

1 - PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME:.....BIOCLEAN HP20 RTU

CHEMICAL NAME/

CLASS/SYNONYMS:.....None

PRODUCT NUMBER:.....BIOCLEAN HP20 RTU

UN/NA NUMBER:....2014 CHEMICAL FAMILY:Oxidizer

CAS NUMBER:.....Not applicable for mixtures.

FORMULA: Mixture

COMPANY:JMN Specialties, Inc.

1100 Victory Drive - Westwego, Louisiana USA 70094

Phone (504) 341-3749, Fax (504) 341-5868

www.jmnspecialties.com

EMERGENCY PHONE:CALL CHEMTEL: Toll Free US & Canada: (800) 255-3924, Outside

USA +01-813-248-0585.

DATE PREPARED: May 4, 2022

2 - HAZARDS IDENTIFICATION

GHS HAZARD CLASSIFICATION:

Physical Hazards

Flammable Liquids:.....No Hazard Statement established for this Product

Corrosive Liquids:This mixture may react with many organic and inorganic

chemicals.

Health Hazards

Acute Toxicity:......Category 4 - Harmful if swallowed, in contact with skin, inhaled

Skin Corrosion/Irritation:.... Catagory 2 - Causes skin irritation

Eye Damage/Irritation: Catagory 1 - Causes severe eye damage

Aspiration Hazard:.....Catagory 2 - May be harmful if swallowed and enters airways.

Unknown Relevance to Humans

See Section 11 for additional Toxicological information

EMERGENCY OVERVIEW:

Pictograms:







Signal Word (GHS-US):DANGER!



Hazard Statements:

Physical Hazards (GHS-US):

H271: May cause fire or explosion; strong oxidizer

Health Hazards (GHS-US):

H318 - Causes serious eye damage. H302 - Harmful if swallowed. H272 - May intensify fire; oxidizer

Environmental Hazards (GHS-US):

H402: Harmful to aquatic life

Precautionary Statements (GHS-US):

P101+102+103: If medical advice is needed, have product container or label at hand. Keep out of the reach of children. Read label before use.

P264 - Wash face, hands and any exposed skin thoroughly after handling. P280 - Wear protective gloves/ protective clothing/ eye protection/ face protection. P210 - Keep away from heat/sparks/open flames/hot surfaces. - No smoking. P220 - Keep/Store away from clothing/flammable materials/combustibles. P221 - Take any precaution to avoid mixing with combustibles/flammables.

P403+P233+P235: Store in well-ventilated place. Keep container tightly closed. Keep cool.

Response Statements (GHS-US):

P305 + P351 + P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. P310 - Immediately call a POISON CENTER or doctor. P301 + P312 - IF SWALLOWED: Call a POISON CENTER or doctor if you feel unwell. P330 - Rinse mouth. P370 + P378 - In case of fire: Use water for extinction.

P501: Dispose of contents/container: Treatment, storage, transportation and disposal must be in accordance with Federal, State/Provincial and Local Regulations, and product characteristics at time of disposal.

TOTAL VOC's:..... < 0.5%

3 – COMPOSITION / INFORMATION ON INGREDIENTS

HAZARDOUS INGREDIENT	PERCENT*	CAS NUMBER	
Hydrogen Peroxide	4 - 5	7722-84-1	
Deionized Water	94 - 96	7732-18-5	

^{*}Any concentration shown as a range is to protect confidentiality or is due to batch variation.



