




# MSDS Report

<b>Prepared For :</b>	RENHUA HENGLYPOWER TECH CO., LTD
<b>Product Name:</b>	lead acid battery
<b>Model :</b>	HL440, HL450, HL613, HL623, HL628, HL632, HL640, HL645, HL650, HL670, HL6100, HL6120, HL1208, HL1213, HL1223, HL1232, HL1240, HL1245, HL1250, HL1270, HL1280, HL1290, HL1290W, HL12100, HL12120, HL12150, HL12170, HL12180, HL12190, HL12190W, HL12200, HL12220, MHL6100, MHL6180, MHL6200, MHL1224, MHL1228, MHL1233, MHL1240, MHL1255, MHL1260, MHL1265, MHL1270, MHL1280, MHL1290, MHL12100, MHL12120, MHL12150, MHL12200, MHL12230, MHL12250, BHL2100, BHL2200, BHL2300, BHL2400, BHL2500, BHL2600, BHL2800, BHL21000, BHL21500, BHL22000, BHL22500, BHL23000, (Used for jump starter,UPS,electricity and telecommunications backup systems,wind and solar power systems)
<b>Typical Capacity:</b>	N/A
<b>Weight:</b>	720 g
<b>Dimension :</b>	L:70mm*W:47mm*H:100mm
<b>Prepared By :</b>	Shenzhen BCTC Testing Co., Ltd. BCTC Building & 1-2F, East of B Building, Pengzhou Industrial, Fuyuan 1st Road, Qiaotou Community, Fuyong Street, Bao'an District, Shenzhen, China.
<b>Report No.:</b>	BCTC-FY170402299S

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Approved by: 

Inspected by: lewis

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# Material Safety Data Sheet

## Section 1- Chemical Product & Company Identification

**Product Name:** Valved Sealed Lead-acid Battery

**Manufacture:** RENHUA HENGLYPOWER TECH CO., LTD

**Address:** XinZhuang Industrial Park, Zhoutian Town, Renhua Xian, Shaoguan City, Guangdong, China

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**Item Code:** N/A

## Section 2- Hazards Identification

Preparation hazards and classification	Not dangerous with normal use. Do not dismantle, open or shred SEALED LEAD-ACID BATTERY the ingredients contained within or their ingredients products could be harmful.
Appearance, Color, Odor	Solid object with no odor, no color.
Primary Route(s) of Exposure	These chemicals are contained in a sealed stainless steel enclosure. Risk of exposure occurs only if the cell is mechanically, thermally or electrically abused to the point of compromising the enclosure. If this occurs, exposure to the electrolyte solution contained within can occur by Inhalation, Ingestion, Eye contact and Skin contact



Potential Health Effects:	<p>ACUTE (short term): see Section 8 for exposure controls In the event that this battery has been ruptured, the electrolyte solution contained within the battery would be corrosive and can cause burns.</p> <p>Inhalation: Inhalation of materials from a sealed battery is not an expected route of exposure. Vapors or mists from a ruptured battery may cause respiratory irritation.</p> <p>Ingestion: Swallowing of materials from a sealed battery is not an expected route of exposure. Swallowing the contents of an open battery can cause serious chemical burns of mouth, esophagus, and gastrointestinal tract.</p> <p>Skin: Contact between the battery and skin will not cause any harm. Skin contact with contents of an open battery can cause severe irritation or burns to the skin.</p> <p>Eye: Contact between the battery and the eye will not cause any harm. Eye contact with contents of an open battery can cause severe irritation or burns to the eye.</p> <p>CHRONIC (long term): see Section 11 for additional toxicological data</p>
Medical Conditions Aggravated by Exposure	Not applicable
Reported as carcinogen	Not applicable

