

Material Safety Data Sheet

Total Bilirubin

1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Product Name: Total Bilirubin

Catalog Numbers: BU3261-BP, 1245-250, 1245-500, 1245-200H

Use: This reagent is intended for in vitro quantitative determination of total bilirubin in serum and plasma.

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AUSTRALIA
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Fax: +61 3 9790 4155
E-mail: trace@thermotrace.com.au

THERMO DMA
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LOUISVILLE, CO 80027
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Tel: (303) 581 6428
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E-mail: inquiries@thermodma.com

Contact Point

Australia
Quality Assurance Manager:
Tel: +61 3 9790 4100
Mon – Fri 9:00am to 5:00pm

U.S.A
Chemtel
24 Hour Emergency Assistance
1-800-255-3924

2. HAZARDS IDENTIFICATION

Classified as hazardous according to the EU criteria

Hazard Classification: HAZARDOUS SUBSTANCE, NON DANGEROUS GOODS.

Hazard Category: Irritant

RISK PHRASES

R36 Irritating to eyes.

SAFETY PHRASES

S23 Do not breathe vapour.

S26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

Poison Schedule: None allocated

3. COMPOSITION / INFORMATION ON INGREDIENTS

SUBSTANCE NAME	Proportion	CAS Number
SUCCINIC ACID	~1 %	7647-01-0
WATER AND OTHER NON HAZARDOUS INGREDIENTS	Balance	Mixture

All other ingredients in this product are not hazardous according to the EU criteria

4. FIRST AID MEASURES

Swallowed:

If swallowed, **DO NOT** induce vomiting. If conscious, give 1 to 2 glasses of water to drink. Seek immediate medical assistance.

Eye:

If material is splashed into eyes, immediately, flush with plenty of water for 15 minutes, ensuring eye lids are held open. If irritation persists transport to hospital or doctor.

Skin:

If material is splashed onto the skin, remove any contaminated clothing and wash skin thoroughly with soap and water. If irritation persists transport to hospital or doctor.

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4. FIRST AID MEASURES (continued)

Inhaled:

Move victim to fresh air. Apply resuscitation if victim is not breathing.

First Aid Facilities:

Eye wash fountain, safety shower and normal wash room facilities.

Advice to Doctor:

Treat symptomatically.

In case of poisoning, contact Poisons Information Centre

In Australia call Tel: 131126

In New Zealand Tel: 034747000

5. FIRE-FIGHTING MEASURES

Fire/Explosion Hazard

If safe to do so, move undamaged containers from fire area.

Hazardous Decomposition Products: Decomposes on heating emitting oxides of carbon and minor quantities of sulfur and nitrogen entities.

Fire Fighting Procedures: Fire fighters to wear Self-contained breathing apparatus (SCBA) in confined spaces, in oxygen deficient atmospheres or if exposed to products of decomposition. Full protective clothing is also recommended.

Extinguishing Media: Use extinguishing media suitable for surrounding fire situation.

Flammability

This material is not a combustible or flammable liquid.

6. ACCIDENTAL RELEASE MEASURES

Walk cautiously. Ventilate area. Wear protective equipment to prevent skin and eye contact, as outlined under personal protection in this MSDS. Bund or dike area using vermiculite - to prevent run off into drains and waterways. Place absorbent (vermiculite or kitty litter) onto spill. Use HEPA vacuum cleaner if available, if not, use a shovel, and seal in properly labeled containers for disposal.

7. HANDLING AND STORAGE

Avoid generating mists. Store in a cool place and out of direct sunlight. Store away from oxidizing agents. Keep containers closed, when not using the product. Store at 2-8°C and the reagent will be stable until the expiry date stated on the bottle and kit box labels. Store in original packages as approved by manufacturer.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Exposure Standards

No exposure standards are available for this product.

Engineering Controls

Maintain adequate ventilation at all times. No other measures are required for this product.

Personal Protection Equipment

GLOVES: Not normally required, however, if handling large quantities the use of natural rubber is recommended.

EYES: Goggles or faceshield for spills.

RESPIRATORY PROTECTION: Avoid breathing of mists. The use of a respirator is not normally required, however, if entering spaces where the airborne concentration of a contaminant is unknown then the use of a Self-contained breathing apparatus (SCBA) with positive pressure air supply complying with AS/NZS 1715 / 1716, or any other acceptable International Standard is recommended. Select and use respirators in accordance with AS/NZS 1715/1716.

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9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance:	Clear to pale yellow liquid with no odour.
Boiling Point:	Not available.
Freezing Point:	Not available.
Vapour Pressure:	Not available.
Specific Gravity:	Not available.
Flash Point:	Not applicable.
Flammability Limits:	Not applicable.
Solubility in Water:	Completely miscible.

