RECYCLING OF ULABs IN INDIA - Current Environmental Regulations







IBMA Webinar, 14 October 2022





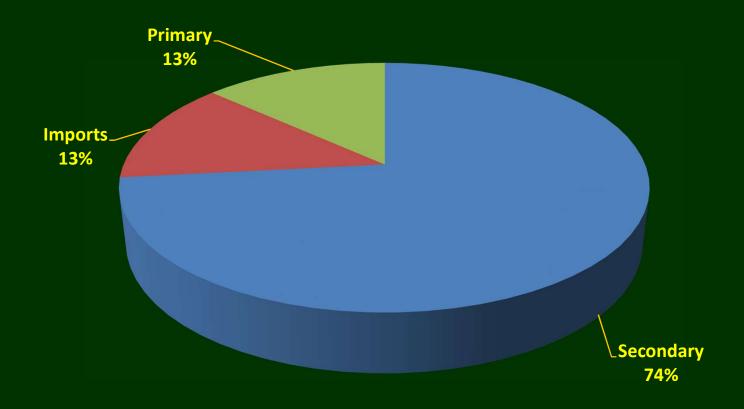
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INDIA'S SECONDARY LEAD SHARE





SECONDARY LEAD INDUSTRY

(million tonnes)

1. No. of Authorized Units : 625

2. Authorized Capacity (2021) : 3.50

3. Secondary Production : 1.10 (Estimated)

Lead Imports : 0.20

Primary Lead : 0.20

4. Total Lead Consumption : 1.50 (Estimated)



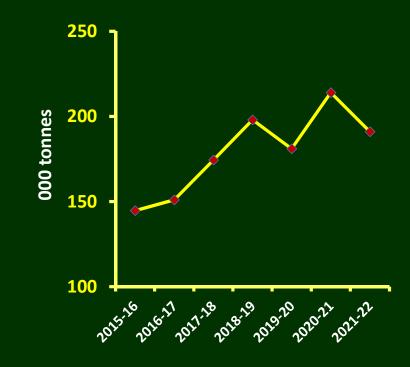
PRIMARY LEAD PRODUCTION - INDIA

(Producer: Hindustan Zinc Limited)

India's

Financial Year: 1 April to 31 March

YEAR	PRODUCTION (tonnes)
2015-16	144653
2016-17	151020
2017-18	174368
2018-19	198000
2019-20	181000
2020-21	214000
2021-22	191000



(Source: HZL)



Battery (Management & Handling) Rules 2001 SALIENT FEATURES

All Stakeholders

(Manufacture, Process, Sale, Purchase, Import, Use)

- Manufacturer
- Dealer
- Reconditioner
- Assembler
- Importer
- Recycler
- Auctioneer
- Consumer (Individual & Bulk)

One-to-one Collection



COLLECTION TARGETS (BMHR)

• I Year (2002) 50%

• II Year (2003) 75%

• After II year 90%



BMHR AMENDMENTS (2010)

- Battery Dealers to Register with SPCBs/SPCCs and File Regular Returns
- Regn Scheme & BMHR Monitoring shifted to SPCBs/SPCCs
- Assembler and Reconditioner Dropped
- Bulk Consumer Defined



MoEF's Initiatives

- Public notification, regulating non ferrous scrap auctions
- Communications to bulk consumers
- Registration of eco-friendly recyclers
- Media advertisement



TOWARDS GREEN RECYCLING

1. Registration Scheme:

- Valid Consents from Regulatory Bodies
- Clean Operations with Air Pollution Control Systems
- Sound Occupational Health Care Systems
- Safe Storage, Transportation etc.,

2. Import of Used Lead Batteries:

- Only authorized units
- Mechanized Breaking System
- Disposal of acid, plastics etc., for safe treatment as per rules
- Prior Informed Consent (PIC)



BATTERY WASTE MANAGEMENT RULES - 2022

- ❖ Superceded BMHR, 25 Aug 2022
- Waste Battery:
 - > Used and/or EOL batteries
 - > Pre-consumer, off spec batteries
 - > Expired Batteries
 - > Discarded batteries
- **Applies to:**

Every producer, dealer, consumer & entities involved in collection, segregation, transport & recycling