## Section 3- Composition/Information on Ingredients

### SEALED LEAD-ACID BATTERY is a mixture

Components	Compositions	Approximate%	CAS Number
Plate	Lead and lead compounds ( Pb & PbO <sub>2</sub> )	65-75%	7439-92-1 ( Pb )
	Barium compound ( Ba <sup>**</sup> )	0.3% or below	7440-39-3 ( Ba )
Electrolyte	abt. 40% dilute sulfuric acid ( H <sub>2</sub> SO <sub>4</sub> +H <sub>2</sub> O )	15-25%	7664-93-9
Battery container / Cover	ABS resin ( synthetic resin )	5-15%	9003-56-9
	Antimony trioxide ( Sb <sub>2</sub> O <sub>3</sub> )	2% or below	1309-64-4
	Tetrabromobisphenol A	4% or below	79-94-7
Separator	Glass Fiber	1-3%	—
Other metal parts	Brass	1% or below	—
Other resin parts	PP	1-5%	9003-07-0
	Epoxy resin and Rubber		—

Labeling according to EC directives.

No symbol and risk phrase are required.

Note: CAS number is Chemical Abstract Service Registry Number.

N/A=Not apply.

## Section 4- First Aid Measures



Inhalation	If contents of an opened battery are inhaled, remove source of contamination or move victim to fresh air. Obtain medical advice.
Skin contact	If skin contact with contents of an open battery occurs, as quickly as possible remove contaminated clothing, shoes and leather goods. Immediately flush with lukewarm, gently flowing water for at least 30 minutes. If irritation or pain persists, seek medical attention. Completely decontaminate clothing, shoes and leather goods before reuse or discard.
Eye contact	If eye contact with contents of an open battery occurs, immediately flush the contaminated eye(s) with lukewarm, gently flowing water for at least 30 minutes while holding the eyelids open. Neutral saline solution may be used as soon as it is available. If necessary, continue flushing during transport to emergency care facility. Take care not to rinse contaminated water into the unaffected eye or onto face. Quickly transport victim to an emergency care facility.
Ingestion	If ingestion of contents of an open battery occurs, never give anything by mouth if victim is rapidly losing consciousness, or is unconscious or convulsing. Have victim rinse mouth thoroughly with water. DO NOT INDUCE VOMITING. Have victim drink 60 to 240 mL (2-8 oz.) of water. If vomiting occurs naturally, have victim lean forward to reduce risk of aspiration. Have victim rinse mouth with water again. Quickly transport victim to an emergency care facility.

## Section 5- Fire Fighting Measures

Flammable Properties	In the event that this battery has been ruptured, the electrolyte solution contain within the battery would be flammable. Like any sealed container, battery cells may rupture when exposed to excessive heat; this could result in the release of flammable or corrosive materials.
Suitable extinguishing Media	Use extinguishing media suitable for the materials that are burning.
Unsuitable extinguishing Media	Not available
Explosion Data	Sensitivity to Mechanical Impact: This may result in rupture in extreme cases Sensitivity to Static Discharge: Not Applicable
Specific Hazards arising from the chemical	Fires involving SEALED LEAD-ACID BATTERY can be controlled with water. When water is used, however, hydrogen gas may evolve. In a confined space, hydrogen gas can form an explosive mixture. In this situation, smothering agents are recommended to extinguish the fire
Protective Equipment and precautions for firefighters	As for any fire, evacuate the area and fight the fire from a safe distance. Wear a pressure-demand, self-contained breathing apparatus and full protective gear. Fight fire from a protected location or a safe distance. Use NIOSH/MSHA approved full-face self-contained breathing apparatus (SCBA) with full protective gear.
NFPA	Health: 0 Flammability: 0 Instability: 0

## Section 6- Accidental Release Measures



Personal Precautions, protective equipment, and emergency procedures	Restrict access to area until completion of clean-up. Do not touch the spilled material. Wear adequate personal protective equipment as indicated in Section 8.
Environmental Precautions	Prevent material from contaminating soil and from entering sewers or waterways.
Methods and materials for Containment	Stop the leak if safe to do so. Contain the spilled liquid with dry sand or earth. Clean up spills immediately.
Methods and materials for cleaning up	Absorb spilled material with an inert absorbent (dry sand or earth). Scoop contaminated absorbent into an acceptable waste container. Collect all contaminated absorbent and dispose of according to directions in Section 13. Scrub the area with detergent and water; collect all contaminated wash water for proper disposal.