4 - FIRST-AID MEASURES

BREATHING (INHALATION):..... Remove from exposure area to fresh air immediately. If breathing has stopped, perform artificial resuscitation. Keep person warm and at rest. Treat symptomatically and supportively. Seek medical attention immediately. Qualified medical personnel should consider administering oxygen. **SWALLOWING (INGESTION)**:..... Give large amounts of fresh water or milk immediately. Do not give anything by mouth if person is unconscious or otherwise unable to swallow. If vomiting occurs, keep head below hips to prevent aspiration. Treat symptomatically and supportively. Seek medical attention immediately. EYES:Flush eye with copious quantities of water. If persistent irritation occurs, obtain medical attention. SKIN (DERMAL):Remove contaminated clothing and wash affected skin with soap and water. If persistent irritation occurs, obtain medical attention. When using high pressure equipment, injection of product under the skin can occur. If high pressure injuries occur, the casualty should be sent immediately to a hospital. Do not wait for symptoms to develop. NOTE TO PHYSICIAN:Pulmonary edema may be delayed for 24 to 72 hours; keep under observation. Gastric lavage may be necessary if swallowed. Analysis of body fluids (particularly gastric aspirates)

5 - FIRE-FIGHTING MEASURES

reveal peroxides.

GENERAL FIRE HAZARDS:Product components will burn producing oxygen. Fire fighters

to wear self-contained breathing apparatus and suitable protective clothing if risk of exposure to vapor or products of combustion. Heating can cause expansion or decomposition of the material, which can lead to the containers exploding. If safe to do so, remove containers from the path of fire. Keep

using the titanium chloride reaction, if done immediately, will

containers cool with water spray.

AUTOIGNITION TEMP:..... None - Water based material

EXTINGUISHING MEDIA:..... Determined by surrounding material. In case of fire, use water

fog, dry chemical, CO_2 , or "alcohol" foam. Firefighting should be attempted only by those who are adequately trained and

equipped with proper protective equipment.

SPECIAL FIRE FIGHTING UNUSUAL FIRE AND

EXPLOSION HAZARDS:.....Containers may explode from internal pressure if confined to

fire. Cool with water spray.



6 – ACCIDENTAL RELEASE MEASURES

SPILL PROCEDURES:Causes fires with organic material. Ventilate area of leak or spill. Wear appropriate personal protective equipment. Contain and recover liquid when possible. Do not return spilled material to original container. Larger Spills: Dilute with a large amount of water and hold in a pond or dyked area until the peroxide decomposes followed by discharge into a suitable treatment system. May be neutralized with sodium metabisulfite or sodium sulfite after diluting to 5-10% peroxide. Do not flush undiluted material to sewer. This oxidizing material can increase the flammability of adjacent combustible materials. Empty containers should be rinsed with water before discarding.

WASTE DISPOSAL:.....Treatment, storage, transportation and disposal must be in accordance with Federal, State/Provincial and Local Regulations. Regulations may vary in different locations. Characterization and compliance with applicable laws are the responsibility solely of the generator. Whatever cannot be saved for recovery or recycling should be managed in an appropriate and approved waste disposal facility. Processing, use or contamination of this product may change the waste management options. State and local disposal regulations may differ from federal disposal regulations. Dispose of container and unused contents in accordance with federal, state and local requirements.

RCRA STATUS:..... If discarded in its purchased form, it is not a RCRA hazardous waste. It is the responsibility of the product user to determine at the time of disposal, whether a material containing the product should be classified as a hazardous waste. (40CFR261.20-24).

7 – HANDLING and STORAGE

STORAGE:..... Keep in a tightly closed container, stored in a cool, dry, ventilated area below 44°C (110°F). Protect against physical damage. Isolate from incompatible substances. Containers of this material may be hazardous when empty since they retain product residues (vapors, liquid); observe all warnings and precautions listed for the product. Drum must not be washed out or used for other purposes.



HANDLING:......Avoid contact with eyes, skin and clothing. Do not inhale vapors

and fumes. Wash thoroughly after handling. Use only with adequate ventilation. Do not take internally. For industrial use only.

8 – EXPOSURE CONTROLS / PERSONAL PROTECTION

OCCUPATIONAL EXPOSURE LIMITS

HAZARDOUS INGREDIENT

Hydrogen Peroxide **Deionized Water**

PEL 1 ppm

None Established

TLV-TWA

1 ppm None Established







EXPOSURE CONTROLS:..... Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level. Please refer to the ACGIH document, Industrial Ventilation, A Manual of Recommended Practices, most recent edition, for details.

