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#### **1** Identification

#### <sup>•</sup> Product identifier

- · Trade name: Chitosan Clarifier
- · Product code: No other identifiers

· Recommended use and restriction on use

- · Recommended use: Water conditioner
- · Restrictions on use: Contact manufacturer

Details of the supplier of the Safety Data Sheet
Manufacturer/Supplier: NC Brands L.P.
40 Richards Ave
Norwalk, CT 06854
(800) 753-1233

## • Emergency telephone number: CHEMTREC

1-800-424-9300 (US/Canada) +01 703-527-3887 (International)

## 2 Hazard(s) identification

#### · Classification of the substance or mixture

The product is not classified as hazardous according to the Globally Harmonized System (GHS).

#### <sup>-</sup> Label elements

· GHS label elements Not regulated.

· Hazard pictograms: Not regulated.

· Signal word: Not regulated.

· Hazard statements: Not regulated.

· Precautionary statements: Not regulated.

• Other hazards There are no other hazards not otherwise classified that have been identified.

## **3** Composition/information on ingredients

#### · Chemical characterization: Mixtures

· Components: None in reportable quantities.

## 4 First-aid measures

## <sup>•</sup> Description of first aid measures

#### • After inhalation:

Unlikely route of exposure.

Supply fresh air; consult doctor in case of complaints.

#### After skin contact:

Immediately rinse with water. If skin irritation is experienced, consult a doctor.

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• After eye contact:

Remove contact lenses if worn, if possible.

Rinse opened eye for several minutes under running water. If symptoms persist, consult a doctor. • After swallowing:

Rinse out mouth and then drink plenty of water.

Do not induce vomiting; immediately call for medical help.

Most important symptoms and effects, both acute and delayed:

Slight irritant effect on skin and mucous membranes.

Slight irritant effect on eyes.

Gastric or intestinal disorders when ingested.

Diarrhea.

· Indication of any immediate medical attention and special treatment needed:

No relevant information available.

## 5 Fire-fighting measures

### Extinguishing media

#### • Suitable extinguishing agents:

The product is not flammable.

Use fire fighting measures that suit the environment.

- For safety reasons unsuitable extinguishing agents: None.
- Special hazards arising from the substance or mixture
- Formation of toxic gases is possible during heating or in case of fire.

### <sup>•</sup> Advice for firefighters

## Protective equipment:

Wear self-contained respiratory protective device.

Wear fully protective suit.

## 6 Accidental release measures

· Personal precautions, protective equipment and emergency procedures:

Ensure adequate ventilation.

## **Environmental precautions:**

Do not allow undiluted product or large quantities of it to reach ground water, water course or sewage system.

## Methods and material for containment and cleaning up:

Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust). Send for recovery or disposal in suitable receptacles.

#### **Reference to other sections:**

See Section 7 for information on safe handling.

See Section 8 for information on personal protection equipment.

See Section 13 for disposal information.

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## 7 Handling and storage

### · Handling

• Precautions for safe handling: Use only in well ventilated areas.

- · Information about protection against explosions and fires: No special measures required.
- Conditions for safe storage, including any incompatibilities
- · Storage

· Requirements to be met by storerooms and receptacles:

Storage area should be dry and well-ventilated.

· Information about storage in one common storage facility: Store away from foodstuffs.

• Specific end use(s): No relevant information available.

## 8 Exposure controls/personal protection

#### Control parameters

· Components with limit values that require monitoring at the workplace:

The product does not contain any relevant quantities of materials with critical values that have to be monitored at the workplace.

#### • Exposure controls

- Personal protective equipment:
- General protective and hygienic measures:

The usual precautionary measures for handling chemicals should be followed.

Keep away from foodstuffs, beverages and feed.

- Engineering controls: No relevant information available.
- Breathing equipment: Not required under normal conditions of use.
- Protection of hands:
- Not required.

Protection may be required for spills.

Gloves are advised for repeated or prolonged contact.

Eye protection:



Safety glasses

Follow relevant national guidelines concerning the use of protective eyewear.

Body protection: Not required under normal conditions of use.

<sup>•</sup> Limitation and supervision of exposure into the environment

Avoid release to the environment.

Risk management measures See Section 7 for additional information.

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9 Physical and chemical properties		
Information on basic physical a	and chemical properties	
· Appearance:		
Form:	Liquid	
Color:	Various colors	
· Odor:	Odorless	
· Odor threshold:	Not determined.	
· pH-value at 20 °C (68 °F):	3-4.5	
• Melting point/Melting range:	Not determined.	
<ul> <li>Boiling point/Boiling range:</li> </ul>	100 °C (212 °F)	
· Flash point:	Not applicable.	
· Flammability (solid, gaseous):	Not applicable.	
· Auto-ignition temperature:	Not determined.	
<ul> <li>Decomposition temperature:</li> </ul>	Not determined.	
<ul> <li>Danger of explosion:</li> </ul>	Product does not present an explosion hazard.	
· Explosion limits		
Lower:	Not determined.	
Upper:	Not determined.	
· Oxidizing properties:	Not determined.	
· Vapor pressure:	Not determined.	
<sup>·</sup> Density:		
Relative density:	Not determined.	
Vapor density:	Not determined.	
Evaporation rate:	Not determined.	
· Solubility in / Miscibility with		
Water:	Fully miscible.	
· Partition coefficient (n-octanol/wa	ter): Not determined.	
· Viscosity		
Dynamic:	Not determined.	
Kinematic:	Not determined.	
Other information	No relevant information available.	

## 10 Stability and reactivity

· Reactivity: No relevant information available.

· Chemical stability: Stable under normal temperatures and pressures.

Thermal decomposition / conditions to be avoided:

No decomposition if used and stored according to specifications.

Possibility of hazardous reactions: Reacts with strong acids and alkali.