Exempts:

Batteries used in defence & space equipments



ROLE OF PRODUCER

- Extended Producer Responsibility (EPR)
- All batteries to be recycled/refurbished (no land filling, incineration)
- To meet collection/recycling/refurbishing targets
- Submit EPR Plan to CPCB (Form 1c), FY 2022-23
- Online registration (Form 1a)
- Certificate of EPR Registration (Form 1b)
- Periodic renewal of Regn
- Deposit Refund/Buyback Scheme
- Annual Returns (Form3), 30 June, next year
- Labelling & Warnings



ROLE OF CONSUMER

- To discard waste batteries separately
- To collection/refurbishment facility
- To obtain GST invoice

ROLE OF PUBLIC BODIES

- To hand over waste batteries to recycling/refurbishment facility only
- To set up own recycling /refurbishment opns



ROLE OF COLLECTORS/SEGREGATORS

- To hand over to Regd recycler/refurbisher
- Facilities, as per CPCB guidelines
- To operate as per CPCB guidelines

ROLE OF REFURBISHER

- To register with CPCB/SPCBs centralized portal (Form 1b)
- Application to SPCBs for one time registration (Form 2)
- Facilities as per CPCB guidelines
- Manage HWs as per HWs Mgmt Rules, 2016 & Solid Waste Mgmt Rules 2016
- To remove waste batteries from old appliances
- Qly returns (Form 4) end of the month to SPCBs
- Details on CPCB portal & own websites



ROLE OF RECYCLER

- Register with SPCBs online centralized portal (Form 2)
- One time registration
- As per CPCB guidelines
- Manage HWs & other wastes as per rules
- Qly returns
- For violations, units debarred

Recovery Targets

<u>BATTERIES</u>	2024-25	2025-26	2026-27 & onwards
Automotive	55	60	60
Industrial	55	60	60
Electric Vehicles	70	80	90
Portable	70	80	90



ROLE OF CPCB

- Charge fee for Regn & share with SPCBs
- Registration in two weeks for 5 years
- EPR details, sharing with SPCBs
- Can suspend or cancel Regn
- Auditing, Inspection & Verification
- Develop mechanism for exchange of EPR Certificates online
- Implementation Committee



EPR CERTIFICATES

- CPCB will issue certificates online portal
- Formula for EPR Certificate
- Not to exceed installed capacity
- Shall include GST details
- Certificates can be sold to producers in exchange of waste batteries
- Environment compensation to be levied
- Corpus to be created



TARGETS FOR AUTOMOBILE BATTERIES

YEAR	COLLECTION TARGET (MIN)	
2022-23	30%	
2023-24	50%	100%
2024-25	70%	by end of 5 years
2025-26	90%	
2026-27	90%	



TARGETS FOR INDUSTRIAL BATTERIES

YEAR	COLLECTION TARGET (MIN)	
2022-23	40%	
2023-24	50%	
2024-25	60%	100%
2025-26	70%	by end of 7 years
2026-27	70%	
2027-28	70%	
2028-29	70%	



TARGETS FOR ELECTRIC VEHICLES (3W /2 W)

YEAR	COLLECTION TARGET (MIN)
2024-25	70%
2025-26	80%
2026-27	80%
2027-28	80%
2028-29	80%
2029-30	80%
2030-31	80%
2031-32	80%

100% by end of 7 years



TARGETS FOR ELECTRIC VEHICLES (4W)

YEAR	COLLECTION TARGET (MIN)
2029-30	70%
2030-31	80%
2031-32	80%
2032-33	80%
2033-34	80%
2034-35	80%
2035-36	80%
2036-37	80%

100% by end of 7 years



CONCLUSIONS

- All Responsibility Fixed on Producers
- Dealers, missing?
- Bulk Consumers?
- Transactions of EPR Certificates?
- Online Regn?
- Onetime Regn?
- Loopholes, to be rectified



ILZDA Welcomes You To:



INTERNATIONAL CONFERENCE ON LEAD & LEAD BATTERIES
 ENERGY STORAGE, E-MOBILITY & ENVIRONMENT
 & 6 December 2022, Hotel Ibis, Aerocity, New Delhi

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