RESPIRATORY PROTECTION:.....If engineering controls do not maintain airborne concentrations below recommended exposure limits (where applicable) or to an acceptable level (in countries where exposure limits have not been established), an approved respirator must be worn. In the United States of America, if respirators are used, a program should be instituted to assure compliance with OSHA Standard 63 FR 1152, January 8, 1998. Respirator type: Air-purifying respirator with an appropriate, government approved (where applicable), air-purifying filter, cartridge or canister. Contact health and safety professional or manufacturer for specific information.

PROTECTIVE CLOTHING:..... Eye/face protection: Wear chemical goggles; face shield (if splashing is possible). Skin protection: Chemical resistant, impermeable gloves. Gloves should be tested to determine suitability for prolonged contact. Use of impervious apron or chemical suit and chemical resistant boots are recommended.



ADDITONAL MEASURES:..... Handle in accordance with good industrial hygiene and safety practice. Wash thoroughly with soap and water after handling and before eating, drinking, or using tobacco. Safety shower and eye wash should be available close to work areas.

9 - PHYSICAL / CHEMICAL PROPERITES

BOILING POINT:..... 220°F (104.4°C) FREEZING POINT:.....< 0°F (< -17°C) FLASHPOINT:No Data Available

UPPER FLAME LIMIT (%):.....NA LOWER FLAME LIMIT (%):.....NA

VAPOR PRESSURE:17 mmHg @ 68°F (20°C)

VAPOR DENSITY (AIR=1):.....> 1

SPECIFIC GRAVITY:1.05 - 1.06

pH:.....3.3 **SOLUBILITY IN WATER:....**Complete

VOLATILITY

INCLUDING WATER:8.84 pounds per gallon MOLECULAR WEIGHT:......No data available (G/MOLE)

EVAPORATION RATE:< 1 PHYSICAL STATE:.....Liquid COLOR:.....Clear

ODOR:Slight acrid odor

10 - STABILITY and REACTIVITY

STABILITY:Stable

HAZARDOUS DECOMP.:Will not occur

INCOMPATIBILITY:Strong oxidizing agents, strong reducing agents, acetic acid,

acetic anhydride, alcohols, brass, copper, copper alloys, finely powdered metals, galvanized iron, hydrazine, iron, magnesium, nitric acid, sodium carbonate, potassium permanganate, cyanides (e.g. potassium cyanide, sodium cyanide), ethers (e.g. dioxane, furfuran, tetrahydrofuran (THF)), urea, chlorosulfonic acid, alkalies, lead, nitrogen compounds, triethylamine, silver, nickel, palladium, organic matter, charcoal, sodium borate, aniline, platinum, formic acid, cyclopentadiene, activated carbon, tert-butyl alcohol, hydrogen selenide, manganese dioxide, mercurous chloride, rust, ketones, carboxylic acids, glycerine, sodium fluoride, sodium pyrophosphate, soluble fuels (acetone, ethanol, glycerol), wood, wood, asbestos, hexavalent chromium compounds, salts of iron, copper, chromium, vanadium, tungsten, molybdeum, and platinum.



HAZARDOUS REACTIONS:..... Not expected to be Explosive, Self-Reactive, Self-Heating, or an Organic Peroxide under US GHS Definition(s).

