Safety Data Sheet



Section 1: Identification of the Substance/Mixture and of the Company/Undertaking

1.1 Product identifier

Product Name

• D-2 Emulsion

• White liquid

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

Relevant identified use(s) • Water-based emulsion

1.3 Details of the supplier of the safety data sheet

Manufacturer • IKONICS Corporation

4832 Grand Ave. Duluth, MN 55807 United States www.ikonics.com sds@ikonics.com

Telephone (General) • (218) 628-2217

Telephone (General) • (800) 328-4261 - Toll free

1.4 Emergency telephone number

Chemtrec • 1-800-424-9300 - Within USA and Canada

• +1 703-527-3887 - Outside USA and Canada (collect calls accepted)

Section 2: Hazards Identification

EU/EEC

According to EU Directive 1272/2008 (CLP)/REACH 1907/2006 [amended by 453/2010] According to EU Directive 67/548/EEC (DSD) or 1999/45/EC (DPD)

2.1 Classification of the substance or mixture

CLPNot classifiedDSD/DPDNot classified

2.2 Label Elements

CLP

Hazard statements . Not classified

Precautionary statements

Prevention • P280 - Wear protective gloves/protective clothing/eye protection/face protection.

Response • P302+P352 - IF ON SKIN: Wash with plenty of soap and water.

P304+P341 - IF INHALED: If breathing is difficult, remove victim to fresh air and keep at

rest in a position comfortable for breathing.

P305+P351+P338 - IF IN EYES: Rinse cautiously with water for several minutes.

Remove contact lenses, if present and easy to do. Continue rinsing.

Storage/Disposal • P501 - Dispose of content and/or container in accordance with local, regional, national,

and/or international regulations.

DSD/DPD

Safety phrases • S36/37/39 - Wear suitable protective clothing, gloves and eye/face protection.

2.3 Other Hazards

CLPNo data availableDSD/DPDNo data available

UN GHS

According to Third Revised Edition

2.1 Classification of the substance or mixture

UN GHS

Not classified

2.2 Label elements

UN GHS

Hazard statements . Not classified

Precautionary statements

Prevention • P280 - Wear protective gloves/protective clothing/eye protection/face protection.

Response • P302+P352 - IF ON SKIN: Wash with plenty of soap and water.

P304+P341 - IF INHALED: If breathing is difficult, remove victim to fresh air and keep at

rest in a position comfortable for breathing.

P305+P351+P338 - IF IN EYES: Rinse cautiously with water for several minutes.

Remove contact lenses, if present and easy to do. Continue rinsing.

Storage/Disposal • P501 - Dispose of content and/or container in accordance with local, regional, national, and/or international regulations.

2.3 Other hazards

UN GHS

• No data available

United States (US)

According to OSHA 29 CFR 1910.1200 HCS

2.1 Classification of the substance or mixture

OSHA HCS 2012

Not classified

2.2 Label elements

OSHA HCS 2012

Precautionary statements

Prevention • Wear protective gloves/protective clothing/eye protection/face protection. - P280

Response • IF ON SKIN: Wash with plenty of soap and water. - P302+P352

IF INHALED: If breathing is difficult, remove victim to fresh air and keep at rest in a position comfortable for breathing. - P304+P341

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if

present and easy to do. Continue rinsing. - P305+P351+P338

Storage/Disposal • Dispose of content and/or container in accordance with local, regional, national, and/or international regulations. - P501

2.3 Other hazards

OSHA HCS 2012

• No data available

Canada

According to WHMIS

2.1 Classification of the substance or mixture

WHMIS Not classified

2.2 Label elements

WHMIS Not classified

2.3 Other hazards

WHMIS No data available

2.4 Other information





Section 3 - Composition/Information on Ingredients

3.1 Substances

3.2 Mixtures

Eye

Ingestion

Hazardous Components							
Chemical Name	Identifiers	%(weight)	LD50/LC50	Classifications According to Regulation/Directive	Comments		
Isopropyl alcohol	CAS:67-63-0 EC Number:200- 661-7 UN:UN1219 EINECS:200-661- 7	8.1%	Inhalation-Rat LC50 • 16000 ppm 8 Hour(s) Skin-Rabbit LD50 • 12800 mg/kg Ingestion/Oral-Rat LD50 • 5000 mg/kg	WHMIS: Flam. Liq B2; Other Toxic Effects - D2B UN GHS: Flam. Liq. 2; Eye Irrit. 2A; STOT SE 3: Narc. EU DSD/DPD: Highly Flammable(F); Irritant(Xi); R11; R36; R67 EU CLP: Flam. Liq. 2; Eye Irrit. 2; STOT SE 3: Narc. OSHA HCS 2012:			

