24—Epibrassinolide -MATERIAL SAFETY DATA SHEET

Manufacturer/information service:
ZHEJIANG RAYFULL CHEMICALS CO., LTD
ADD: NO.113 PUXING ROAD, PUZHOU INDUSTRIAL PARK, LONGWAN DISTRICT, WENZHOU ZHEJIANG P.R. CHINA
Tel: +86-577-88905587 Fax: +86-577-88905567
Email: info@rayfull.com sales@rayfull.com

1. Chemical Product Identification

   Product Name: 24—Epibrassinolide
   Molecular Formula: C_{28}H_{48}O_{6}
   Molecular Weight: 480.68
   Structural Formula:

   ![Structural Formula]

   Chemical Name:
   (22R,23R,24R)-2\alpha,3\alpha,22,23-tetrahydroxy-24-methyl-\beta-homo-7-oxa-5-cholestan-6-one
   Form: Crystals
   Color: White
   Odor: Odorless
   CAS No.: 78821-43-9

2. Composition / Information on Ingredients

<table>
<thead>
<tr>
<th>Composition</th>
<th>CAS No.</th>
<th>Content %</th>
</tr>
</thead>
<tbody>
<tr>
<td>24—Epibrassinolide</td>
<td>78821-43-9</td>
<td>90.0</td>
</tr>
<tr>
<td>Other ingredients</td>
<td></td>
<td>10.0</td>
</tr>
</tbody>
</table>
3. Hazards Identification

Potential Health Effects
Use appropriate procedures to prevent opportunities for direct contact with the skin or eyes and to prevent inhalation.

4. First Aid Measures

Eyes: Flush eyes with plenty of water for at least 15 minutes. Get medical aid immediately.
Skin: Get medical aid. Flush skin with plenty of water for at least 10 minutes while removing contaminated clothing and shoes.
Ingestion: Get medical aid immediately.
Inhalation: move to fresh air immediately. If not breathing, give artificial respiration. If breathing is difficult, give oxygen.

5. Fire-Fighting Measures

General Information: none
Extinguishing Media: Use agent most appropriate to extinguish fire.

6. Accidental Release Measures

General Information: Use proper personal protective equipment as indicated in Section 8.
Spills/Leaks: Clean up spills immediately, observing precautions in the Protective Equipment section.

7. Handling And Storage

Handling: Wash thoroughly after handling. Avoid contact with eyes, skin, and clothing. Avoid ingestion and inhalation.
Storage: Store in dry and cool place.

8. Exposure Controls/Personal Protection

Engineering Controls: none
Personal Protective Equipment
Eyes: Wear chemical goggles.
Skin: Wear appropriate protective gloves.
Clothing: Wear appropriate protective clothing to minimize contact with skin.
Respirators: none
9. Physical and Chemical Properties
pH: 4.5~6.5
Vapor Pressure: Not available.
Vapor Density: Not available.
Evaporation Rate: Not available.
Viscosity: Not available.
Boiling Point: Not available.
Freezing/Melting Point: 254-256°C
Decomposition Temperature: Not available.
Solubility: 2.0% max in water
Specific Gravity/Density: Not available.

10. Stability and Reactivity
Chemical Stability: Stable under normal temperatures and pressures.
Conditions to Avoid: Strong oxidants.
Incompatibilities with Other Materials: Not available.
Hazardous Decomposition Products: none
Hazardous Polymerization: Not available.

11. Toxicological Information
Acute oral toxicity for rat, LD₅₀ >2000mg/Kg; mouse, LD₅₀ >1000mg/Kg. Acute percutaneous toxicity for rat, LD₅₀ >2000mg/Kg.
Ames test indicates no mutagenicity.
Epidemiology: No data available.
Teratogenicity: No data available.
Reproductive Effects: No data available.
Neurotoxicity: No data available.
Mutagenicity: No data available.
Other Studies: No data available.

12. Ecological And Ecotoxicological Information
Ecotoxicity: Not available.
Environmental Fate: No information found.
Environmental Toxicity: No information found.
Product of Biodegradation: Not available.
Toxicity of the Products of Biodegradation: Not available.
13. Disposal Considerations

Contact a licensed professional waste disposal service to dispose of this material. Dissolve or mix the material with a combustible solvent and burn in a chemical incinerator equipped with an afterburner and scrubber. Observe all federal, state, and local environmental regulations.

14. Transport Information

Not applicable.

15. Regulatory Information

Not applicable.

16. Other Information

All information and instructions provided in this Material Safety Data Sheet (MSDS) are based on the current state of scientific and technical knowledge at the date indicated on the present MSDS and are presented in good faith and believed to be correct. This information applies to the product as such. In case of new formulations or mixes, it is necessary to ascertain that a new danger will not appear. It is the responsibility of persons on receipt of this MSDS to ensure that the information contained herein is properly read and understood by all people who may use, handle, dispose or in any way come in contact with the product. If the recipient subsequently produce formulations containing this product, it is the recipients sole responsibility to ensure the transfer of all relevant information from this MSDS to their own MSDS.