11 - TOXICOLOGICAL INFORMATION

THRESHOLD LIMIT VALUE:	1 ppm
OSHA PEL:	
	This product IS NOT 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 editions) or
	found to be a potential carcinogen by OSHA.
MEDICAL CONDITION	
AGGRAVATED:	Existing dermatitis.
INFORMATION ON ACUTE TOY	VICOLOGICAL FEFFCTS
INFORMATION ON ACUTE TOX	CICOLOGICAL EFFECTS
ORAL	
Product:	If ingested, sudden evolution of oxygen may cause injury by
	cause perforation of the gastro-intestinal tract and internal
bleeding.	
DERMAL	
Product:	Prolonged or repeated skin contact may cause mild to severe
irritation. Skin contact may agg	gravate existing dermatitis.
INHALATION	-
Product:	Respiratory tract irritant. High concentrations of vapor may
cause irritation of the respirato	ory tract, experienced as nasal discomfort and discharge, possibly
with chest pain and coughing.	
REPEATED DOSE TOXICITY	
Product:	Based on the available test data, product does not cause
adverse genetic effects.	
SKIN CORROSION / IRRITATION	N
Product:	Repeated and prolonged exposure to concentrated material
may cause dermatitis.	
SERIOUS EYE DAMAGE / IRRITA	ATION
Product:	Eye contact with product will cause severe irritation, chemical
burns, and serious eye damage	
RESPIRATORY OR SKIN SENSIT	•



MUTAGENCITY

IN VITRO	
Product:	No Data Available
IN VIVO	
Product:	No Data Available
Specified Substance(s)	Information as provided by manufacturer
Hydrogen Peroxide	No Data Available
CARCINOGENICITY	
Product:	IARC: 3-Group 3: Not classifiable as to its carcinogenicity to
humans (hydrogen peroxide).	ACGIH: A3: Confirmed animal carcinogen with unknown
relevance to humans. NTP: No	components of this product present at levels greater than or
equal to 0.1% is identified as a	known or anticipated carcinogen by NTP. OSHA: No components
of this product present at level	ls greater than or equal to 0.1% is identified as a carcinogen or
potential carcinogen by OSHA.	
REPODUCTIVE TOXICITY	
	Based on available data the classification criteria are not met.
Not classified as hazardous.	
SPECIFIC TARGET ORGAN TOX	
	Inhalation: Vapors are corrosive and irritating to the
•	mist may burn the mucous membrane of the nose and throat. In
· · · · · · · · · · · · · · · · · · ·	esult in pulmonary edema and death. Ingestion: Corrosive and
_	and abdomen. Large doses may cause symptoms of abdominal
	s well as blistering or tissue destruction. Stomach distention (due
	and risk of stomach perforation, convulsions, pulmonary edema,
-	a (fluid on the brain), and death are possible. Skin Contact:
	ss, pain, and severe burn can occur. Eye Contact: Vapors are very
_	eyes. Symptoms include pain, redness and blurred vision. Splashes
-	estruction. Chronic Exposure: No information found. Aggravation
_	rsons with pre-existing skin disorders or eye problems or impaired
SPECIFIC TARGET ORGAN TOX	ore susceptible to the effects of the substance.
	The effects of long-term, low-level exposures to this product
	fe handling of this material on a long-term basis should
	l effects from repetitive acute exposure. This product may
aggravate existing eye, skin, an	
ASPIRATION HAZARD	ia respiratory conditions.
	Droplets of the product aspirated into the lungs through
ingestion or vomiting may caus	, , , , , , , , , , , , , , , , , , , ,
OTHER ADVERSE EFFECTS	70 01.00.1100.1100.1100.1100.1100.1100.1
	Acute toxicity Oral: Practically nontoxic. (rat) LD50 >5000 mg/kg
	O = 1200 mg/kg(35%). Dermal: Slightly toxic. (rat) LD50 >2000
	Ion-irritating. (rabbit) (10%) Non-irritating. (rabbit) (35%). Eye

Irritation: Corrosive. (rabbit) (10%) Corrosive. (rabbit) (35%). For Hydrogen Peroxide.



