SECTION 1 - IDENTIFICATION

Product identifier/Trade name: INO CHEF 5 DISH DETERGENT – POTS AND PANS, with

grapefruit oil

Other means of identification:

Recommended use and restriction on use: Dish detergent

Restriction on use: For industrial, institutional and food plants use only.

Initial supplier identifier: INO SOLUTIONS®

C.P. 1932

Montréal QC, Canada H1J 3A1 Phone: 1.888.ino.solu (466-7658)

Emergency phone number: (613) 996-6666 (CANUTEC)

SECTION 2 - HAZARDS IDENTIFICATION

2a WHMIS 2015 - GHS (Globally Harmonized System) classification

This product is classified as a skin irritant category 2 and an eye irritant category 2

2b Label elements

Pictogram

Precautionary statement

Wash hands thoroughly after handling. Wear eye protection. Wear rubber gloves.

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.

IF ON SKIN: Wash with plenty water. If skin irritation occurs: get medical advice. Take off contaminated clothing and wash it before reuse.

Signal word:

Warning.

Hazard statement

Causes serious eye irritation. Causes skin irritation.

SECTION 3 - COMPOSITION / INFORMATION ON INGREDIENTS

Ingredients	CAS#	% (weight)	GHS CLASSIFICATION
Sodium linear alkylbenzene	68081-81-2	10-15	Acute toxicity oral and skin
sulfonate			contact, category 4
			Eye irritation, category 2
Amides, Coco, N-	68140-00-1	1-3	Skin irritation, category 2
(hydroxyethyl)			Eye damage, category 1
Alpha-sulfo-omega-	68585-34-2	1-5	Acute toxicity oral, category 4
hydroxypoly(oxy -1,2- ethanidiyl)C10-16 Alkyl Ethers,			Skin irritation, category 2
Sodium Salts			Eye irritation, category 2

SECTION 4 - FIRST AID MEASURES

4a Description of first aid measures

Eye contact:

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.

Skin contact:

Wash with plenty water. If skin irritation occurs: get medical advice.

Inhalation:

No effect expected.

Ingestion:

Rinse mouth. Call a doctor if you feel unwell. Never give anything by mouth if the person is unconscious

4b Most important symptoms and effects

Eye: May cause irritation, redness, tears, burning sensation.

Skin: Possible light skin irritation in presence of the undiluted product.

Inhalation: No effect expected.

Ingestion: May cause slight irritation, headache, abdominal pain, diarrhoea, nausea and vomiting.

4c Immediate medical attention and special treatment needed

No special treatment

SECTION 5 - FIRE FIGHTING MEASURES

5a Extinguishing media

Suitable extinguishing media:

Water (if possible avoid powerful sprays), foam, dry chemicals, carbon dioxide. Product itself is not flammable. Unsuitable extinguishing media:

None known.

Specific hazards for product

Hazardous combustion products:

Oxides of carbon, nitrogen, sulfur and other irritating gases.

Special protective equipment and precautions for firefighters

Special fire-fighting procedures/equipment:

During a fire, irritating smoke and fumes may be generated. A self-contained breathing apparatus is required for fire-fighting personnel to protect themselves from irritating products produced during the combustion. Move

containers from fire area if it can be done without risk. A stream of water directed into the product generates a lot of foam.

SECTION 6 - ACCIDENTAL RELEASE MEASURES

6a Personal precautions, protective equipment and emergency procedures

Personal protection:

Avoid contact with eyes. Floor will be slippery in case of a spill.

6b Methods and materials for containment and cleaning:

Stop the leak. For large spills, pump the product into drums or clean up spills using absorbent material. Resume cleaning by rinsing with water. Caution: floors will be slippery.

6c Environmental precautions:

Product is biodegradable. Do not let large quantities go to the sewers.

SECTION 7 - HANDLING AND STORAGE

7a Precautions for safe handling:

Avoid contact with eyes. When used as directed, no special precautions.

7b Condition for safe storage:

Store in a sealed container in a well-ventilated place. Do not store with food products. Keep from freezing.

7c Special packaging materials: none.

No incompatibility with most materials found in most workplaces.

SECTION 8 - EXPOSURE CONTROLS AND PERSONAL PROTECTION

8a Control parameters

Ontario Time-weighted Average Limit (TWA)	Ontario Short-Term Exposure Limit (STEL)	Notations
None established	None established	

8b Engineering controls:

Not required under normal applications.

8c Individual protection measures

Respiratory Protection:

Not required under normal applications.

Skin protection and other protective equipment:

Waterproof boots for large spills. Rubber gloves.

Eye / face protection:

Not required under normal applications. In case of possible eye contact, safety glasses are advised.

General hygiene considerations:

KEEP OUT OF REACH OF CHILDREN. Avoid contact with eyes. Never eat, drink, or smoke in work areas. Good hygiene is recommended after use of this product.

SECTION 9 - PHYSICAL AND CHEMICAL PROPERTIES

Appearance and odour:

Colourless liquid, pink grapefruit odour.

Odour threshold: N/Av pH: 6.5-7.5

Melting point and freezing point:Approximately 0 °C **Boiling point:**Approximately 100 °C

Flash point: None to boil

Evaporation rate (n-BuAc =1): Approximately 0.4 (water)

Lower flammable limit (% by volume): N/Av
Upper flammable limit (% by volume): N/Av.
Explosion data - Sensitivity to mechanical impact: Not sensitive
Explosion data - Sensitivity to static discharge: Not sensitive

Vapour pressure (mm Hg)

Vapour density:

Approximately 20 (water)

Approximately 0.6 (water)

Approximately 0.6 (water)

1.03 g/cm³@ 20 °C

Specific gravity or density (water = 1 at 4 °C): 1.03 g/cm³ (Miscible

Partition coefficient – n-octanol/water:

Auto-ignition temperature:

Not available
Not available
Not available

Viscosity: 700-950 cps @ 25 °C

SECTION 10 - STABILITY AND REACTIVITY

10a Reactivity:

Not applicable when used as directed.

