CAROLINA BIOLOGICAL SUPPLY -- COBALT NITRATE,85-4990 -- 6810-00-081-3996 Product ID:COBALT NITRATE,85-4990 MSDS Date:03/24/1997 FSC:6810 NIIN:00-081-3996 MSDS Number: CJHHZ === Responsible Party === Company Name: CAROLINA BIOLOGICAL SUPPLY Address:2700 YORK RD City:BURLINGTON State:NC ZIP:27215-3387 Country:US Info Phone Num:800-334-5551/910584-0381 Emergency Phone Num:910-584-0381 Chemtrec Ind/Phone:(800)424-9300 CAGE:59896 == Contractor Identification === Company Name: CAROLINA BIOLOGICAL SUPPLY CO Address:2700 YORK RD Box:City:BURLINGTON State:NC ZIP:27215-3387 Country:US Phone:800-227-1150/910-584-0381 CAGE:59896 ======= Composition/Information on Ingredients ======== Ingred Name: COBALT NITRATE CAS:10026-22-9 RTECS #:QU7355500 Minumum % Wt:90. Maxumum % Wt:100. Other REC Limits: NONE RECOMMENDED OSHA PEL:0.1 MG/M3 (CO) ACGIH TLV:0.1 MG/M3 (CO)

====== Hazards Identification ======

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LD50 LC50 Mixture:LD50 (ORAL, RAT) 691 MG/KG Routes of Entry: Inhalation:YES Skin:NO Ingestion:NO Reports of Carcinogenicity:NTP:NO IARC:NO OSHA:NO

Health Hazards Acute and Chronic:TARGET ORGANS: NONE IDENTIFIED. ACUTE

- EYES: MAY CAUSE IRRITATION. SKIN: MAY CAUSE IRRITATION.

INHALATION: MAY CAUSE IRRITATION TO RESPIRATORY TRACT. INGESTION: MAY CAUSE GASTROINTESTINAL DISCOMFORT. CHRONIC - NOT CAUSING CANCER.

Explanation of Carcinogenicity: NOT LISTED BY IARC,

NTP OR OSHA AS A

CARCINOGEN.

Effects of Overexposure: IRRITATION, DISCOMFORT

	First Aid Measures	
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First Aid:INHALE: REMOVE VICTIM TO FRESH AIR. GIVE OXYGEN IF BREATHING IS DIFFICULT; GIVE ARTIFICIAL RESPIRATION IF BREATHING HAS STOPPED. KEEP PERSON WARM. GET MEDICAL ATTENTION. EYES: FLUSH WITH WATER FOR AT LEAST 15 MINUTES, RAISING AND LOWERING EYELIDS OCCASIONALLY. GET MEDICAL ATTENTION IF IRRITATION PERSISTS. SKIN: THOROUGHLY WASH

EXPOSED AREA FOR AT LEAST 15 MINUTES. REMOVE CONTAMINATED CLOTHING. GE T MEDICAL ATTENTION IF IRRITATION PERSISTS. INGESTION: IF SWALLOWED, IF CONSCIOUS, GIVE PLENTY OF WATER AND INDUCE VOMITING IMMEDIATELY AS DIRECTED BY MEDICAL PERSONNEL. IMMEDIATELY CALL A PHYSICIAN O R POISON CONTROL CENTER.

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Flash Point: NO INFO AVAILABL

Extinguishing Media:USE MEDIA SUITABLE TO EXTINGUISH SURROUNDING FIRE. Fire

Fighting Procedures:FIRE FIGHTERS SHOULD WEAR FULL PROTECTIVE EQUIPMENT AND NIOSH APPROVED SELF-CONTAINED BREATHING APPARATUS. Unusual Fire/Explosion Hazard:STRONG OXIDIZER. CONTACT WITH COMBUSTIBLE MATERIALS, FLAMMABLE MATERIALS, OR POWDERED METALS CAN CAUSE FIRE OR EXPLOSION.

	Accidental	Release	Measures	
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Spill Release Procedures: VENTILATE AREA OF SPILL. ELIMINATE ALL SOURCES OF IGNITION. REMOVE ALL NON-ESSENTIAL PERSONNEL FROM AREA. CLEA

N-UP PERSONNEL SHOULD WEAR PROPER PROTECTIVE EQUIPMENT AND CLOTHING. ABSORB MATERIAL WITH SUITABLE ABSORBENT AND CONTAINERIZE FOR DISPOSAL. Neutralizing Agent:REDUCING AGENTS ============ Handling and Storage =========================== Handling and Storage Precautions: KEEP CONTAINER TIGHTLY CLOSED. STORE SEPARATELY AND AWAY FROM FLAMMABLE AND COMBUSTIBLE MATERIALS. Other Precautions: DANGER! STRONG OXIDIZER. CONTACT WITH OTHER MATERIAL MAY CAUSE FIRE, HARMFUL IF SWAL LOWED OR INHALED. CAUSES IRRITATION. DO NOT GET IN EYES, ON SKIN OR ON CLOTHING. AVOID INHALATION AND INGESTION. KEE P OUT OF REACH OF CHILDREN. ===== Exposure Controls/Personal Protection ======== Respiratory Protection: NONE NEEDED UNDER NORMAL CONDITIONS OF USE WITH ADEQUATE VENTILATION. NIOSH APPROVED EQUIPMENT SHOULD BE WORN IF PELS ARE EXCEEDED. Ventilation: LOCAL: YES. MECHANICAL (GENERAL): YES. SPECIAL: NO. OTHER: Protective Gloves: RUBBER, NEOPRENE, PVC, OR EQUIVALENT. Eye Protection: SPLASH PROOF CHEMICAL SAFETY GOGGLES SHOULD BE WORN AT ALL TIMES. Other Protective Equipment: LAB COAR, EYE WASH, AND SAFETY SHOWER. Work Hygienic Practices: OBSERVE GOOD INDUSTRIAL HYGIENE PRACTICES AND RECOMMENDED PROCEDURES. WASH AFTER HANDLING AND BEFORE EATING, DRINKING OR SMOKING. Supplemental Safety and Health ========= Physical/Chemical Properties =========== HCC:D1 Boiling Pt:B.P. Text:WRONG INFO. Melt/Freeze Pt:=55.6C, 13 2.F Vapor Pres: NO INFO AVAILABLE Spec Gravity: 1.54 Evaporation Rate & Dr. Reference: NO INFO AVAILABLE Solubility in Water: COMPLETE (100%) Appearance and Odor: RED CRYSTALS, ODORLESS Percent Volatiles by Volume:0 ========= Stability and Reactivity Data ==============

Stability Indicator/Materials to Avoid:YES
COMBUSTIBLE MATERIALS, STRONG REDUCING AGENTS
Stability Condition to Avoid:NONE IDENTIFIED
Hazardous Decomposition Products:OXIDES OF NITROGEN

====== Disposal C

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Waste Disposal Methods:DISPOSE IN ACCORDANCE WITH ALL APPLICABLE LOCAL, STATE, AND FEDERAL REGULATIONS. ALWAYS CONTACT A PERMITTED WASTE DISPOSER (TSD) TO ASSURE COMPLIANCE. EPA WASTE NUMBERS: D001

======== MSDS Transport Information ==========

Transport Information:LIMITED QUANTITIES ARE EXEMPT FROM LABELING AND PLACARDING; UNLESS OFFERED FOR TRANSPORTATION BY AIRCRAFT, PACKED IN STRONG OUTER PACKAGINGS; AND GROSS WEIG HT < 66 LBS/30 KG, 49CFR 173.152.

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