Section 4 - First Aid Measures

4.1 Description of first aid measures

Inhalation • IF INHALED: If breathing is difficult, remove victim to fresh air and keep at rest in a position comfortable for breathing. If not breathing, give artificial respiration and call 911 or emergency

medical service.

Skin • IF ON SKIN: Wash with plenty of soap and water. If skin irritation occurs: Get medical

advice/attention.

• IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present

and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention.

• If swallowed, do NOT induce vomiting unless directed to do so by medical personnel. Rinse mouth. Never give anything by mouth to an unconscious person. If large quantities are swallowed, call a physician immediately.

4.2 Most important symptoms and effects, both acute and delayed

No data available

4.3 Indication of any immediate medical attention and special treatment needed

Section 5 - Firefighting Measures

5.1 Extinguishing media

Suitable Extinguishing

SMALL FIRES: Dry chemical, CO2, water spray or regular foam.

Media

LARGE FIRE: Water spray, fog or regular foam.

Unsuitable

No data available

Extinguishing Media

Firefighting Procedures • Fire fighters should wear complete protective clothing including self-contained breathing

apparatus.

Keep unauthorized personnel away. Ventilate closed spaces before entering.

LARGE FIRES: Use extinguishing agent suitable for type of surrounding fire.

5.2 Special hazards arising from the substance or mixture

Unusual Fire and Explosion Hazards Material may burn, but does not ignite readily.

Products

Hazardous Combustion • Products of combustion include: carbon oxides (COx).

5.3 Advice for firefighters

 Structural firefighters' protective clothing provides limited protection in fire situations ONLY; it is not effective in spill situations where direct contact with the substance is possible.

Wear chemical protective clothing that is specifically recommended by the manufacturer.

It may provide little or no thermal protection.

Wear positive pressure self-contained breathing apparatus (SCBA).

Section 6 - Accidental Release Measures

6.1 Personal precautions, protective equipment and emergency procedures

Personal Precautions

 Do not touch damaged containers or spilled material unless wearing appropriate protective clothing.

Emergency Procedures

• No emergency procedures are expected to be necessary if material is used under ordinary conditions as recommended. Use normal clean up procedures.

6.2 Environmental precautions

• No data available

6.3 Methods and material for containment and cleaning up

Containment/Clean-up

Measures

• Use appropriate Personal Protective Equipment (PPE) Contain and/or absorb spill with inert material (e.g. sand, vermiculite), then place in suitable container.

6.4 Reference to other sections

 Refer to Section 8 - Exposure Controls/Personal Protection and Section 13 - Disposal Considerations.

Section 7 - Handling and Storage

7.1 Precautions for safe handling

Handling

• Use good safety and industrial hygiene practices.

7.2 Conditions for safe storage, including any incompatibilities

Storage

• Keep container closed when not in use. Store away from extreme heat. Do not freeze. Ventilate enclosed areas.

7.3 Specific end use(s)

• Refer to Section 1.2 - Relevant identified uses.

