World Headquarters Hach Company P.O.Box 389 Loveland, CO USA 80539 (970) 669-3050

MSDS No: M01358

# MATERIAL SAFETY DATA SHEET

# 1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Product Name: StablCal® Standard, 1.0 NTU

Catalog Number: 2659853

Hach Company P.O.Box 389 Loveland, CO USA 80539

Emergency Telephone Numbers: (Medical and Transportation) (303) 623-5716 24 Hour Service (970) 669-3050 (515)232-2533 8am - 4pm CST

MSDS Number: M01358 Chemical Name: Not applicable CAS No.: Not applicable

Chemical Formula: Not applicable Chemical Family: Not applicable

PIN: NA

Intended Use: Standard solution Date of MSDS Preparation:

Day: 22 Month: October Year: 2008

MSDS Prepared: MSDS prepared by Product Compliance Department extension 3350

#### 2. COMPOSITION / INFORMATION ON INGREDIENTS

#### Hexamethylenetetramine

Percent Range: 1.0 - 10.0

Percent Range Units: weight / volume

CAS No.: 100-97-0

LD50: Oral mouse LDLo = 512 mg/kg

LC50: None reported TLV: Not established PEL: Not established

Ingredient WHMIS Symbol: Other Toxic Effects

#### Demineralized Water

Percent Range: 90.0 - 100.0

Percent Range Units: volume / volume

CAS No.: 7732-18-5 LD50: None reported LC50: None reported TLV: Not established PEL: Not established

Ingredient WHMIS Symbol: Not applicable

### Other components, each

Percent Range: < 1.0

Percent Range Units: weight / volume

CAS No.: Not applicable LD50: Not applicable LC50: Not applicable TLV: Not established PEL: Not established

Ingredient WHMIS Symbol: Not applicable

#### Formazin Polymer

Percent Range: < 1.0

Percent Range Units: weight / volume

CAS No.: Not available LD50: None reported. LC50: None reported. TLV: Not established. PEL: Not established.

Ingredient WHMIS Symbol: Not applicable

# 3. HAZARDS IDENTIFICATION

Emergency Overview:

Appearance: Clear, colorless liquid

Physical State: Liquid

Odor: None

MAY CAUSE EYE AND SKIN IRRITATION MAY CAUSE ALLERGIC SKIN REACTION

#### HMIS:

Health: 2

Flammability: 0
Reactivity: 0

Protective Equipment: X - See protective equipment, Section 8.

Potential Health Effects:

Eye Contact: May cause irritiation

Skin Contact: May cause irritiation May cause allergic reaction

Skin Absorption: None Reported Target Organs: Not applicable

Ingestion: May cause: gastrointestinal irritation kidney damage

Target Organs: Kidneys
Inhalation: No effects anticipated
Target Organs: Not applicable

Medical Conditions Aggravated: Allergies or sensitivity to hexamethylenetetramine.

Chronic Effects: Chronic overexposure may cause symptoms similar to acute exposure.

Cancer / Reproductive Toxicity Information:

This product does NOT contain any IARC listed chemicals.

This product does NOT contain any NTP listed chemicals.

Additional Cancer / Reproductive Toxicity Information: Contains: an experimental mutagen.

Toxicologically Synergistic Products: None reported

WHMIS Hazard Classification: Class D, Division 2, Subdivision B - Toxic material (other toxic effects)

WHMIS Symbols: Other Toxic Effects

#### 4. FIRST AID

Eye Contact: Immediately flush eyes with water for 15 minutes. Call physician.

Skin Contact (First Aid): Wash skin with soap and plenty of water.

Ingestion (First Aid): Induce vomiting using syrup of ipecac or by sticking finger down throat. Never give

anything by mouth to an unconscious person. Call physician immediately.

Inhalation: None required.

# 5. FIRE FIGHTING MEASURES

Flammable Properties: During a fire, this product decomposes to form toxic gases.

Flash Point: Not applicable Method: Not applicable Flammability Limits:

Lower Explosion Limits: Not applicable Upper Explosion Limits: Not applicable Autoignition Temperature: Not determined

Hazardous Combustion Products: Toxic fumes of: ammonia formaldehyde nitrogen oxides. carbon

monoxide, carbon dioxide.

Fire / Explosion Hazards: None reported Static Discharge: None reported. Mechanical Impact: None reported

Extinguishing Media: Use media appropriate to surrounding fire conditions

Fire Fighting Instruction: As in any fire, wear self-contained breathing apparatus pressure-demand and full

protective gear. Evacuate area and fight fire from a safe distance.

#### 6. ACCIDENTAL RELEASE MEASURES

Spill Response Notice:

Only persons properly qualified to respond to an emergency involving hazardous substances should respond to a spill involving chemicals. See Section 13, Special Instructions for disposal assistance.

**Containment Technique:** Absorb spilled liquid with non-reactive sorbent material. Dike large spills to keep spilled material from entering sewage and drainage systems or bodies of water.

Clean-up Technique: Absorb spilled liquid with non-reactive sorbent material. Sweep up material. Place material in a plastic bag. Mark bag 'Non-hazardous trash', and dispose of as normal refuse. Decontaminate the area of the spill with a soap solution.

Evacuation Procedure: Evacuate as needed to perform spill clean-up. If conditions warrant, increase the size of the evacuation.

D.O.T. Emergency Response Guide Number: Not applicable

#### 7. HANDLING / STORAGE

Handling: Avoid contact with eyes skin Do not breathe mist or vapors. Wash thoroughly after handling.

Maintain general industrial hygiene practices when using this product.

Storage: Store between 5 - 25 °C. Keep away from: direct sunlight Protect from: heat

# 8. EXPOSURE CONTROLS / PROTECTIVE EQUIPMENT

Engineering Controls: Have an eyewash station nearby. Maintain general industrial hygiene practices when using this product.

