



# 6N HCl in IPA Solution

## Safety Data Sheet

According to Regulation (EC) 1272/2008

### SECTION 1 - Chemical Product and Company Identification

#### 1.1 Product Identifiers

Product Name : 6N HCl in IPA Solution  
 CAS # : Mixture  
 EC# : Mixture  
 RTECS# : Mixture

#### 1.2 Recommended Use of the Chemical and Restrictions of Use

Chemical manufacturing

#### 1.3 Supplier Details

**Supplier** : BioSpectra, Inc.  
 100 Majestic Way  
 Bangor, PA 18013  
 T: 610.599.3400  
 ehs@biospectra.us

#### 1.4 Emergency Numbers

Emergency Numbers : US & Canada: 1-800-424-9300  
 : Outside the US & Canada: +1 703-527-3887

### SECTION 2 – Hazard Identification

#### 2.1 Classification of Substance or Mixture

Flammable Liquid (Category 2)  
 Eye Irritation (Category 1)  
 Skin corrosion/ irritation (Category 1)  
 Specific Target Organ Toxicity-single exposure (Category 3), Central Nervous System

#### 2.2 GHS Label Elements Including Precautionary Statements

**Pictograms** : 

**Signal Word** : Danger

**Hazard Statements** : H225 - Highly flammable liquid and vapor  
 : H290 - May be corrosive to metals.  
 : H314 - Causes severe skin burns and eye damage  
 : H318 - Causes serious eye damage  
 : H336 - May cause drowsiness or dizziness.

**Precautionary statement(s)** : P210 - Keep away from heat/ sparks/open flames/hot surfaces. No smoking  
 : P233 - Keep container tightly closed.  
 : P234 - Keep only in original container.  
 : P240 - Ground/bond container and receiving equipment.  
 : P241 - Use explosion-proof electrical/ ventilating/ lighting/equipment.  
 : P242 - Use only non-sparking tools.

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- : P243 - Take precautionary measures against static discharge.
- : P261- Avoid breathing dust/ fume/ gas/ mist/ vapors/ spray.
- : P264 - Wash hands thoroughly after handling.
- : P271 - Use only outdoors or in a well-ventilated area.
- : P280 - Wear protective gloves/ protective clothing/ eye protection/ face protection
- : P303 + P361 + P353 - IF ON SKIN (or hair): Remove/ Take off immediately all contaminated clothing. Rinse skin with water/shower.
- : P304 + P340 - IF INHALED: Remove person to fresh air and keep 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.
- : P337 + P317 - If eye irritation persists: Get medical help.
- : P370 + P378 - In case of fire: Use dry sand, dry chemical, or alcohol-resistant foam to extinguish.
- : P390 - Absorb spillage to prevent material damage.
- : P403 + P235 - Store in a well-ventilated place. Keep cool.
- : P405 - Store locked up.
- : P501 - Dispose of contents/ container to an approved waste disposal plant.

**2.3 Hazards not Classified or not Covered by the GHS**

No information available

**SECTION 3 – Composition, Information on Ingredients**

Component	CAS Number	Concentration
2-Propanol	67-63-0	70-80%
Hydrogen Chloride	7647-01-0	20-23%

**SECTION 4 - First Aid Measures**

**4.1 Description of Necessary First Aid Measures**

- Eyes : Flush eyes with plenty of tepid water for at least 15 minutes, occasionally lifting the upper and lower lids. Consult a physician immediately.
- Skin : Get medical aid. Flush skin with plenty of tepid water for at least 15 minutes while removing contaminated clothing and shoes. Consult a physician if unwell. DO NOT induce vomiting unless instructed to do so by a medical professional.
- Ingestion : Never give anything by mouth to an unconscious person. Consult a physician immediately.
- Inhalation : Consult a physician immediately. Remove from exposure to fresh air immediately. If not breathing, give artificial respiration. If breathing is difficult, give oxygen.
- Notes to Physician : Treat symptomatically and supportively.