Section 8 - Exposure Controls/Personal Protection

8.1 Control parameters

			Exposure Limits	/Guidelines				
	Result	ACGIH	Argentina	Australia	Belgium	Brazil		
Isopropyl alcohol	STELs	400 ppm STEL	500 ppm STEL [CMP-CPT]	500 ppm STEL; 1230 mg/m3 STEL	400 ppm STEL; 1000 mg/m3 STEL	Not established		
(67-63-0)	TWAs	200 ppm TWA	400 ppm TWA [CMP]	400 ppm TWA; 983 mg/m3 TWA	200 ppm TWA; 500 mg/m3 TWA	310 ppm TWA LT; 765 mg/m3 TWA LT		
		Ex	posure Limits/Gu	idelines (Con't.)				
	Result	Canada Alberta	Canada British Columbia	Canada Manitoba	Canada New Brunswick	Canada Northwest Territories		
Isopropyl alcohol	STELs	400 ppm STEL; 984 mg/m3 STEL	400 ppm STEL	400 ppm STEL	500 ppm STEL; 1230 mg/m3 STEL	500 ppm STEL; 1228 mg/m3 STEL		
(67-63-0)	TWAs	200 ppm TWA; 492 mg/m3 TWA	200 ppm TWA	200 ppm TWA	400 ppm TWA; 983 mg/m3 TWA	400 ppm TWA; 983 mg/m3 TWA		
		Ex	posure Limits/Gu	idelines (Con't.)				
	Result	Canada Nova Scotia	Canada Nunavut	Canada Ontario	Canada Quebec	Canada Saskatchewan		
Isopropyl alcohol	STELs	400 ppm STEL	500 ppm STEL; 1228 mg/m3 STEL	400 ppm STEL	500 ppm STEV; 1230 mg/m3 STEV	400 ppm STEL		
(67-63-0)	TWAs	200 ppm TWA	400 ppm TWA; 983 mg/m3 TWA	200 ppm TWA	400 ppm TWAEV; 985 mg/m3 TWAEV	200 ppm TWA		
		Ex	posure Limits/Gu	idelines (Con't.)				
	Result	Canada Yukon	Chile	China	Denmark	Egypt		
Isopropyl alcohol	STELs	500 ppm STEL; 1225 mg/m3 STEL	500 ppm STEL LPT; 1230 mg/m3 STEL LPT	700 mg/m3 STEL	Not established	500 ppm STEL; 1230 mg/m3 STEL		
(67-63-0)	TWAs	400 ppm TWA; 980 mg/m3 TWA	320 ppm TWA LPP; 786 mg/m3 TWA LPP	350 mg/m3 TWA	200 ppm TWA; 490 mg/m3 TWA	Not established		
		Ex	posure Limits/Gu	idelines (Con't.)				
	Result	Finland	France	Germany DFG	Germany TRGS	Hong Kong		
	STELs	250 ppm STEL; 620 mg/m3 STEL	400 ppm STEL [VLCT]; 980 mg/m3 STEL [VLCT]	Not established	Not established	500 ppm STEL; 1230 mg/m3 STEL		
Isopropyl alcohol (67-63-0)	TWAs	200 ppm TWA; 500 mg/m3 TWA	Not established	Not established	200 ppm TWA AGW (The risk of damage to the embryo or fetus can be excluded when AGW and BGW values are observed, exposure factor 2); 500 mg/m3 TWA AGW (The risk of damage to the embryo or fetus can be excluded when AGW and BGW values are observed, exposure factor 2)	Not established		
	Ceilings	Not established	Not established	400 ppm Peak; 1000 mg/m3 Peak	Not established	Not established		
	MAKs	Not established	Not established	200 ppm TWA MAK; 500 mg/m3 TWA MAK	Not established	Not established		
	Exposure Limits/Guidelines (Con't.)							
	Result	Indonesia	Ireland	Japan	Korea	Mexico		
Isopropyl alcohol	Ceilings	Not established	Not established	400 ppm Ceiling:	Not established	Not established		