12 – ECOLOGICAL INFORMATION

ACUTE TOXICITY

FISH Product:LC $_{50}$, 96 HRS , FISH mg /I: 16.4 mg/I (Pimephales promelas) for Hydrogen Peroxide.
AQUATIC INVERTEBRATES
Product:EC ₅₀ , 48 HRS , DAPHNIA, mg/l : 2.4 mg/l (Daphnia pulex) for
Hydrogen Peroxide.
CHRONIC TOXICITY
FISH
Product: Not determined. Keep product out of sewers and waterways.
AQUATIC INVERTEBRATES
Product: Not determined. Keep product out of sewers and waterways.
TOXICITY TO AQUATIC PLANTS Acute 5C 1.38 mg/l Aquatic plants 73 hours. For Hydrogen
Product: Acute EC ₅₀ 1.38 mg/l Aquatic plants 72 hours. For Hydrogen Peroxide.
T CTOXIGC.
PERSISTENCE AND DEGRADABILITY
BIODEGRADATION
Product:This product is considered to be biodegradable.
BIOLOGICAL OXYGEN DEMAND
Product:No data available
CHEMICAL OXYGEN DEMAND
Product:No data available BOD / COD RATIO
Product:No data available
BIOACCUMULATIVE POTENTIAL
Product:Potential to bioaccumate is low.
MOBILITY IN SOIL
Product:Expected to partition to water.
RESULTS OF PBT AND mPvB ASSESSMENT
Product: Not fulfilling PBT (persistent/bio accumulative/toxic) criteria.
Not fulfilling vPvB (very persistent, very bio accumulative) criteria. OTHER ADVERSE EFFECTS
Product:
photochemical ozone creation potential or global warming potential) are expected from this
product.



13 - DISPOSAL CONSIDERATIONS

WASTE DISPOSAL:.....Treatment, storage, transportation and disposal must be in accordance with Federal, State/Provincial and Local Regulations. Regulations may vary in different locations. Characterization and compliance with applicable laws are the responsibility solely of the generator. Whatever cannot be saved for recovery or recycling should be managed in an appropriate and approved waste disposal facility. Processing, use or contamination of this product may change the waste management options. State and local disposal regulations may differ from federal disposal regulations. Dispose of container and unused contents in accordance with federal, state and local requirements.

RCRA STATUS:..... If discarded in its purchased form, it is not a RCRA hazardous waste. It is the responsibility of the product user to determine at the time of disposal, whether a material containing the product should be classified as a hazardous waste. (40CFR261.20-24).

14 - TRANSPORTATION INFORMATION

Important Note: Shipping descriptions may vary based on mode of transport, quantities, package size, and/or origin and destination. Consult your company's Hazardous Materials/Dangerous Goods expert for information specific to your situation.





UN/NA NUMBER:.....2014 PROPER SHIPPING NAME:...... Hydrogen peroxide, aqueous solutions

HAZARD CLASS:.....5.1 (8)

PACKAGING GROUP :.....

LETTER:...... (Oxdizing agents), C (Corrosive substances)

ENVIRONMENTAL HAZARD: Because of modern treatment methods or method of use of

this product, only an insignificant amount of the ingredients reaches the environment. That amount is at such levels as to

typically not cause any adverse effects.

REPORTABLE QUANTITY:......1000 pounds (454 kilograms) based on Hydrogen Peroxide /

CAS# 7722-84-1 in blend.



15 - REGULATIONS

This Safety Data Sheet conforms to ANSI Z400.5, and to the format requirements and the International Chemical Safety Cards of the Global Harmonizing System. This SDS complies with 29 CFR 1910.1200 (HAZARD COMMUNICATION STANDARD). **IMPORTANT:** Read this SDS before handling & disposing of this product. Pass this information on to employees, customers, & users of this product.

EPA SRA Title III Chemical Listings:

TSCA STATUS:	This product is listed on the TSCA inventory. If this product is a blend, all ingredients in the product are listed on the TSCA Inventory List. Any impurities present in this product are exempt from listing.
SECTION 302:	.No listed substance
SECTION 304:	.No listed substance
SECTION 312:	.Yes
SARA SECTION 313:	.No listed substance
ACUTE:	.Yes (Eyes)
CHRONIC:	.No
FIRE:	.No
PRESSURE:	.No
REACTIVE:	.No
CLEAN WATER ACT:	.None

IMDG – International Marine Dangerous Goods Code

UN2014, Hydrogen peroxide, aqueous solutions 5.1, (8), PG II. EmS F-H, S-Q. Marine Pollutant: NO.

