   50 % of the mixture consists of ingredient(s) of unknown toxicity.
   0 % of the mixture consists of ingredient(s) of unknown acute oral toxicity.
   0 % of the mixture consists of ingredient(s) of unknown acute dermal toxicity.
   50 % of the mixture consists of ingredient(s) of unknown acute inhalation toxicity (gas).
   50 % of the mixture consists of ingredient(s) of unknown acute inhalation toxicity (vapor).
   50 % of the mixture consists of ingredient(s) of unknown acute inhalation toxicity (dust/mist).
Delayed and immediate effects as well as chronic effects from short and long-term exposure

Skin corrosion/irritation No information available.
Serious eye damage/eye irritation No information available.
Respiratory or skin sensitization No information available.
Germ cell mutagenicity No information available.
Carcinogenicity No information available.
Reproductive toxicity No information available.
STOT - single exposure No information available.
STOT - repeated exposure No information available.
Aspiration hazard No information available.

12. Ecological information

12.1. Toxicity
Ecotoxicity
Unknown aquatic toxicity Contains 0 % of components with unknown hazards to the aquatic environment.

12.2. Persistence and degradability
Persistence and degradability No information available.

12.3. Bioaccumulative potential
Bioaccumulation There is no data for this product.

12.4. Mobility in soil
Mobility in soil No information available.

12.5. Results of PBT and vPvB assessment
PBT and vPvB assessment

12.6. Other adverse effects
Other adverse effects No information available.

13. Disposal considerations

13.1. Waste treatment methods
14. Transport information

**IMDG**
- **14.1 UN number**: Not regulated
- **14.2 Proper shipping name**: Not regulated
- **14.3 Transport hazard class(es)**: Not regulated
- **14.4 Packing group**: Not regulated
- **14.5 Marine pollutant**: Not applicable
- **14.6 Special Provisions**: None
- **14.7 Transport in bulk according to Annex II of MARPOL and the IBC Code**: No information available

**RID**
- **14.1 UN/ID No**: Not regulated
- **14.2 Proper shipping name**: Not regulated
- **14.3 Transport hazard class(es)**: Not regulated
- **14.4 Packing group**: Not regulated
- **14.5 Environmental hazard**: Not applicable
- **14.6 Special Provisions**: None

**ADR**
- **14.1 UN number**: Not regulated
- **14.2 Proper shipping name**: Not regulated
- **14.3 Transport hazard class(es)**: Not regulated
- **14.4 Packing group**: Not regulated
- **14.5 Environmental hazard**: Not applicable
- **14.6 Special Provisions**: None

**IATA**
- **14.1 UN number**: Not regulated
- **14.2 Proper shipping name**: Not regulated
- **14.3 Transport hazard class(es)**: Not regulated
- **14.4 Packing group**: Not regulated
- **14.5 Environmental hazard**: Not applicable
- **14.6 Special Provisions**: None

15. Regulatory information

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

**European Union**

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

**Authorizations and/or restrictions on use:**
This product does not contain substances subject to authorization (Regulation (EC) No. 1907/2006 (REACH), Annex XIV) This product does not contain substances subject to restriction (Regulation (EC) No. 1907/2006 (REACH), Annex XVII)
Persistent Organic Pollutants
Not applicable

Ozone-depleting substances (ODS) regulation (EC) 1005/2009  Not applicable

**International Inventories**

<table>
<thead>
<tr>
<th>Acronym</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>TSCA</td>
<td>United States Toxic Substances Control Act Section 8(b) Inventory</td>
</tr>
<tr>
<td>DSL/NDSL</td>
<td>Canadian Domestic Substances List/Non-Domestic Substances List</td>
</tr>
<tr>
<td>EINECS/ELINCS</td>
<td>European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances</td>
</tr>
<tr>
<td>ENCS</td>
<td>Japan Existing and New Chemical Substances</td>
</tr>
<tr>
<td>IECSC</td>
<td>China Inventory of Existing Chemical Substances</td>
</tr>
<tr>
<td>KECL</td>
<td>Korean Existing and Evaluated Chemical Substances</td>
</tr>
<tr>
<td>PICCS</td>
<td>Philippines Inventory of Chemicals and Chemical Substances</td>
</tr>
<tr>
<td>AICS</td>
<td>Australian Inventory of Chemical Substances</td>
</tr>
</tbody>
</table>

**Legend:**

- TSCA: United States Toxic Substances Control Act Section 8(b) Inventory
- DSL/NDSL: 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
- AICS: Australian Inventory of Chemical Substances

**15.2. Chemical safety assessment**

Chemical Safety Report: No information available

**16. Other information**

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

**Legend**

- SVHC: Substances of Very High Concern for Authorization:

**Legend Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION**

<table>
<thead>
<tr>
<th>TWA</th>
<th>TWA (time-weighted average)</th>
<th>STEL</th>
<th>STEL (Short Term Exposure Limit)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ceiling</td>
<td>Maximum limit value</td>
<td>*</td>
<td>Skin designation</td>
</tr>
</tbody>
</table>

**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)
- EPA (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)
- Japan GHS Classification
- Australia 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)
This safety data sheet complies with the requirements of: 

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End of Safety Data Sheet