(67-63-0)				980 mg/m3 Ceiling		
	STELs	Not established	400 ppm STEL	Not established	400 ppm STEL; 980 mg/m3 STEL	500 ppm STEL [LMPE-CT]; 1225 mg/m3 STEL [LMPE-CT]
	TWAs	400 ppm TWA; 983 mg/m3 TWA	200 ppm TWA	Not established	200 ppm TWA; 480 mg/m3 TWA	400 ppm TWA LMPE-PPT; 980 mg/m3 TWA LMPE- PPT
		Ex	posure Limits/Gu	idelines (Con't.)		
	Result	New Zealand	NIOSH	Norway	OSHA	Philippines
Isopropyl alcohol		mg/m3 TWA	400 ppm TWA; 980 mg/m3 TWA		400 ppm TWA; 980 mg/m3 TWA	400 ppm TWA; 980 mg/m3 TWA
(67-63-0)	STELs		500 ppm STEL; 1225 mg/m3 STEL	Not established	Not established	Not established
		Ex	posure Limits/Gu	idelines (Con't.)		
	Result	Poland	Portugal	Russia	Singapore	South Africa
	STELs		400 ppm STEL [VLE-CD	50 mg/m3 STEL (vapor)	500 ppm STEL; 1230 mg/m3 STEL	500 ppm STEL; 1225 mg/m3 STEL
Isopropyl alcohol (67-63-0)			200 ppm TWA [VLE- MP]		400 ppm PEL; 983 mg/m3 PEL	400 ppm TWA; 960 mg/m3 TWA; 980 mg/m3 TWA (regulated under Propane-2-ol)
		Ex	posure Limits/Gu	idelines (Con't.)		
	Result	Spain	Sweden	Switzerland	Taiwan	Venezuela
	MAKs	Not established	Not established	200 ppm TWA [MAK]; 500 mg/m3 TWA [MAK]	Not established	Not established
	STELs	400 ppm STEL [VLA-EC]; 1000 mg/m3 STEL [VLA- EC]	250 ppm STV; 600 mg/m3 STV	400 ppm STEL [KZW]; 1000 mg/m3 STEL [KZW]	Not established	500 ppm STEL [LEB
Isopropyl alcohol (67-63-0)	TWAs	200 ppm TWA [VLA ED] (it is prohibited the partial or complete commercialization o use of this substance as a phytosanitary o biocide compound); 500 mg/m3 TWA [VLA-ED] (it is prohibited the partial or complete commercialization o use of this substance as a phytosanitary o biocide compound)	150 ppm LLV; 350 mg/m3 LLV	Not established	400 ppm TWA; 983 mg/m3 TWA	400 ppm TWA [CAP
	Biologica Limit Values (BLV)	40 mg/L urine end o workweek Acetone (1,F,I)	f Not established	Not established	Not established	Not established

Exposure Control Notations

Switzerland

•Isopropyl alcohol (67-63-0): **Developmental Risk Groups:** (Developmental Risk Group C)

Portugal

•Isopropyl alcohol (67-63-0): Carcinogens: (A4 - Not Classifiable as a Human Carcinogen)

Singapore

•Isopropyl alcohol (67-63-0): **Odour Threshold - High:** (490 mg/m3) | **Odour Threshold - Low:** (8 mg/m3) | **Irritation:** (490 mg/m3) **South Africa**

•Isopropyl alcohol (67-63-0): Skin: (Skin Notation)

Brazil

•Isopropyl alcohol (67-63-0): Skin: (skin designation)

Ireland

•Isopropyl alcohol (67-63-0): **Skin:** (Potential for cutaneous absorption)

ACGIH

•Isopropyl alcohol (67-63-0): Carcinogens: (A4 - Not Classifiable as a Human Carcinogen)

Germany DFG

•Isopropyl alcohol (67-63-0): Pregnancy: (no risk to embryo/fetus if exposure limits adhered to)

Exposure Limits Supplemental

Switzerland

•Isopropyl alcohol (67-63-0): **Biological Limit Values:** (25 mg/L Medium: urine Time: end of shift Parameter: Acetone; 25 mg/L Medium: whole blood Time: end of shift Parameter: Acetone)

Argentina

•Isopropyl alcohol (67-63-0): BEIs: (2 mg/g Creatinine urine Acetone)

ACGIH

•Isopropyl alcohol (67-63-0): **BEIs:** (40 mg/L Medium: urine Time: end of shift at end of workweek Parameter: Acetone (background, nonspecific)) | **TLV Basis - Critical Effects:** (CNS impairment; eye and upper respiratory tract irritation)

Germany TRGS

•Isopropyl alcohol (67-63-0): **BELs:** (50 mg/L Medium: whole blood Time: end of shift Parameter: Acetone; 50 mg/L Medium: urine Time: end of shift Parameter: Acetone)

8.2 Exposure controls

Engineering

Measures/Controls

 Local exhaust is recommended but not required. Provide adequate ventilation as necessary.

Personal Protective Equipment

Pictograms

■ Ø Ø

Respiratory • In case of insufficient ventilation, wear suitable respiratory equipment.