IATA

UN2014, Hydrogen peroxide, aqueous solutions 5.1, (8), PG II.

Category...... Not Applicable/Not Available

DEA Chemical Trafficking Act: ..No

Homeland Security Regulated .. This product does not contain any reportable DHS chemicals.

California Proposition 65	.This product contains the following Proposition 65 chemicals:	
Component	.This product does not contain any chemicals known to the State	
of California to cause cancer, birth, or any other reproductive defects.		
Cal Prop 65	Not Applicable/Not Available	
Cal Prop 65 NSRL	.No Significant Risk Level	



US State Right to Know (RTK)	
Component	Chemical not listed
Massachusetts	No
New Jersey	No
Pennsylvania	No
Illinois	No
Rhode Island	No
**RTK Chemical(s)	Chemical not Listed
Canada NPRI	Chemical not Listed

DSL (Canadian Domestic Substances List) and CEPA (Canadian Environmental Protection Act): All ingredients in this product are listed on the DSL. Any impurities present in this product are exempt from listing.

AICS / NICNAS (Australian Inventory of Chemical Substances and National Industrial Chemicals Notification and Assessment Scheme): All ingredients in this product are listed on AICS or otherwise complies with NICNAS.

MITI (Japanese Handbook of Existing and New Chemical Substances): All ingredients in this product are listed in the Handbook or has been approved in Japan by new substance notification.

ECL (Korean Toxic Substances Control Act): All ingredients in this product are listed on the Korean inventory or otherwise complies with the Korean Toxic Substances Control Act.KE-04134 Philippines Inventory (PICCS): All ingredients in this product are listed on the Philippine Inventory or otherwise complies with PICCS.

Inventory of Existing Chemical Substances in China: All ingredients in this product are listed on the Inventory of Existing Chemical Substances in China (IECSC).



16 – OTHER INFORMATION

HEALTH	3
FLAMMABILITY	0

HMIS*

FLAMMABILITY 0

REACTIVITY 0

PERSONAL PROTECTION D

*HMIS®HAZARD INDEX: 0=Minimal Hazard, 1=Slight Hazard, 2=Moderate Hazard, 3=Serious Hazard, 4=Severe Hazard. HMIS® rating involves data interpretations that may vary from company to company. They are intended only for rapid, general identification of the magnitude of the specific hazard. To deal adequately with the safe handling of this material, all the information contained in this SDS and product label must be considered.

ND = No Data, NA = Not Applicable/Not Available, \leq = Less than or equal to, \geq = Greater than or equal to

REVISION STATEMENT: Changes have been made throughout this Safety Data Sheet (SDS). Please read the entire document. Prepared according to the OSHA Hazard Communication Standard (29 CFR 1910.1200) and The Globally Harmonized System of Classification and Labeling of Chemicals (GHS) by the Company Health and Risk Assessment Unit.

DISCLAIMER:

Although the information and recommendations set forth herein (hereinafter "Information") are presented in good faith and believed to be correct as of the date hereof, the Company makes no representations as to the completeness or accuracy thereof. Information is supplied upon the condition that the persons receiving this Safety Data Sheet (SDS) will make their own determination as to its suitability for their intended purposes prior to use. Since the product is within the exclusive control of the user, it is the user's obligation to determine the conditions of safe use of this product. Such conditions should comply with all Federal and State Regulations concerning the Product. It must be recognized that the physical and chemical properties of any product may not be fully understood and that new, possibly hazardous products may arise from reactions between chemicals. The information given in this data sheet is based on our present knowledge and shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship. NO REPRESENTATIONS OR WARRANTIES, EITHER EXPRESS OR IMPLIED, OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE OR OF ANY OTHER NATURE ARE MADE HEREUNDER WITH RESPECT TO INFORMATION OR THE PRODUCT TO WHICH INFORMATION REFERS.

This is the last page of this SDS