

Safety Data Sheet

1. Identification

Product Identifier : INO Chef 60
Recommended Uses : Limescale, Calcium, and Rust Remover
Supplier : Dissan Group
9280 Boulevard du Golf
Anjou, Quebec
H1J 3A1
Emergency Telephone : 1-888-466-7658

2. Hazard Identification

Product Classifications : Skin Corrosion/Irritation Category 1
Serious Eye Damage/Eye Irritation Category 1

Symbols :



Signal Word : Danger
Hazard Statements : Causes severe skin burns and eye damage.
Precautionary Statements : Wear protective gloves and eye protection/face protection.
Do not breathe mists.
Wash thoroughly after handling.
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water or shower. Wash contaminated clothing before reuse.
IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.
IF INHALED: Remove person to fresh air and keep comfortable for breathing.
Immediately call a POISON CONTROL CENTRE or doctor.
Store locked up.
Dispose of contents/container according to local, provincial and federal regulations.

3. Composition/Information on Ingredients

Hazardous Ingredients :

Chemical Name	CAS Number	Concentration (% w/w)
Phosphoric acid	7664-38-2	10 – 30
Sulphuric acid	7664-93-9	5 – 10

4. First Aid Measures

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CONTROL CENTRE or doctor.

IF ON SKIN (or hair): Wash with plenty of water. Take off contaminated clothing and wash it before reuse. Immediately call a POISON CONTROL CENTRE or doctor.

IF SWALLOWED: Rinse mouth. Do NOT induce vomiting. Immediately call a POISON CONTROL CENTRE or doctor.

IF INHALED: Remove person to fresh air and keep comfortable for breathing. Immediately call a POISON CONTROL CENTRE or doctor.

Symptoms of Acute Exposure :

Eye contact :	Burns, redness, watering, pain, loss of vision.
Skin contact :	Severe burns, redness, itching, swelling, damage to underlying tissues.
Ingestion :	Burns, irritation and swelling to mouth, throat and stomach.
Inhalation :	Burns to nose, throat and respiratory tract. Coughing, difficulty breathing and/or shortness of breath.

5. Fire Fighting Measures

Suitable Extinguishing Media : As for surrounding fire. Suitable materials include water spray, dry chemical, carbon dioxide, and alcohol-resistant foam.

Unsuitable Extinguishing Media : Not available.

Specific Hazards and Combustion Products : Non-combustible. Contact with soft metals forms flammable hydrogen gas. During fire, gases hazardous to health may be formed. Combustion products include oxides of carbon, oxides of sulphur, oxides of phosphorus.

Protective Equipment and Precautions for Firefighters : As in any fire, wear a self-contained breathing apparatus in pressure-demand, MSHA/NIOSH (approved or equivalent), and full protective gear. Move containers from fire area if possible without risk. Keep containers cool with water spray. Collect contaminated fire extinguishing water and other media separately.

6. Accidental Release Measures

- Personal Precautions :** Immediately evacuate personnel to safe areas. Wear appropriate personal protective equipment (See Section 8: Exposure controls / Personal protection). Do not touch damaged containers or spilled material unless wearing appropriate protective equipment. Only trained and properly protected personnel must be involved in clean-up operations. Material may create slippery conditions.
- Containment and Clean Up :** Stop leak if it is safe to do so. Dike spilled material, where possible. Absorb with suitable inert dry material such as absorbent clay and place into closed containers for disposal. Avoid dispersal of spilled material or contact with soil or entry into waterways, sewers and drains. Dispose of contents/containers according to local, provincial, and federal regulations. Following product recovery, flush area with water.

7. Handling and Storage

- Handling :** Avoid contact with skin, eyes, and clothing. Use personal protective equipment as required (See Section 8: Exposure controls / Personal protection). Wash thoroughly after handling.
- Storage :** Keep away from incompatible materials (See Section 10: Stability and Reactivity). Keep away from metals, strong bases, hypochlorites and chlorine-releasing compounds. Store in a cool, dry, well-ventilated place. Keep container tightly closed when not in use. Store locked up.

8. Exposure Controls/Personal Protection

Control Parameters :

Chemical Name	CAS Number	Value type	Permissible Concentration	Basis
Phosphoric acid	7664-38-2	TLV-TWA	1 ppm	ACGIH
		TLV-STEL	3 ppm	ACGIH
Sulphuric acid	7664-93-9	TLV-TWA	0.2 mg/m ³	ACGIH

- Engineering Controls :** Ensure adequate ventilation.
- Personal Protection :**
- Eye/Face :** Safety glasses or chemical splash goggles, and face shield.
 - Skin :** Chemical-resistant protective gloves.
 - Respiratory :** If exposure limits are exceeded or irritation is experienced, NIOSH/MSHA approved respiratory protection should be worn.
 - Other :** Long pants and long sleeved shirt. Rubber boots and rubber apron as necessary.

9. Physical and Chemical Properties

Appearance :	Clear, colourless liquid
Odour :	None
Odour Threshold :	Not available
pH :	0 – 1
Freezing Point :	Not available
Boiling Point :	Not available
Flash Point :	Not available
Evaporation Rate :	Not available
Flammability :	Not available
Lower Flammability Limit :	Not available
Upper Flammability Limit :	Not available
Vapour Pressure :	Not available
Vapour Density :	Not available
Relative Density :	1.18
Solubility :	Complete in water
Partition Coefficient :	Not available
Auto-ignition Temperature :	Not available
Decomposition Temperature :	Not available
Viscosity :	Not available

10. Stability and Reactivity

Reactivity :	With incompatible materials. Contact with soft metals forms flammable hydrogen gas. Contact with hypochlorites and chlorine-releasing compounds forms toxic chlorine gas.
Chemical stability :	Chemically stable.
Hazardous reactions :	With incompatible materials. Polymerization not expected to occur.
Conditions to avoid :	Avoid incompatible materials.
Incompatible materials :	Strong bases, soft metals, hypochlorites and chlorine-releasing compounds.
Hazardous decomposition products :	Not applicable.

11. Toxicological Information

Routes of Exposure

Eye contact :	Causes serious eye damage.
Skin contact :	Causes severe skin burns.
Ingestion :	Causes burns to mouth, throat and stomach.
Inhalation :	May cause irritation to nose, throat and respiratory tract.

Symptoms of Acute Exposure

Eye contact : Burns, redness, watering, pain, loss of vision.
Skin contact : Severe burns, redness, itching, swelling, damage to underlying tissues.
Ingestion : Burns, irritation, swelling.
Inhalation : Irritation of nose, throat and respiratory tract. Coughing, difficulty breathing and/or shortness of breath.

Chronic Effects : IARC has classified exposure to strong inorganic acid mists containing sulphuric acid as being carcinogenic to humans. The route of entry is inhalation of these mists resulting in respiratory cancers.

Calculated Acute Toxicity Estimates

Oral : 6,000 – 7,000 mg/kg
Dermal : >10,000 mg/kg
Inhalation : Not available.

12. Ecological Information

Not available.

13. Disposal Considerations

Dispose of contents/container according to local, provincial and federal regulations.

14. Transportation Information

For transportation in a road vehicle or a railway vehicle :

TDG Classification :	UN Number:	3264
	Shipping Name :	CORROSIVE LIQUID, ACIDIC, INORGANIC, N.O.S. (Sulphuric Acid)
	Class :	8
	Subclass :	
	Packing Group :	II
	Limited Quantity :	1L or less

15. Regulatory Information

Not available.

16. Other Information

SDS Revision Date : December 13, 2017