• Wear protective eyewear (goggles, face shield, or safety glasses).

• Wear protective gloves - rubber or neoprene.

• Wear protective clothing - apron or other impervious body coverings.

General Industrial Hygiene Considerations

Environmental Exposure

 Handle in accordance with good industrial hygiene and safety practice. Avoid contact with skin, eyes or clothing. Wash thoroughly with soap and water after

handling.

Controls

No data available

Section 9 - Physical and Chemical Properties

9.1 Information on Physical and Chemical Properties

Material Description			
Physical Form	Liquid	Appearance/Description	Viscous liquid.
Color	White	Odor	Mild
Taste	Not relevant	Odor Threshold	No data available
Physical and Chemical Properties	Not relevant		
General Properties			•
Boiling Point	100 C(212 F)	Melting Point	Not relevant
Decomposition Temperature	Not relevant	рН	No data available
Density	8.7 lbs/gal	Water Solubility	Miscible
Viscosity	No data available	Explosive Properties	Not relevant
Oxidizing Properties:	Not relevant		
Volatility			-
Vapor Pressure	Not relevant	Vapor Density	Not relevant

Evaporation Rate	Not relevant	VOC (Vol.)	81 g/L
Volatiles (Wt.)	80 %		
Flammability			
Flash Point	Not measurable	UEL	Not relevant
LEL	Not relevant	Autoignition	Not relevant
Flammability (solid, gas)	Not relevant		
Environmental			
Half-Life	No data available	Octanol/Water Partition coefficient	No data available
Coefficient of water/oil distribution	No data available	Bioaccumulation Factor	No data available
Bioconcentration Factor	No data available	Biochemical Oxygen Demand BOD/BOD5	No data available
Chemical Oxygen Demand	No data available	Persistence	No data available
Degradation	No data available		

9.2 Other Information

• No data available

Section 10: Stability and Reactivity

10.1 Reactivity

• No dangerous reaction known under conditions of normal use.

10.2 Chemical stability

• Stable

10.3 Possibility of hazardous reactions

• Hazardous polymerization will not occur.

10.4 Conditions to avoid

• Direct sunlight. Excess heat. Avoid freezing.

10.5 Incompatible materials

• Strong oxidizing agents.

10.6 Hazardous decomposition products

• Hazardous decomposition products formed under fire conditions - carbon oxides (COx). No decomposition is expected under normal storage and use conditions.

Section 11 - Toxicological Information

11.1 Information on toxicological effects

Component Name	CAS	Data		
Isopropyl alcohol (8.1%)	67-63-0	Acute Toxicity: orl-rat LD50:5000 mg/kg; ihl-rat LC50:16000 ppm/8H; skn-rbt LD50:12800 mg/kg; Irritation: eye-rbt 100 mg/24H MOD		
GHS Properties		Classification		
Acute toxicity		EU/CLP• OSHA HCS 2012• UN GHS•		
Aspiration Hazard OSHA HCS 2012 UN GHS OSHO DE CONTROL OF THE PROPERTY OF T		OSHA HCS 2012•		
Carcinogenicity		EU/CLP• OSHA HCS 2012• UN GHS•		
Germ Cell Mutagenicity		EU/CLP• OSHA HCS 2012• UN GHS•		

Skin corrosion/Irritation	EU/CLP• OSHA HCS 2012• UN GHS•
Skin sensitization	EU/CLP• OSHA HCS 2012• UN GHS•
STOT-RE	EU/CLP• OSHA HCS 2012• UN GHS•
STOT-SE	EU/CLP• OSHA HCS 2012• UN GHS•
Toxicity for Reproduction	EU/CLP• OSHA HCS 2012• UN GHS•
Respiratory sensitization	EU/CLP• OSHA HCS 2012• UN GHS•
Serious eye damage/Irritation	EU/CLP• OSHA HCS 2012• UN GHS•

Potential Health Effects

Inhalation

Acute (Immediate) • May cause mild irritation.

Chronic (Delayed) • Repeated and prolonged exposure may cause irritation.

Skin

Acute (Immediate) • May cause mild irritation.

Chronic (Delayed) • Repeated and prolonged exposure may cause irritation.

Eye

Acute (Immediate) • May cause irritation.