## Section 7- Handling and Storage

Handling	The battery should not be opened, destroyed or incinerate, since they may leak or rupture and release to the environment the ingredients that they contain in the hermetically sealed container. Do not short circuit terminals, or over charge the battery, forced over-discharge, throw to fire. Do not crush or puncture the battery, or immerse in liquids.
Storage	Avoid mechanical or electrical abuse. Storage preferably in cool, dry and ventilated area, which is subject to little temperature change. Storage at high temperatures should be avoided. Do not place the battery near heating equipment, nor expose to direct sunlight for long periods.
Other Precautions	The battery may explode or cause burns, if disassembled, crushed or exposed to fire or high temperatures. Do not short or install with incorrect polarity.

## Section 8 - Exposure Controls/Personal Protection



Engineering Controls	Use local exhaust ventilation or other engineering controls to control sources of dust, mist, fumes and vapor. Keep away from heat and open flame. Store in a cool, dry place.
Personal Protective Equipment	Respiratory Protection: Not necessary under normal conditions. Skin and body Protection: Not necessary under normal conditions, Wear neoprene or nitrile rubber gloves if handling an open or leaking battery. Hand protection: Wear neoprene or natural rubber material gloves if handling an open or leaking battery. Eye Protection: Not necessary under normal conditions, Wear safety glasses if handling an open or leaking battery.
Other Protective Equipment	Have a safety shower and eye wash fountain readily available in the immediate work area.
Hygiene Measures	Do not eat, drink, or smoke in work area. Maintain good housekeeping.

## Section 9- Physical and Chemical Properties

Physical State	Form: Solid
	Color: Black
	Odour: Monotony
Change in condition:	
pH, with indication of the concentration	Not applicable
Melting point/freezing point	Not available.
Boiling Point, initial boiling point and Boiling range:	Not available.
Flash Point	Not available.
Upper/lower flammability or explosive limits	Not available.
Vapor Pressure:	Not applicable
Vapor Density: (Air = 1)	Not applicable
Density/relative density	Not available.
Solubility in Water:	Insoluble
n-octanol/water partition coefficient	Not available.
Auto-ignition temperature	Not available.
Decomposition temperature	Not available.
Odour threshold	Not available.
Evaporation rate	Not available.
Flammability (soil, gas)	Not available.



Viscosity	Not applicable
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## Section 10 – Stability and Reactivity

Stability	The product is stable under normal conditions.
Conditions to Avoid (e.g. static discharge, shock or vibration)	Do not subject SEALED LEAD-ACID BATTERY to mechanical shock. Vibration encountered during transportation does not cause leakage, fire or explosion. Do not disassemble, crush, short or install with incorrect polarity. Avoid mechanical or electrical abuse.
Incompatible Materials	Not Available
Hazardous Decomposition Products	This material may release toxic fumes if burned or exposed to fire
Possibility of Hazardous Reaction	Not Available

## Section 11 – Toxicological Information

Irritation	Risk of irritation occurs only if the cell is mechanically, thermally or electrically abused to the point of compromising the enclosure. If this occurs, irritation to the skin, eyes and respiratory tract may occur.
Sensitization	Not Available
Neurological Effects	Not Available
Teratogenicity	Not Available
Reproductive Toxicity	Not Available
Mutagenicity (Genetic Effects)	Not Available
Toxicologically Synergistic Materials	Not Available

## Section 12-Ecological Information

General note:	Do not allow undiluted product or large quantities of it to reach ground water, water course or sewage system.
Anticipated behavior of a chemical product in environment/possible environmental impact/ ecotoxicity	Not Available



