

**SPARTAN CHEMICAL COMPANY, INC.
WHMIS MATERIAL SAFETY DATA SHEET**

SECTION I: PRODUCT INFORMATION

PRODUCT IDENTIFIER:
SPARCLEAN DELIMER [55]

PRODUCT USE: Mineral deposit remover for food processing equipment

MANUFACTURER'S NAME & ADDRESS
Spartan Chemical Company, Inc.
1110 Spartan Drive, Maumee, OH 43537 USA

MEDICAL EMERGENCY TELEPHONE
888/314-6171 (24 Hours)
PRODUCT INFORMATION: 800/537-8990

SECTION II: HAZARDOUS INGREDIENTS

CAS REGISTRY NO.	% W	CHEMICAL NAME(S)	TLV			LD50	LC50
			TWA mg/m ³	STEL mg/m ³	Ceiling mg/m ³		
77-92-9	15-20	Citric acid	----	Not Established	-----	Not available	Not available
7647-01-0	1-5	Hydrochloric acid	----	----	7 (3 ACGIH)	Not available	Not available

SECTION III: PHYSICAL DATA

BOILING POINT > 100°C (212°F)	SPECIFIC GRAVITY (H₂O = 1) 1.09	PERCENT SOLID BY WEIGHT 15-20
VAPOUR PRESSURE Not established	EVAPORATION RATE (butyl acetate = 1) < 1	FREEZING POINT Not available
VAPOUR DENSITY (AIR = 1) Not established	SOLUBILITY IN WATER Complete	ODOUR THRESHOLD Not available
pH 1.0-2.0	APPEARANCE AND ODOUR Clear liquid, mild odor	PHYSICAL STATE GAS__ LIQUID <u>X</u> SOLID__
COEFFICIENT OF WATER/OIL DISTRIBUTION Not available		

SECTION IV: FIRE & EXPLOSION DATA

FLASH POINT > 100°C (212°F)	METHOD USED ASTM - D56	FLAMMABLE LIMITS Not available
EXTINGUISHING MEDIA Carbon dioxide, dry chemical, water	CONDITIONS OF FLAMMABILITY Not applicable	AUTO-IGNITION TEMPERATURE Not applicable
HAZARDOUS COMBUSTION PRODUCTS Not established		EXPLOSION DATA Not applicable
SPECIAL FIRE FIGHTING PROCEDURES Use self-contained breathing apparatus for maximum respiratory protection. Water may be used to cool containers if not ruptured or leaking.		
UNUSUAL FIRE AND EXPLOSION HAZARDS Combustion products are toxic. Produces hydrogen on contact with most metals.		

SECTION V: REACTIVITY DATA

STABILITY: STABLE X

CONDITIONS OF INSTABILITY

Not established

CONDITIONS OF REACTIVITY

Not established

INCOMPATIBILITY (MATERIALS TO AVOID) Concentrated alkali, hypochlorites (chlorine bleach), aluminum and other reactive metals.

HAZARDOUS DECOMPOSITION PRODUCTS: HCL, carbon dioxide, carbon monoxide

SECTION VI: TOXICOLOGICAL PROPERTIES

PRIMARY ROUTES OF ENTRY: Eye Contact, Skin Contact, Ingestion, Inhalation, Skin Absorption

EXPOSURE LIMIT Not established for mixture.

EFFECTS OF ACUTE EXPOSURE:

EYE CONTACT Causes severe eye damage and chemical burns. Eye contact may permanent damage.

SKIN CONTACT Causes severe skin damage with symptoms such as chemical burns, pain, redness and tissue destruction.

INGESTION Harmful if swallowed. Causes damage or chemical burns to esophagus and mucous membranes with symptoms of pain, nausea, vomiting and diarrhea.

INHALATION Breathing product vapor or mist may cause irritation or damage of the respiratory tract with symptoms of nasal discomfort and coughing.

EFFECTS OF CHRONIC EXPOSURE

None known

IRRITANCY OF PRODUCT

Corrosive to eyes and skin

SENSITIZATION TO PRODUCT

Not available

CARCINOGENICITY

No

REPRODUCTIVE TOXICITY

Not available

TERATOGENICITY

Not available

MUTAGENICITY

Not available

SYNERGISTIC PRODUCTS

Not available

SECTION VII: PREVENTIVE MEASURE

PERSONAL PROTECTIVE EQUIPMENT / ENGINEERING CONTROLS

Wear rubber or other impervious gloves and splash goggles. Eyewash stations and washing facilities should be readily accessible.

Provide good general ventilation. Local exhaust ventilation may be necessary for some operations. If exposure limits (see Section II) can not be maintained by ventilation, use of a NIOSH approved respirator suitable for the conditions of use and chemicals in Section II should be considered.

LEAK AND SPILL PROCEDURE: Small spills of one gallon or less may be flushed with plenty of water to sanitary sewer system (if permitted by local sewer regulations). Dike and contain large spills with inert material and transfer liquid to containers for recovery or disposal. Keep spill out of storm sewers and waterways.

WASTE DISPOSAL METHOD: Dispose of in compliance with all laws and regulations.

HANDLING PROCEDURES: Do not get in eyes, on skin or clothing. Do not breathe product vapor or mist. Do not swallow. Use with adequate ventilation. Wash thoroughly after handling. This product contains hydrochloric acid. Do not mix with hypochlorite-type bleach or other household chemicals as hazardous vapors or gases may be produced.

STORAGE REQUIREMENTS: Keep container closed when not in use. Keep from freezing. Do not store above 49°C (120°F). Do not mix with other chemicals. Keep out of reach of children.

SPECIAL SHIPPING INFORMATION: Corrosive liquids, n.o.s., 8, UN 1760, III, (contains hydrochloric (muriatic) acid)

SECTION VIII: FIRST AID MEASURES

EYES: Immediately flush eyes with water for at least 15 minutes. Remove contact lenses. Get medical attention.

SKIN: Remove contaminated clothing and shoes. Flush skin with water for at least 15 minutes. Get medical attention. Wash contaminated clothing before reuse.

INGESTION: Do not induce vomiting. Drink one or two glasses of water to dilute product. Get medical attention. Do not give anything by mouth to an unconscious person.

INHALATION: In case of respiratory irritation, move person to fresh air. Get medical attention.

NOTE TO PHYSICIAN: Probable mucosal damage may contraindicate the use of gastric lavage.

SECTION IX: PREPARATION INFORMATION

SPARCLEAN DELIMER [55]

DATE OF PREPARATION: March 20, 2014

SUPERCEDES: May 20, 2011

PREPARED BY Ronald T. Cook / Manager, Regulatory Affairs / Spartan Chemical Company, Inc.

TELEPHONE NUMBER 800/537-8990