

Safety Data Sheet

According to the REACH Regulations 1907/2006/EC Article 31, Federal OSHA, WHMIS

Section I Identification of the Substances/Mixture and of the Company/Undertaking

Section 4 Identification of the Substance/Mixture and of the Company/undertaking

Distributor		Manufacturer		EC Representative	
Name	Beckman Coulter Inc	Name	Canterbury Scientific Ltd	Name	MDC Partners
Address	250 S Kraemer Blvd., Brea, CA 92821 USA	Address	71 Whiteleigh Avenue Christchurch, 8011 NEW ZEALAND	Address	Uitbreidingstraat 86/2 2600 Antwerpen BELGIUM
Telephone	+1-714-961-3659	Operating Hour	9am to 5pm Local Time	Telephone	
Fax	+1-714-993-8737	Telephone	+64 3 343 3345	Fax	+32 3 870 97 69
		Fax	+64 3 343 3342	Email	+32 3 870 97 info@mdcpartners
		Email	info@canterburyscientific.com		
Product Name	Haemoglobin A1c Liquid Stable Controls Levels 1 and 2		Product Codes: B12396, B12397		
Product Use	Liquid stable human blood lysate matrix for in vitro diagnostic use as a quality control material to assess laboratory instrument/reagent systems. Control materials should be handled and used as per the Instructions for Use provided with the control kit.				

Section II Hazards Identification

Product Description	Liquid mixture, cherry red containing human blood
Classification according to Regulation (EC) No 1272/2008	Not Applicable
Classification of the Product	These products do not contain any ingredients which have been determined to be health hazards or physical hazards pursuant to Federal OSHA (29 CFR 1910.1200), WHMIS and Regulation (EC) No 1272/2008
Emergency overview	NOT EXPECTED TO PRODUCE SIGNIFICANT ADVERSE HEALTH EFFECTS WHEN THE RECOMMENDED INSTRUCTIONS FOR USE ARE FOLLOWED. No known significant effects or critical hazards. Avoid prolonged contact with eyes, skin and clothing. Potentially biohazardous material.

Section III Composition / Information on Ingredients

Chemical Family	Liquid stabilized Human Red Cell Lysate Control Material	Chemical Name	Hemoglobin, human
Component	CAS Number	Concentration Ranges	EEC Symbol/Risk Phrases
Hemoglobin, human	9008-02-0	130 – 150 g/L	F Not Classified
Potassium Cyanide	151-50-8	<0.008%	T+; R26/27/28, R32 N; R50/53

The identity(ies) and concentration(s) of other ingredient(s) is/are withheld as a trade secret.

Section IV First Aid Measures

Eye Contact	Check for and remove any contact lenses. Immediately flush eyes with plenty of water for at least 15 minutes, occasionally lifting the upper and lower eyelids. Get medical attention if eye irritation occurs.
Skin Contact	In case of contact, immediately flush skin with plenty of water for at least 15 minutes while removing contaminated clothing and shoes. Wash clothing before reuse. Clean shoes thoroughly before reuse. Get medical attention if skin irritation occurs or if the product is in contact of skin breakage.
Ingestion	Wash out mouth with water. Do not induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. Get medical attention if symptoms occur.
Inhalation	Move exposed person to fresh air. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. Loosen tight clothing such as a collar, tie, belt or waistband. Get medical attention if symptoms occur.

Section V Fire Fighting Measures

Flammability of the product	This product is not flammable. In a fire or if heated, a pressure increase will occur and the container may burst.
Extinguishing media	In case of fire, use water spray (fog), foam or dry chemical.
Not suitable	None known
Special exposure hazards	Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.
Hazardous combustion products	No specific data.
Special protective equipment for fire-fighters	Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.

Section VI Accidental Release Measures

Personal precautions	No action shall be taken involving any personal risk or without suitable training.
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Environmental precautions	Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Put on appropriate personal protective equipment (see Section VIII).
	Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).
Small spill	Stop leak if without risk. Move containers from spill area. Dilute with water and mop up or absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.

Section VII Handling and Storage

Handling	Put on appropriate personal protective equipment (see section VIII). Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking.
Storage	Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see section X) and food and drink. Storage conditions shall comply with that are stated in the information for use sheet. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination.

Section VIII Exposure Controls and Personal Protection

Product name	Exposure limits
Haemoglobin A1c Liquid Stable	Not determined
Controls Levels 1 and 2	

Consult local authorities for acceptable exposure limits.