**4.2 Most Important Symptoms/Effects, Acute and Delayed**

Refer to Section 2.2 for Precautionary Statements if any are applicable.

**4.3 Indication of Immediate Medical Attention and Special Treatment**

No information available.

**SECTION 5 - Firefighting Measures**

**5.1 Extinguishing Media**

Water spray, alcohol-resistant foam, dry chemical, or carbon dioxide.

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## 5.2 Specific Hazards Associated with this Chemical

Carbon oxides, Hydrogen chloride gas

## 5.3 Special Equipment/Precautions for Firefighters

In the event of a fire, wear full protective clothing and NIOSH-approved self-contained breathing apparatus with full face piece operated in the pressure demand or other positive pressure mode.

## 5.4 Other Information

No information available.

## SECTION 6 - Accidental Release Measures

### 6.1 Personal Precautions, Protective Equipment and Emergency Procedures

Use personal protective equipment. Avoid breathing vapors, mist, or gas. Ensure adequate ventilation. Remove all sources of ignition. Evacuate personnel to safe areas. Beware of vapors accumulating to form explosive concentrations. Vapors can accumulate in low areas.

### 6.2 Environmental Precautions

Do not allow to enter drains.

### 6.3 Methods and Materials for Containment and Cleaning Up

Contain spillage. Collect with an electrically protected vacuum cleaner or by wet-brushing. Place in container for disposal according to local regulations.

### 6.4 Other Information

No information available.

## SECTION 7 - Handling and Storage

### 7.1 Precautions for Safe Handling

Avoid contact with skin and eyes. Avoid inhalation of vapor or mist. Use explosion-proof equipment. Keep away from sources of ignition - No smoking. Take measures to prevent build-up of electrostatic charge.

### 7.2 Conditions for Storage Including any Incompatibilities

Must be stored below 13°C (55°F) in a dry, well-ventilated area away from incompatible and combustible substances. Keep containers tightly closed.

### 7.3 Other Information

No information available.

## SECTION 8 - Exposure Controls, Personal Protection

### 8.1 Control Parameters

Component	Value	Control Parameter	Basis	Remark
2-Propanol	TWA	200 ppm	USA ACGIH Threshold Limit Values (TLV)	Central Nervous System Impairment Upper Respiratory Tract Irritation Eye Irritation Substances for which there is a Biological Exposure Index or Indices (see BEI® section) Not classifiable as a human carcinogen
2-Propanol	PEL	400 ppm 980 mg/m <sup>3</sup>	USA. Occupational Exposure Limits (OSHA) – Table Z-1 Limits for Air Contaminants	None
2-Propanol	TWA	400 ppm 980 mg/m <sup>3</sup>	USA NIOSH Recommended Exposure Limits	None
2-Propanol	STEL	500 ppm 1,225 mg/m <sup>3</sup>	USA. NIOSH Recommended Exposure Limits	None
Hydrogen Chloride	PEL	5 ppm	USA. Occupational Exposure Limits (OSHA) – Table Z-1 Limits for Air Contaminants	None

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## 8.2 Engineering Controls

Use adequate ventilation to keep airborne concentrations low.

## 8.3 Personal Protective Equipment

### Eyes

Wear appropriate protective eyeglasses or chemical safety goggles as described by OSHA's eye and face protection regulations in 29 CFR 1910.133 or European Standard EN166. Face protection shield.

### Skin

Wear appropriate protective gloves to prevent skin exposure. Wear impervious gloves: Nitrile rubber with layer thickness 0.11mm.

### Clothing

Wear appropriate protective clothing to prevent skin exposure.

### Respirators

Follow the OSHA respirator regulations found in 29CFR 1910.134 or European Standard EN149 approved respirator if exposure limits are exceeded or if irritation or other symptoms are experienced.