Chronic (Delayed) • Repeated and prolonged exposure may cause irritation.

Ingestion

Acute (Immediate)• Under normal conditions of use, no health effects are expected.

Chronic (Delayed) • No specific information available.

Section 12 - Ecological Information

12.1 Toxicity

No data available

12.2 Persistence and degradability

• No data available

12.3 Bioaccumulative potential

• No data available

12.4 Mobility in Soil

• No data available

12.5 Results of PBT and vPvB assessment

• No data available

12.6 Other adverse effects

Section 13 - Disposal Considerations

13.1 Waste treatment methods

Product waste

 Dispose of content in accordance with local, regional, national, and/or international regulations.

Packaging waste

• Dispose of container in accordance with local, regional, national, and/or international regulations.

13.2 Other Information

• Dispose of wastes in an approved waste disposal facility.

Section 14 - Transport Information

	14.1 UN number	14.2 UN proper shipping name	14.3 Transport hazard class(es)	14.4 Packing group	14.5 Environmental hazards
DOT	NDA	NDA	NDA	NDA	NDA
IMO/IMDG	NDA	NDA	NDA	NDA	NDA
IATA/ICAO	NDA	NDA	NDA	NDA	NDA

14.6 Special precautions for user

f

14.7 Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

None specified.Not relevant.

14.8 Other information

DOT • Not regulated.

IMO/IMDG • Not regulated.

IATA/ICAO • Not regulated.

Section 15 - Regulatory Information

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

SARA Hazard Classifications • Not classified

State Right To Know							
Component	Component CAS MA NJ PA						
Isopropyl alcohol	Isopropyl alcohol 67-63-0 Yes Yes Yes						

Inventory								
Component CAS Australia AICS Canada DSL China EU EINECS Japan ENCS								
Isopropyl alcohol	67-63-0	Yes	Yes	Yes	Yes	Yes		
	Inventory (Con't.)							
Component	Component CAS Korea KECL New Zealand Philippines PICCS TSCA							
Isopropyl alcohol	67-63-0	Yes	Yes	Yes	Υe	es		

Australia

Labor

Australia - High Volume Industrial Chemicals List

•Isopropyl alcohol 67-63-0 8.1%

Australia - List of Designated Hazardous Substances - Classification

•Isopropyl alcohol 67-63-0 8.1% F, Xi R11, R36, R67

Environment

Australia - Priority Existing Chemical Program

•Isopropyl alcohol 67-63-0 8.1% Candidate chemical

Canada

Labor

Canada - WHMIS - Classifications of Substances

•Isopropyl alcohol 67-63-0 8.1% B2, D2B (including 70%)

Canada - WHMIS - Ingredient Disclosure List

•Isopropyl alcohol 67-63-0 8.1% 1 %

Canada Alberta

Environment

Canada - Alberta - Ambient Air Quality Objectives

•Isopropyl alcohol 67-63-0 8.1% 3190 ppbv 1 hour average; 7850 μg/m3 1 hour average

China

Other

China - Dangerous Goods List

•Isopropyl alcohol 67-63-0 8.1% UN1219 PG = II

Europe

Other

EU - CLP (1272/2008) - Annex VI - Table 3.2 - Classification

•Isopropyl alcohol 67-63-0 8.1% F; R11 Xi; R36 R67

EU - CLP (1272/2008) - Annex VI - Table 3.2 - Labelling

•Isopropyl alcohol 67-63-0 8.1% F Xi R:11-36-67 S:(2)-7-16-24/25-26

EU - CLP (1272/2008) - Annex VI - Table 3.2 - Safety Phrases

•Isopropyl alcohol 67-63-0 8.1% S:(2)-7-16-24/25-26

EU - Existing Substance Regulation (793/93/EEC) - Evaluation of Existing HPV Chemicals (REPEALED)

•Isopropyl alcohol 67-63-0 8.1%

Germany

Environment

Germany - Water Classification (VwVwS) - Annex 2 - Water Hazard Classes

•Isopropyl alcohol 67-63-0 8.1% ID Number 135, hazard class 1 - low hazard to waters