Conditions to avoid: Excessive heat.

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## · Incompatible materials: No relevant information available.

## • Hazardous decomposition products:

Carbon monoxide and carbon dioxide

Nitrogen oxides (NOx)

## 11 Toxicological information

## · Information on toxicological effects

· Acute toxicity:

LD/LC50 values that are relevant for classification: None.

· Primary irritant effect:

• On the skin: Slight irritant effect on skin and mucous membranes.

· On the eye: Slight irritant effect on eyes.

• Sensitization: Based on available data, the classification criteria are not met.

· IARC (International Agency for Research on Cancer):

None of the ingredients are listed.

## • NTP (National Toxicology Program):

None of the ingredients are listed.

· OSHA-Ca (Occupational Safety & Health Administration):

None of the ingredients are listed.

#### · Probable route(s) of exposure:

Ingestion.

Eye contact.

Skin contact.

• Acute effects (acute toxicity, irritation and corrosivity): No relevant information available.

- Repeated dose toxicity: No relevant information available.
- CMR effects (carcinogenity, mutagenicity and toxicity for reproduction)
- Germ cell mutagenicity: Based on available data, the classification criteria are not met.
- · Carcinogenicity: Based on available data, the classification criteria are not met.
- **Reproductive toxicity:** Based on available data, the classification criteria are not met.
- STOT-single exposure: Based on available data, the classification criteria are not met.
- STOT-repeated exposure: Based on available data, the classification criteria are not met.
- Aspiration hazard: Based on available data, the classification criteria are not met.

## **12 Ecological information**

<sup>·</sup> Toxicity

· Aquatic toxicity No relevant information available.

- · Persistence and degradability No relevant information available.
- · Bioaccumulative potential: No relevant information available.
- Mobility in soil: No relevant information available.
- <sup>•</sup> Additional ecological information
- · General notes: Generally not hazardous for water

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#### <sup>•</sup> Results of PBT and vPvB assessment

· **PBT:** Not applicable.

· vPvB: Not applicable.

· Other adverse effects: No relevant information available.

## 13 Disposal considerations

#### <sup>•</sup> Waste treatment methods

#### · Recommendation:

Smaller quantities can be disposed of with household waste.

Small amounts may be diluted with plenty of water and washed away. Dispose of bigger amounts in accordance with Local Authority requirements.

The user of this material has the responsibility to dispose of unused material, residues and containers in compliance with all relevant local, state and federal laws and regulations regarding treatment, storage and disposal for hazardous and nonhazardous wastes.

### · Uncleaned packagings

· Recommendation: Disposal must be made according to official regulations.

Number	
	Not regulated.
oroper shipping name , ADR, IMDG, IATA	Not regulated.
sport hazard class(es)	
, ADR, IMDG, IATA s	Not regulated.
king group , ADR, IMDG, IATA	Not regulated.
ironmental hazards ne pollutant:	No
cial precautions for user	Not applicable.
, ADR, IMDG, IATA	No

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mix	ety, health and environmental regulations/legislation specific for the substance o cture ted States (USA) RA
· Sec	tion 302 (extremely hazardous substances):
Non	ne of the ingredients are listed.
· Sec	tion 355 (extremely hazardous substances):
Non	ne of the ingredients are listed.
· Sec	tion 313 (Specific toxic chemical listings):
Non	ne of the ingredients are listed.
·TSC	CA (Toxic Substances Control Act)
All i	ngredients are listed.
· Pro	position 65 (California)
· Che	emicals known to cause cancer:
Non	ne of the ingredients are listed.
· Che	emicals known to cause reproductive toxicity for females:
Non	ne of the ingredients are listed.
· Che	emicals known to cause reproductive toxicity for males:
Non	ne of the ingredients are listed.
· Che	emicals known to cause developmental toxicity:
Non	ne of the ingredients are listed.
· Car	cinogenic categories
	A (Environmental Protection Agency):
Non	e of the ingredients are listed.
·IAR	C (International Agency for Research on Cancer):
Non	ne of the ingredients are listed.
· NIO	SH-Ca (National Institute for Occupational Safety and Health):
	ne of the ingredients are listed.
· Can	nadian Domestic Substances List (DSL):
	ngredients are listed.

## 16 Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

· Date of preparation / last revision 09/07/2016 / -

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(Cont'd. of page 7) Abbreviations and acronyms: ADR: European Agreement concerning the International Carriage of Dangerous Goods by Road IMDG: International Maritime Code for Dangerous Goods DOT: US Department of Transportation IATA: International Air Transport Association CAS: Chemical Abstracts Service (division of the American Chemical Society) LC50: Lethal concentration, 50 percent LD50: Lethal dose, 50 percent PBT: Persistent, Bioaccumulative and Toxic vPvB: very Persistent and very Bioaccumulative NIOSH: National Institute for Occupational Safety OSHA: Occupational Safety & Health LDLo: Lowest Lethal Dose Observed · Sources Website, European Chemicals Agency (echa.europa.eu) Website, US EPA Substance Registry Services (ofmpub.epa.gov/sor internet/registry/substreg/home/ overview/home.do) Website, Chemical Abstracts Registry, American Chemical Society (www.cas.org) Patty's Industrial Hygiene, 6th ed., Rose, Vernon, ed. ISBN: ISBN: 978-0-470-07488-6 Casarett and Doull's Toxicology: The Basic Science of Poisons, 8th Ed., Klaasen, Curtis D., ed., ISBN: 978-0-07-176923-5. Safety Data Sheets, Individual Manufacturers SDS Prepared by: ChemTel Inc. 1305 North Florida Avenue Tampa, Florida USA 33602-2902 Toll Free North America 1-888-255-3924 Intl. +01 813-248-0573 Website: www.chemtelinc.com