Recommended monitoring procedures	If this product contains ingredients with exposure limits, personal, workplace atmosphere or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment.
Engineering measures	No special ventilation requirements. Good general ventilation should be sufficient to control worker exposure to airborne contaminants. If this product contains ingredients with exposure limits, use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure below any recommended or statutory limits. Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.
Personal protection	
Respiratory	Use a properly fitted, air-purifying or air-fed respirator complying with an approved standard if a risk assessment indicates this is necessary. Respirator selection must be based on known or anticipated exposure levels, the hazards of the product and the safe working limits of the selected respirator.
Hands	Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary.
Eyes	Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists or dusts.
Skin	Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
Environmental exposure controls	Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.

Section IX Physical and Chemical Properties

Product Name	Haemoglobin A1c Liquid Stable Controls Levels 1	Haemoglobin A1c Liquid Stable Controls Levels 2
Physical state	Liquid	Liquid
Color	Translucent, Cherry Red	Translucent, Cherry Red
Odor	Weak smell of blood	Weak smell of blood
Odor Threshold	Not Available	Not Available
pH	Neutral	Neutral
Melting/freezing point	Not Available	Not Available
Boiling point and Boiling Range	Not Available	Not Available
Flash point	Not Available	Not Available
Evaporation rate	Not Available	Not Available
Flammability/Upper/Lower Flammability	Not Applicable	Not Applicable
Vapor pressure	Not Available	Not Available
Vapor density	Not Available	Not Available
Relative density	Not Available	Not Available
Solubility(ies)	Not Applicable	Not Applicable
Partition coefficient	Not Available	Not Available
Auto-ignition temperature	Not Applicable	Not Applicable
Decomposition temperature	Not Available	Not Available
Molecular weight	Not Available	Not Available
Molecular formula	Not Available	Not Available
Volatility	Not Available	Not Available

Viscosity	Not Available	Not Available
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Section X Stability and Reactivity

Reactivity	No specific data.
Chemical Stability	The product is chemically stable
Possibility of Hazardous Reactions	Under normal conditions of storage and use, hazardous reactions will not occur.
Conditions to avoid	No specific data.
Incompatible Materials	No specific data. Not available.
Hazardous decomposition products	Under normal conditions of storage and use, hazardous decomposition products should not be produced.
Hazardous polymerization	Under normal conditions of storage and use, hazardous polymerization will not occur.

Section XI Toxicological Information

For information on the likely routes of exposure and symptoms related to the physical, chemical and toxicological characteristics, please see Section IV.

Immediate Effects – Short Term	No known significant effects
Delayed Effects – Short Term	No known significant effects
Chronic Effects – Short Term	No known significant effects
Immediate Effects – Long Term	No known significant effects
Delayed Effects – Long Term	No known significant effects
Chronic Effects – Long Term	No known significant effects

United States

Acute toxicity	Contains <0.008% of KCN. KCN has acute oral toxicity (LD 50) of 5mg/kg [rat].
Chronic toxicity	Not Available
Carcinogenicity	Not Available
Mutagenicity	Not Available
Teratogenicity	Not Available
Reproductive toxicity	Not Available

Canada

Acute toxicity	Contains <0.008% of KCN. KCN has acute oral toxicity (LD 50) of 5mg/kg [rat].
Chronic toxicity	Not Available
Carcinogenicity	Not Available
Mutagenicity	Not Available
Teratogenicity	Not Available
Reproductive toxicity	Not Available

This product does not contain any hazardous chemicals listed in the National Toxicology Program (NTP) Report on Carcinogens (latest edition) or has been found to be a potential carcinogen in the International Agency for Research on Cancer (IARC) Monographs (latest edition) or by OSHA.

Section XII Ecological Information

Environmental effects	No known significant effects or critical hazards.
Aquatic ecotoxicity	No further relevant information available.
Biodegradability	No further relevant information available.
Persistence and degradability	No further relevant information available.
Bioaccumulative potential	No further relevant information available.
Mobility in soil	No further relevant information available.
Other adverse effects	Do not allow product to reach ground water, water course or sewage system. Danger to drinking water.

Section XIII Disposal Considerations

Waste disposal	The generation of waste should be avoided or minimized wherever possible. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe way. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Disposal of this product, solutions and any byproducts should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.
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Disposal should be in accordance with applicable regional, national and local laws and regulations.

Refer to Section VII: HANDLING AND STORAGE and Section VIII: EXPOSURE CONTROLS/PERSONAL PROTECTION for additional handling information and protection of employees.