Other Properties

pH: 2.5 ± 0.05 @ 19 – 22°C

10. STABILITY AND REACTIVITY

STABILITY:

Stable under normal conditions of use.

HAZARDOUS DECOMPOSITION PRODUCTS:

Decomposes on heating emitting oxides of carbon and minor quantities of sulfur and nitrogen entities.

HAZARDOUS POLYMERIZATION:

Will not occur.

INCOMPATIBILITIES:

Strong oxidizing agents.

CONDITIONS TO AVOID:

Generation of high mist levels and incompatibles.

11. TOXICOLOGICAL INFORMATION

There is no toxicological information available for this product, the following is expected:

Oral LD50(rat): > 5,000 mg/kg

Dermal LD50(rabbit): > 5,000 mg/kg

ACUTE HEALTH EFFECTS

Swallowed:

Swallowing large quantities may cause irritation to mouth, throat and stomach, which may lead to nausea, vomiting and diarrhoea.

Eye:

Will cause irritation to the eyes, with effects including: tearing, pain, stinging and blurred vision.

Skin:

May cause irritation to the skin.

Inhaled:

May cause irritation to the nose, throat and upper respiratory system.

Chronic:

Prolonged eye contact with this product may cause severe irritation and potential long term injury.

12. ECOLOGICAL INFORMATION

Ecotoxicity:

No information for product.

Mobility:

No information for product.

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12. ECOLOGICAL INFORMATION (continued)

Persistence / Degradability:

No information for product.

Chemical Fate Information:

No information for product.

Do not dispose of large quantities to waterways, drains or sewers.

13. DISPOSAL CONSIDERATIONS

Refer to appropriate authority in your State. Normally suitable for disposal by approved waste disposal agent.

14. TRANSPORT INFORMATION

UN Number: None allocated

Proper Shipping Name: NONE ALLOCATED

Dangerous Goods Class: None allocated

Subsidiary risk: None allocated

Packing Group: None allocated

Hazchem Code: None allocated

Road and Rail Transport:

Not classified as a Dangerous Good according to the United Nations Recommendations for the Transport of Dangerous Goods and Globally Harmonized System for the classification and labelling of Chemicals.

Air Transport:

Not classified as a Dangerous Good according to the International Civil Aviation Organization (ICAO) and International Air Transport Association (IATA) Dangerous Goods Regulations for transport by air.

Marine Transport:

Not classified as a Dangerous Good according to the International Maritime Organization Rules (Maritime Dangerous Goods Code - IMDG Code) for transport by sea.

15. REGULATORY INFORMATION

Poison Schedule: None allocated.

Inventory Status:

Australia (AICS)	Y
United States (TSCA)	Y
Canada (DSL)	Y
Europe (EINECS/ELINCS)	Y
Japan (MITI)	Y
South Korea (KECL)	Y

Y = all ingredients are on the inventory.

16. OTHER INFORMATION

Issue date: April, 2004

Reasons for Update:

1. Alignment with the 2nd Edition of National Code of Practice for the Preparation of Material Safety Data Sheets [NOHSC:2001(2003).
2. Changes and /or addition made to all sections.

Key Legend Information:

NOHSC - National Occupational Health & Safety Commission [Aust]

TWA - Time Weighted Average [Int]

STEL - Short Term Exposure Limit [Int]

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16. OTHER INFORMATION (continued)

AICS - Australian Inventory of Chemical Substances
EPA - Environmental Protection Agency [Int]
NIOSH - National Institute for Occupational Safety and Health [US]
AS/NZS 1715 - Selection, use and maintenance of respiratory protective devices. [Aust]
AS/NZS 1716 - Respiratory protective devices. [Aust]
IATA - International Aviation Transport Authority [Int]
ICAO - International Civil Aviation Organization
IMO - International Maritime Organisation. [Int]
IMDG - International Maritime Dangerous Goods

United Nations Recommendations for the Transport of Dangerous Goods and Globally Harmonized System for the classification and labelling of Chemicals. [Int]

EU - European Union

[Aust/NZ] = Australian/New Zealand

[Int] = International

[US] = United States of America

Principal References:

Information supplied by manufacturer, reference sources including the public domain.

Disclaimer

This MSDS summarises our best knowledge of the health and safety hazard information of the product and how to safely handle and use the product in the workplace. Each user should read this MSDS and consider the information in the context of how the product will be handled and used in the workplace including in conjunction with other products. If clarification or further information is needed to ensure that an appropriate risk assessment can be made, the user should contact this company.

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END OF MSDS