10b Chemical stability:

Stable at room temperature, in normal handling and storage conditions.

10c Possibility of hazardous reactions:

May react with strong oxidizers.

10d Conditions to avoid:

Avoid contact with strong oxidizers.

10e Incompatible materials

Strong oxidizers

10f Hazardous decomposition products:

With strong oxidizers: heat, water vapour. Oxides of carbon, nitrogen and other irritating gases.

SECTION 11 - TOXICOLOGICAL INFORMATION

Primary entry route(s): Eye and ingestion.

Eye: May cause irritation, redness, tears, burning sensation.

Skin: Continuous and prolonged contact with the undiluted product may lead to skin irritation.

Inhalation: No effect expected.

Ingestion: May cause slight irritation, headache, abdominal pain, diarrhoea, nausea and vomiting.

Carcinogenicity: No ingredient listed by IARC as a possible

carcinogen.

Mutagenic tests have been negative for ingredients

Ingredients not sensitizing as per OECD 406

Teratogenicity, mutagenicity, other reproductive effects:

Skin sensitization:

Respiratory tract sensitization:

Not available Not available Not available

Synergistic materials:
Other important hazards:

Toxicological data: The calculated LD_{50} for this product is greater than 7,000 mg/Kg, oral, rat; our products are not tested on animals.

Ingredient	LD ₅₀ (route, species)	LC ₅₀ # hours (species)	
Amides, Coco, N-(hydroxyethyl)	7,400 mg/kg (oral, rat)	N/Av	
	>2,000 mg/kg (dermal, rabbit)		
Alpha-sulfo-omega-hydroxypoly(oxy -1,2- ethanidiyl)C10-16 Alkyl Ethers, Sodium Salts	1,600 mg/kg (dermal, rabbit) >2,000 mg/kg (oral, rat)	N/Av	
Sodium linear alkylbenzene sulfonate	1,080 mg/kg (dermal, rabbit) >2,000 mg/kg (oral, rat)	N/Av	

For more details, refer to Section 3.

SECTION 12 - ECOLOGICAL INFORMATION

12a Ecotoxicity:

TOXICITY (Fish)	Results	Exposure time	Method
Amides, Coco, N- (hydroxyethyl)	114-196 mg/kg	96Н	Not available
Alpha-sulfo-omega- hydroxypoly(oxy -1,2- ethanidiyl)C10-16 Alkyl	28 mg/kg	96Н	Not available
Ethers, Sodium Salts Sodium linear alkylbenzene sulfonate	3.0	96Н	Not available

TOXICITY (Daphnia)	Results	Exposure time	Method
Amides, Coco, N- (hydroxyethyl)	24.8 mg/L	48H	Not available
Alpha-sulfo-omega- hydroxypoly(oxy -1,2- ethanidiyl)C10-16 Alkyl	3.12 mg/L	48Н	Not available
Ethers, Sodium Salts Sodium linear alkylbenzene sulfonate	1.62 mg/L	48H	Not available

TOXICITY (Algea)	Results	Exposure time	Method
Amides, Coco, N- (hydroxyethyl)	Scenedesmus subspicatus 16,6 mg/L	96H	Not available
Alpha-sulfo-omega- hydroxypoly(oxy -1,2- ethanidiyl)C10-16 Alkyl	Selenastrum capricornutum), 30 mg/L	21 days	Not available
Ethers, Sodium Salts Sodium linear alkylbenzene sulfonate	Selenastrum capricornutum), 29,0 mg/L	48H	Not available

12b Persistence and degradability: Product is expected to be readily biodegradable as per OECD 301.

12c Bioaccumulation potential: Not available

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12d Mobility in soil: There is no test data on this product.

12e Other adverse effectNo applicable information found

SECTION 13 - DISPOSAL CONSIDERATIONS

Eliminate according to federal, provincial and local regulations.

SECTION 14 - TRANSPORTATION INFORMATION

Transportation of Dangerous Goods (TDG) in Canada:

Not regulated

UN number Not applicable
Proper shipping name: Not applicable
Class: Not applicable
Identification number: Not applicable
Packing group: Not applicable
Special case: Not applicable

SECTION 15 - REGULATORY INFORMATION

In Canada

WHMIS information:

This product has been classified in accordance with the hazard criteria of the Hazardous Products Regulations (HPR) and this safety data sheet (SDS) contains all the information required by the HPR.

WHMIS Classification: See section 2a

CEPA information: Ingredients are listed on the DSL inventory.

SECTION 16 - OTHER INFORMATION

Date of latest revision 2017-05-03

References:

- 1. Manufacturer'/suppliers' MSDS.
- 2. Occupational Exposure Limits for Ontario Workplaces required under Regulation 833
- 3. International Agency for Research on Cancer Monographs.
- 4. The European Chemicals Agency (ECHA) website.

Abbreviations:

ACGIH American Conference of Governmental Industrial Hygienists

CAS Chemical Abstract Service

CEPA Canadian Environmental Protection Act

cps Centipoises

DSL Domestic Substance List

HMIS Hazardous Material Information System
IARC International Agency for Research on Cancer

LC Lethal concentration
LD Lethal Dosage
N/Av Not available
N/Ap Not Applicable

NFPA National Fire Protection Association

NIOSH National Institute for Occupational Safety and Health

NTP National Toxicology Program (U.S.A.)

OSHA Occupational Safety and Health Administration (U.S.A.)

PEL Permissible Exposure Limit
TLV Threshold Limit Value

WHMIS Workplace Hazardous Materials Information System

End of the MSDS