Product ID:ALKALINE MANGANESE DIOXIDE CELL BATTERY

MSDS Date:08/13/1996

FSC:6135

NIIN:00-125-5256

MSDS Number: CDXJM === Responsible Party ===

Company Name: BATTERY ASSEMBLERS INC

Address:211-4 KNICKERBOCKER AVE

City:BOHEMIA

State:NY ZIP:11716 Country:US

Info Phone Num:516-567-8855/FAX -8278 Emergency Phone Num:516-567-8855

CAGE:0B0Y5

=== Con

tractor Identification ===

Company Name: BATTERY ASSEMBLERS INC

Address:211-4 KNICKERBOCKER AVE

Box:City:BOHEMIA

State:NY ZIP:11716 Country:US

Phone: 407-323-3390/EM: 516-567-8855/8278

CAGE:0B0Y5

======= Composition/Information on Ingredients ========

Ingred Name: POTASSIUM HYDROXIDE (SARA III)

CAS:1310-58-3 RTECS #:TT2100000 Fraction by Wt: 8%

Other REC Limits: NONE RECOMMENDED

OSHA PEL:C 2 MG/M3

ACGIH TLV:C 2 MG/M3; 9394

EPA Rpt Qty:1000 LBS DOT Rpt Qty:1000 LBS

Ingred Name: MANGANES

E DIOXIDE CAS:1313-13-9 RTECS #:OP0350000 Fraction by Wt: 37% Other REC Limits: NONE RECOMMENDED OSHA PEL:5 MG MN/M3 CEILING ACGIH TLV:5 MG MN/M3 Ingred Name:ZINC (SARA III) CAS:7440-66-6 RTECS #:ZG8600000 Fraction by Wt: 15% Other REC Limits: NONE RECOMMENDED EPA Rpt Qty:1000 LBS DOT Rpt Qtv:1000 LBS ============= Hazards Identification ======================== LD50 LC50 Mixture:PRODUCT'S LD50 (ORAL RAT) WAS NOT STATED Routes of Entry: Inhalation:YES Skin:YES Ingestion:YES Reports of Carcinogenicity:NTP:NO IARC:NO OSHA:NO Health Hazards Acute and Chronic: CHEMICALS ARE CONTAINED IN A SEALED CAN. RISK OF EXPOSURE OCCURS ONLY IF THE BATTERY IS MECHANICALLY OR ELECTRICALLY ABUSED. MOST LIKELY RISK IS ACUTE EXOSURE WHEN A CELL LEAKS. KOH IS CAUSTIC & SKIN CONTACT CAN CAUSE BURNS. EYE CONTACT MAY CAUSE PERMANENT DAMAGE. Explanation of Carcinogenicity: MFR GAVE THE ABOVE LISTINGS ON THE MSDS BUT NO OTHER COMMENTS ABOUT CARCINOGENICITY WERE RECORDED. Effects o f Overexposure: SKIN & EYE CONTACT W/KOH MAY CAUSE CHEMCIAL BURNS. Medical Cond Aggravated by Exposure:MFR GAVE NO INFORMATION OF MSDS.

First Aid:IF LEAKAGE FROM A CELL CONTACTS SKIN, FLUSH IMMEDIATELY

TO FRESH ALR.

W/WATER. FOR EYE CONTACT, FLUSH W/COPIOUS AMOUNTS OF WATER FOR 15 MIN & GET IMMEDIATE MEDICAL ATTENTION. IF VAPOR IS INHALED, REMOVE

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Flash Point:N/A. Lower Limits:N/A. Upper Limits:N/A. Extinguishing Media:MFR GAVE NO INFORMATION OF MSDS. Fire Fighting Procedures:FIRE FIGHTERS SHOULD USE SELF-CONTAINED BREATHING APPARATUS WHEN A LARGE NUMBER OF CELLS ARE INVOLVED IN FIRE. Unusual Fire/Explosion Hazard:NONE
======== Accidental Release Measures ==========
Spill Release Procedures:AVOID SKIN AND EYE CONTACT. DO NOT INHALE VAPORS. Neutralizing Agent:MFR GAVE NO INFORMATION OF MSDS.
==== =================================
Handling and Storage Precautions: AVOID MECHANICAL OR ELECTRICAL ABUSE. USE NEOPRENE, RUBBER OR LATEX-NITRILE GLOVES TO HANDLE LEAKERS. STORE AT ROOM TEMPERATURE. Other Precautions: DO NOT ATTEMPT TO RECHARGE. INSTALL CELLS IN ACCORDANCE WITH EQUIPMENT INSTRUCTIONS. DO NOT DISPOSE IN FIRE. REPLACE ALL BATTERIES IN EQUIPMENT AT THE SAME TIME. DO NOT MIX BATTERY SYSTEMS SUCH AS ALK ALINE & ZINC CARBON IN SAME EQUIPM ENT.
====== Exposure Controls/Personal Protection =======
Respiratory Protection:SELF-CONTAINED BREATHING APPARATUS WHEN LARGE

NUMBERS OF CELLS ARE INVOLVED IN A FIRE.

Eye Protection: SAFETY GLASSES OR GOGGLES

Protective Gloves: NEOPRENE, RUBBER OR LATEX-NITRILE

Other Protective Equipment:MFR GAVE NO INFORMATION OF MSDS. Work Hygienic Practices:MFR GAVE NO INFORMATION OF MSDS.

POSSIBLE.

Supplemental Safety and

Ventilation: SUBSEQUENT TO A FIRE PROVIDE AS MUCH VENTILATION AS

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Health DO NOT CARRY BATTERIES LOOSE IN POCKET OR BAG.

======== Physical/Chemical Properties ===========

HCC:N1

NRC/State Lic Num:NONE

Vapor Pres:N/A. Vapor Density:N/A.

Evaporation Rate & Department Reference: N/A.

Solubility in Water: NEGLIGIBLE

Appearance and Odor:BATTERY CELL

======== Stability and Reactivity Data ==========

Stability Indicator/Materials to Avoid:YES
MFR GAVE NO INFORMATION OF MSDS.
Stability Condition to Avoid:DO NOT HEAT, DISASSEMBLE, OR REC HARGE.

Hazardous Decomposition Products:WHEN HEATED, CELSS MAY EMIT HAZARDOUS VAPORS OF HG AND CAUSTIC KOH.

======= Disposal Considerations ===========

Waste Disposal Methods:AIN SMALL QUANTITIES CELLS MAY BE DISPOSED OF W/HOUSEHOLD TRASH. OPEN CELLS IN LARGE QUANTITIES SHOULD BE TREATED AS HAZARDOUS WASTE. DO NOT INCINERATE SINCE CELLS MAY EXPLODE. DISPOSE I/A/W APPLICABL E REGULATIONS.

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