Section XIV Transport Information

International transport regulations		
DOT Classification		
UN number	Haemoglobin A1c Liquid Stable Controls Levels 1	Not regulated
	Haemoglobin A1c Liquid Stable Controls Levels 2	Not regulated
TGD Classification		
UN number	Haemoglobin A1c Liquid Stable Controls Levels 1	Not regulated
	Haemoglobin A1c Liquid Stable Controls Levels 2	Not regulated
Mexico Classification		
UN number	Haemoglobin A1c Liquid Stable Controls Levels 1	Not regulated
	Haemoglobin A1c Liquid Stable Controls Levels 2	Not regulated
MIGD Classification		
UN number	Haemoglobin A1c Liquid Stable Controls Levels 1	Not regulated
	Haemoglobin A1c Liquid Stable Controls Levels 2	Not regulated
IATA-DGR Classification		
UN number	Haemoglobin A1c Liquid Stable Controls Levels 1	Not regulated

Section XV Regulatory Information

United States		Not regulated
HCS Classification		
U.S. Federal regulations		TSCA 8(a) IUR: water United States inventory (TSCA 8b): Not determined. SARA 302/304/311/312 extremely hazardous substances: No products were found. SARA 302/304 emergency planning and notification: No products were found. SARA 302/304/311/312 hazardous chemicals: No products were found. SARA 311/312 MSDS distribution - chemical inventory - hazard identification: No products were found.
State regulations		California Prop 65: None of the components are listed. Clean Water Act (CWA) 307: No products were found. Clean Water Act (CWA) 311: No products were found. Clean Air Act (CAA) 112 accidental release prevention: No products were found. Clean Air Act (CAA) 112 regulated flammable substances: No products were found. Clean Air Act (CAA) 112 regulated toxic substances: No products were found. Connecticut Carcinogen Reporting: None of the components are listed. Connecticut Hazardous Material Survey: None of the components are listed. Florida substances: None of the components are listed. Illinois Chemical Safety Act: None of the components are listed. Illinois Toxic Substances Disclosure to Employee Act: None of the components are listed. Louisiana Reporting: None of the components are listed. Louisiana Spill: None of the components are listed. Massachusetts Spill: None of the components are listed. Massachusetts Substances: None of the components are listed. Michigan Critical Material: None of the components are listed. Minnesota Hazardous Substances: None of the components are listed. New Jersey Hazardous Substances: None of the components are listed. New Jersey Spill: None of the components are listed. New Jersey Toxic Catastrophe Prevention Act: None of the components are listed. New York Acutely Hazardous Substances: None of the components are listed. New York Toxic Chemical Release Reporting: None of the components are listed. Pennsylvania RTK Hazardous Substances: None of the components are listed. Rhode Island Hazardous Substances: None of the components are listed.
United States inventory (TSCA 8b)		Not determined. Canada inventory : Not determined. Use only for medical diagnostic purposes
Canada		
Canadian lists		CEPA Toxic substances: None of the components are listed. Canadian ARET: None of the components are listed. Canadian NPRI: None of the components are listed. Alberta Designated Substances: None of the components are listed. Ontario Designated Substances: None of the components are listed. Quebec Designated Substances: None of the components are listed.
Canada inventory		Not determined.
This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations and the MSDS contains all the information required by the Controlled Products Regulations.		

Section XVI Other Information

EU regulations	
Risk phrases	This product is not classified according to EU legislation.
International regulations	Australia inventory (AICS): Not determined. China inventory (IECSC): Not determined. Japan inventory (ENCS): Not determined. Japan inventory (ISHL): Not determined. Korea inventory (KECI): Not determined. New Zealand Inventory of Chemicals (NZIoC): Not determined. Philippines inventory (PICCS): Not determined.

NFPA Rating Index	Health	Flammability	Reactivity	Special Precautions
Health: 1= Caution may cause irritation Flammability: 0 = Not Combustible Reactivity: 0 = Stable, Not Reactive when mixed with water.	1	0	0	None

Description of Hazard Class and Risk Phrases

T+	Very Toxic
N	Dangerous for the environment
R26/27/28	Very toxic by inhalation, in contact with skin and if swallowed
R32	Contact with acid liberates very toxic gas
R50/53	Very toxic to aquatic organisms, may cause long term adverse effects in the aquatic environment.

Notice to Readers

To the best of our knowledge, the information contained herein is accurate. However, the above-named manufacturer does not assume any liability whatsoever for the accuracy or completeness of the information contained herein.

Final determination of suitability of any material is the sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards that exist.

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