Hong Kong

Labor

Hong Kong - Dangerous Substances Regulations - Classification

•Isopropyl alcohol 67-63-0 8.1% Flammable

Hong Kong - Dangerous Substances Regulations - Particular Risks

•Isopropyl alcohol 67-63-0 8.1% R-11

Hong Kong - Dangerous Substances Regulations - Safety Precautions

•Isopropyl alcohol 67-63-0 8.1% S-6/8, S-13

Other

Hong Kong - Dangerous Goods - Category 5 - Substances Giving Off Flammable Vapour

•Isopropyl alcohol 67-63-0 8.1% Class 1, Division 2

India

Environment

India - Hazardous Chemical Rules - List of Hazardous and Toxic Chemicals

•Isopropyl alcohol 67-63-0 8.1%

Japan

Labor

Japan - ISHL Dangerous Substances

•Isopropyl alcohol 67-63-0 8.1% Flammable substance

Japan - ISHL Harmful Substances Requiring Workers to Subject to Medical Exams

•Isopropyl alcohol 67-63-0 8.1% (when produced and handled indoors)

Japan - ISHL Harmful Substances Whose Names Are to be Indicated on the Label

•Isopropyl alcohol 67-63-0 8.1% >1 % weight

Japan - ISHL Notifiable Substances

•Isopropyl alcohol 67-63-0 8.1% >0.1 % weight [Table 9, 494] (listed under Propyl alcohol)

Japan - ISHL Prevention of Organic Solvent Poisoning

•Isopropyl alcohol 67-63-0 8.1% Class 2

Environment

Inventory - Japan - Industrial Safety and Health Law Substances (ISHL)

•Isopropyl alcohol 67-63-0 8.1% 2-(8)-319

Other

Japan - Chemical Substance Control Law (CSCL) - Examined Existing Chemical Substances

•Isopropyl alcohol 67-63-0 8.1% Decomposable

Japan - Fire Service Law - Hazardous Materials

•Isopropyl alcohol 67-63-0 8.1% Group 4 - Flammable liquids II (listed under Alcohols)

Japan - ISHL Working Environment Evaluation Standards - Administrative Control Levels

•Isopropyl alcohol 67-63-0 8.1% 200 ppm ACL

Mexico

Other

Mexico - Hazard Classifications

•Isopropyl alcohol 67-63-0 8.1% Hazard Class = 3 PG = II UN1219

Mexico - Regulated Substances

•Isopropyl alcohol 67-63-0 8.1% UN1219

Singapore

Environment

Singapore - Petroleum and Flammable Materials - Hazard Classes

•Isopropyl alcohol 67-63-0 8.1% Hazard Class = 3

Singapore - Petroleum and Flammable Materials - Regulated Products

•Isopropyl alcohol 67-63-0 8.1% SCDIPA1219L2

United States - Pennsylvania

Labor

U.S. - Pennsylvania - RTK (Right to Know) - Environmental Hazard List

•Isopropyl alcohol 67-63-0 8.1%

15.2 Chemical Safety Assessment

No Chemical Safety Assessment has been carried out for this substance/mixture by the supplier.

15.3 Other Information

• California Proposition 65: This product contains or may contain a substance(s) known to the State of California to cause cancer and/or reproductive toxicity:

Formaldehyde CAS #50-00-0 < 0.0017% 1,4-Dioxane CAS #123-91-1 <0.00012%

Section 16 - Other Information

Relevant Phrases (code & full text)

P280 - Wear protective gloves/protective clothing/eye protection/face protection.

P302+P352 - IF ON SKIN: Wash with plenty of soap and water.

P304+P341 - IF INHALED: If breathing is difficult, remove victim to fresh air and keep at rest in a position comfortable for breathing.

P305+P351+P338 - IF IN EYES: Rinse cautiously with water for several minutes.

Remove contact lenses, if present and easy to do. Continue rinsing.

P501 - Dispose of content and/or container in accordance with local, regional, national, and/or international regulations.

S36/37/39 - Wear suitable protective clothing, gloves and eye/face protection.

Classification method

for mixtures

Calculation method.

Last Revision Date

• 28 April 2006

Preparation Date Other Information • 22 January 2013

Liability

Approved by: Troy Bergstedt, Director of Chemical Research, (218) 628-2217 ext.142.

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