Mobility in soil	Not Available
Persistence and Degradability	Not Available
Bioaccumulation potential	Not Available
Other Adverse Effects	Not Available

## Section 13 – Disposal Considerations

Product disposal recommendation	Observe local, state and federal laws and regulations.
Packaging disposal recommendation	<p>Be aware discarded batteries may cause fire, tape the battery terminals to insulate them. Don't disassembly the battery. Completely discharge containers (no tear drops, no powder rest, scraped carefully). Containers may be recycled or re-used. Observe local, state and federal laws and regulations.</p> <p>The potential effects on the environment and human health of the substances used in batteries and accumulators; the desirability of not disposing of waste batteries and accumulators as unsorted municipal waste and of participating in their separate collection so as to facilitate treatment and recycling.</p>

## Section 14 – Transport Information

UN number	2800
UN Proper shipping name	Batteries, wet, non-spillable
Transport hazard class(es)	8
Packing group (if applicable)	-
Marine pollutant (Yes/No)	No
Transport in bulk (according to Annex II of MARPOL 73/78 and the IBC Code)	No information available.
Special precautions which a user needs to be aware of, or needs to comply with, in connection with transport or conveyance either within or outside their premises	





**Transport information: SEALED LEAD-ACID BATTERY is exempt from dangerous goods.** It is considered non-dangerous goods by the U.S. Department of Transportation (DOT), the International Civil Aviation Organization (ICAO), the International Air Transport Association (IATA) DGR 58th, International Maritime Dangerous Goods Regulations (IMDG), or the 《Recommendations on the Transport of Dangerous Goods Model Regulations》 (19th).

**Special Provisions A67** Non-spillable batteries meeting the requirements of Packing Instruction 872 are not subject to these Regulations when carried as cargo if, at a temperature of 55°C, the electrolyte will not flow from a ruptured or cracked case. The battery must not contain any free or unabsorbed liquid. Any electrical battery or battery powered device, equipment or vehicle having the potential of dangerous evolution of heat must be prepared for transport so as to prevent:

- (a) a short circuit (e.g. in the case of batteries, by the effective insulation of exposed terminals; or in the case of equipment, by disconnection of the battery and protection of exposed terminals); and
- (b) unintentional activation

The words “Not Restricted” and the Special Provision number must be included in the description of the substance on the Air Waybill as required by 8.2.6, when an Air Waybill is issued.

Waste batteries and batteries being shipped for recycling or disposal are forbidden from air transport approved by the appropriate national authority of the State of Origin and the State of the Operator.

The only DOT requirement for shipping these batteries is special provision 238 which states:” Batteries, wet, non-spillable”.

Batteries can be considered as non-spillable provided that they are capable of withstanding the vibration and pressure differential tests, without leakage of battery fluid.

Separate batteries when shipping to prevent short-circuiting. They should be packed in strong packaging for support during transport.

**Transport Fashion:** By air, by sea, by railway, by road.

## Section 15 – Regulatory Information

OSHA hazard communication standard (29 CFR 1910.1200)

\_\_\_\_\_ Hazardous

\_\_\_\_\_√\_\_\_\_\_ Non-hazardous

## Section 16 – Additional Information

The information above is believed to be accurate and represents the best information currently available to us. However, concorde makes no warranty of merchantability or any other warranty, express or implied, with respect to such information, and we assume no liability resulting from its use. Users should make their own investigations to determine the suitability of the information for their particular purposes. Although reasonable precautions have been taken in the preparation of the data contained herein, it is offered solely for your information, consideration and investigation. This material safety data sheet provides guidelines for the safe handling and use of this product; it does not and cannot advise on all possible situations, therefore, your specific use of this product should be evaluated to determine if additional precautions are required.

The data/information contained herein has been reviewed and approved for general release on the basis that this document contains no export controlled information.

\*\*\*\*\*End of report\*\*\*\*\*