

quirements in place for stack emissions, ambient air levels, minimum production capacity for new and existing recycling plants and occupational exposure limits for airborne emissions and blood lead levels.

There's also a need to attract investment to build efficient facilities with proper emission control technology. Along with these measures, governments should put strategies that should require manufacturers and distributors to take back used batteries in order to consolidate this hazardous waste stream.

Withoutformal collection systems there's no financial incentive for battery recycling companies to invest in suitable infrastructure as they are competing against the informal sector.

As our study shows, land use restrictions in most countries on the continent have been ineffective in separating hazardous recycling plants from residential areas. This has resulted in harm to human health.

The industry needs to be more transparent. Battery makers and recyclers should report emissions and alert the public about soil lead contamination.

The remediation of contaminated soils under these circumstance is complex and costly. The regulatory system should ensure that financial resources are available for the anticipated cost of remediation following plant closure.

Comprehensive awareness programmes about the associated health impacts are critical to the communities since most contaminated sites only come to light after reported deaths or cases of severe lead poisoning are identified.

Perry Gottesfeld, the Executive Director of Occupational Knowledge International, was a co-author of the research and also contributed to this article.

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