## SECTION 9 - Physical and Chemical Properties

Physical State	: Liquid
Appearance	: Clear
Odor	: Not information available
pH	: <2
Vapor Pressure	: Not information available
Vapor Density	: Not information available
Flammability (LEL/UEL)	: 2 vol % / 12 vol %
Flash Point	: 11 ° C (52 ° F)
Boiling Point	: Not information available
Decomposition Temperature	: Not information available
Specific Gravity/Density	: 0.909
Solubility	: miscible

## SECTION 10 - Stability and Reactivity

### 10.1 Chemical Stability

Hygroscopic.

### 10.2 Conditions to Avoid

Incompatible products. Excess heat and direct sunlight. Keep away from open flames, hot surfaces, and sources of ignition. Exposure to moist air or water.

### 10.3 Incompatibilities with Other Materials

Strong oxidizing agents, bases, amines, metals.

### 10.4 Hazardous Decomposition Products

Carbon oxides, HCl gas.

### 10.5 Hazardous Polymerization

Will not occur.

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**SECTION 11 - Toxicological Information****11.1 Toxicological Effects**

Acute Toxicity:	
LD50 Oral: rat	: No information available.
Carcinogenicity:	: Not listed by ACGIH, IARC, NIOSH, NTP, or OSHA.
Epidemiology	: No information available.
Teratogenicity	: No information available.
Reproductive Effects	: No information available.
Neurotoxicity	: No information available.
Mutagenicity	: No information available.
Other Studies	: Causes severe burns by all exposure routes.

**11.2 Additional Information**

To the best of our knowledge the associated physical, chemical, and toxicological properties of this chemical have not undergone thorough investigation, all known information is contained in this SDS.

**SECTION 12 - Ecological Information****12.1 Ecotoxicity**

Large amounts will affect pH and harm aquatic organisms. Do not empty into drains.

**12.2 Persistence and Degradability**

Persistence is unlikely based on information available. Miscible with water.

**12.3 Bioaccumulative Potential**

No information available.

**12.4 Mobility in Soil**

Will likely be mobile in the environment due to its volatility. Will likely be mobile in the environment due to its water solubility.

**12.5 Results of PBT and vPvB assessment**

PBT/vPvB assessment not available as chemical safety assessment not conducted.

**12.6 Other Adverse Effects**

No information available.

**SECTION 13 - Disposal Considerations**

Dispose of in a manner consistent with Federal, State, and Local Regulations.

**SECTION 14 - Transport Information**

	US DOT	IATA	IMO	Canada TDG
Shipping Name:	Flammable Liquid, Corrosive, n.o.s (Isopropyl Alcohol, Hydrogen Chloride)	Flammable Liquid, Corrosive, n.o.s (Isopropyl Alcohol, Hydrogen Chloride)	Flammable Liquid, Corrosive, n.o.s (Isopropyl Alcohol, Hydrogen Chloride)	Flammable Liquid, Corrosive, n.o.s (Isopropyl Alcohol, Hydrogen Chloride)
Hazard Class:	3 (8)	3 (8)	3 (8)	3 (8)
UN Number:	UN2924	UN2924	UN2924	UN2924
Packing Group:	II	II (Limit of 5L on cargo aircraft)	II	II

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**SECTION 15 - Regulatory Information**

**15.1 EHS Chemical Specific Regulations**

**SARA:**

Section 302 (TPQ) : None of the chemicals in this product have a TPQ.  
 Section 313 : 2-Propanol (acid manufactured)  
 SARA 311/312 Hazards : Hydrogen Chloride CWA (5000 lbs. RQ)

**SPECIFIC STATE:**

Massachusetts Right To Know Components : 6N Hydrochloric Acid in 2-Propanol  
 Pennsylvania Right To Know Components : 6N Hydrochloric Acid in 2-Propanol  
 New Jersey Right To Know Components : 6N Hydrochloric Acid in 2-Propanol  
 California Prop. 65 Components : This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

**SECTION 16 - Additional Information**

**16.1 Hazard Ratings**

HMIS Rating	
Health hazard	3
Flammability	3
Physical Hazard	1

NFPA Rating	
Health hazard	3
Fire Hazard	3
Reactivity Hazard	1

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