Personal Protective Equipment:

Eye Protection: safety glasses with top and side shields

Skin Protection: disposable latex gloves Inhalation Protection: adequate ventilation

Precautionary Measures: Avoid contact with: eyes skin Do not breathe: mist/vapor Wash thoroughly after

handling

TLV: Not established PEL: Not established

#### 9. PHYSICAL / CHEMICAL PROPERTIES

Appearance: Clear, colorless liquid

Physical State: Liquid

Molecular Weight: Not applicable

*Odor:* None *pH:* 8.53

Vapor Pressure: Not determined

Vapor Density (air = 1): Not determined

Boiling Point: 100°C

Melting Point: Not applicable Specific Gravity (water = 1): 1.01

Evaporation Rate (water = 1): Not determined

Volatile Organic Compounds Content: Not determined

Coefficient of Water / Oil: Not applicable

Solubility:

Water: Miscible
Acid: Miscible
Other: Not determined

Metal Corrosivity:
Steel: Not determined

Aluminum: Not determined

# 10. STABILITY / REACTIVITY

Chemical Stability: Stable when stored under proper conditions.

Conditions to Avoid: Extreme temperatures

Reactivity / Incompatibility: Incompatible with: oxidizers

Hazardous Decomposition: Heating to decomposition releases: ammonia carbon monoxide formaldehyde

nitrogen oxides

Hazardous Polymerization: Will not occur.

#### 11. TOXICOLOGICAL INFORMATION

Product Toxicological Data:

LD50: None reported LC50: None reported

Dermal Toxicity Data: None reported Skin and Eye Irritation Data: None reported

Mutation Data: Hexamethylenetetramine: Cytogenic analysis in human Hela cells @ 1 mmol/l; Oncogenic

Transformation - hamster kidney - 10 mg/L Reproductive Effects Data: None reported

Ingredient Toxicological Data: Hexamethylenetetramine: Oral mouse LDLo = 512 mg/kg

# 12. ECOLOGICAL INFORMATION

Product Ecological Information: --

No ecological data available for this product.

Ingredient Ecological Information: Hexamethylenetetramine: Water Pollution Factors: BOD<sub>5</sub>: 0.015, 0.026, std. dil. sew.

#### 13. DISPOSAL CONSIDERATIONS

Special Instructions (Disposal): Dilute material with excess water making a weaker than 5% solution. Open cold water tap completely, slowly pour the material to the drain. Flush system with plenty of water. Empty Containers: Rinse three times with an appropriate solvent. Dispose of empty container as normal trash.

**NOTICE** (Disposal): These disposal guidelines are based on federal regulations and may be superseded by more stringent state or local requirements. Please consult your local environmental regulators for more information.

#### 14. TRANSPORT INFORMATION

T.D.G.,

Proper Shipping Name: Not Currently Regulated

Hazard Class: NA

PIN: NA Group: NA

Subsidiary Risk: NA

Additional Information: There is a possibility that this product could be contained in a reagent set or kit composed of various compatible dangerous goods. If the item is NOT in a set or kit, the classification given above applies. If the item IS part of a set or kit, the classification would change to the following: UN3316 Chemical Kit, Class 9, PG II or III. If the item is not regulated, the Chemical Kit classification does not apply.

#### 15. REGULATORY INFORMATION

National Inventories:

Canadian Inventory Status: All ingredients of this product are DSL Listed.

This product has been classified in accordance with the hazard criteria of the CPR and the MSDS contains all of the information required by the CPR.

# 16. OTHER INFORMATION

References: 29 CFR 1900 - 1910 (Code of Federal Regulations - Labor). Air Contaminants, Federal Register, Vol. 54, No. 12. Thursday, January 19, 1989. pp. 2332-2983. CCINFO RTECS. Canadian Centre for Occupational Health and Safety. Hamilton, Ontario Canada: 30 June 1993. Fire Protection Guide on Hazardous Materials, 10th Ed. Quincy, MA: National Fire Protection Fire Protection Guide on Hazardous Materials, 10th Ed. Quincy, MA: National Fire Protection Association, 1991. IARC Monographs on the Evaluation of the Carcinogenic Risks to Humans. World Health Organization (Volumes 1-42) Supplement 7. France: 1987. Lefevre, Marc J. First Aid Manual for Chemical Accidents, 2nd Ed. New York: Van Nostrand Reinhold Company, 1989. List of Dangerous Substances Classified in Annex I of the EEC Directive (67/548) - Classification, Packaging and Labeling of Dangerous Substances, Amended July 1992. Sixth Annual Report on Carcinogens, 1991. U.S. Department of Health and Human Services. Rockville, MD: Technical Resources, Inc. 1991. Technical Judgment. TLV's Threshold Limit Values and Biological Exposure Indices

for 1992-1993. American Conference of Governmental Industrial Hygienists, 1992. Verschueren, Karel. Handbook of Environmental Data on Organic Chemicals. New York: Van Nostrand Reinhold Co., 1977.

# Legend:

NA - Not Applicable w/w - weight/weight
ND - Not Determined w/v - weight/volume
NV - Not Available v/v - volume/volume

**USER RESPONSIBILITY:** Each user should read and understand this information and incorporate it in individual site safety programs in accordance with applicable hazard communication standards and regulations.

THE INFORMATION CONTAINED HEREIN IS BASED ON DATA CONSIDERED TO BE ACCURATE. HOWEVER, NO WARRANTY IS EXPRESSED OR IMPLIED REGARDING THE ACCURACY OF THESE DATA OR THE RESULTS TO BE OBTAINED FROM THE USE THEREOF.

HACH COMPANY ©2009