

Material Safety Data Sheet

MSDS-001

U.S. Department of Labor

May be used to comply with
 OSHA's Hazard Communication Standard,
 29 CFR 1910.1200. Standard must be
 consulted for specific requirements.

Occupational Safety and Health Administration
 (Non-Mandatory Form)
 Form Approved
 OMB No. 1218-0072

IDENTITY (As Used on Label and List)

Note: Blank spaces are not permitted. If any item is not applicable, or no
 information is available, the space must be marked to indicate that.

LITHIUM - ION CELLS AND BATTERIES

Section I*Manufacturer's Name*

Yardney Technical Products, Inc.

Emergency Telephone Number

(800) 255-3924 Chemtel

Address (Number, Street, City, State, and Zip Code)

2000 South County Trail

Telephone Number for Information

401-471-6580

East Greenwich, RI 02818-1530

Date Prepared

3/14/2013

*Signature of Preparer (optional)***Section II - Hazardous Ingredients/Identity Information****Hazardous Components (Specific Chemical Identity; Common Name(s))****OSHA PEL****ACGIH TLV****Other Limits
Recommended****% (optional)**

Contains one or more of the following:

Carbonic Acid, Ethyl Methyl Ester

RTECS#

NA

Diethyl Carbonate

RTECS#

FF9800000

Dimethyl Carbonate

RTECS#

FG0450000

Carbonic Acid, Cyclic Ethylene Ester

RTECS#

FF9550000

Phosphate (1-), Hexafluoro-, Lithium; LiPF₆

RTECS#

NA

Lithium Tetrafluoroborate; LiBF₄

Lithiated Nickel Oxide Based Components (Suspected Carcinogens)

Section III - Physical/Chemical Characteristics*Boiling Point*

N/A

Specific Gravity (H₂O = 1)

N/A

Vapor Pressure (mm Hg.)

N/A

Melting Point

N/A

Vapor Density (AIR = 1)

N/A

*Evaporation Rate
(Butyl Acetate = 1)*

N/A

Solubility in Water

N/A

Appearance and Odor

Hermetically sealed prismatic cell. No odor

Section IV - Fire and Explosion Hazard Data*Flash Point (Method Used)*

N/A

Flammable Limits

N/A

LEL

N/A

UEL

N/A

*Extinguishing Media*Water spray, Dry Chemical, CO₂, or alcohol resistant foam.*Special Fire Fighting Procedures*

Use self-contained breathing apparatus.

Unusual Fire and Explosion Hazards

Explosion could result in cases of extreme overcharge.

(Reproduce locally)

OSHA 174, Sept. 1985

Section V - Reactivity Data

Stability	Unstable		Conditions to Avoid DO NOT PUNCTURE OR SHORT CIRCUIT, DO NOT MECHANICALLY
	Stable	X	ABUSE; DO NOT OVERCHARGE OR OVERDISCHARGE

Incompatibility (Materials to Avoid)

NONE

Hazardous Decomposition or Byproducts

NONE IN NORMAL CONDITIONS OF USE & SERVICE

Hazardous Polymerization	May Occur		Conditions to Avoid DO NOT OVERHEAT. DO NOT EXCEED 70°C.
	Will Not Occur	X	

Section VI - Health Hazard Data

Route(s) of Entry:	Inhalation?	Skin?	Ingestion?
	N/A	N/A	N/A

Health Hazards (Acute and Chronic)

NONE IN NORMAL CONDITIONS OF USE & SERVICE

Electrolyte is corrosive. Causes chemical burns on contact with skin. Inhalation of fine mist or vapors are irritating to the respiratory system.

Carcinogenicity:	NTP?	IARC Monographs?	OSHA Regulated?
	"N/A	N/A	NO

Signs and Symptoms of Exposure

NONE IN NORMAL OPERATING CONDITIONS

Medical Conditions Generally Aggravated by Exposure

N/A

Emergency and First Aid Procedures

INHALATION: REMOVE TO FRESH AIR, SEEK MEDICAL ATTENTION

EYES: FLUSH WITH COPIOUS AMOUNTS OF WATER, SEEK MEDICAL ATTENTION

SKIN: FLUSH WITH COPIOUS AMOUNTS OF WATER, SEEK MEDICAL ATTENTION

INGESTION: SEEK MEDICAL ATTENTION. DO NOT INDUCE VOMITING.

Section VII - Precautions for Safe Handling and Use

Steps to Be Taken in Case Material is Released or Spilled

ANY SPILLED LIQUID SHOULD BE ABSORBED WITH AN INERT DRY MATERIAL AND PLACED IN AN

APPROPRIATE WASTE DISPOSAL CONTAINER.

KEEP AWAY FROM HEAT AND SOURCES OF IGNITION.

Waste Disposal Method

DO NOT DISPOSE OF IN FIRE. FOLLOW ALL STATE AND LOCAL REGULATIONS FOR SOLID WASTE

Precautions to Be Taken in Handling and Storage

DO NOT PUNCTURE, DO NOT SHORT CIRCUIT, DO NOT OVERCHARGE, DO NOT OVERDISCHARGE

DO NOT MECHANICALLY ABUSE, DO NOT OVERHEAT

Other Precautions

TRANSPORTATION: LITHIUM-ION BATTERIES CLASS 9 UN3480 PG II

DO NOT EXCEED 70°C

UN3090, Class 9, PG II - GROUND

Section VIII - Control Measures

Respiratory Protection (Specific Type)

NONE REQUIRED UNDER NORMAL CONDITIONS

Ventilation	Local Exhaust	N/A	Special	N/A
	Mechanical (General)	N/A	Other	N/A

Protective Gloves

NONE REQUIRED UNDER NORMAL CONDITIONS

Eye Protection

NONE REQUIRED UNDER NORMAL CONDITIONS

Other Protective Clothing or Equipment

NONE

Work Hygienic Practices

WASH THOROUGHLY AFTER USING THIS OR ANY BATTERY