

Information exchange on phasing out fluorescent lamps under the Minamata Convention on Mercury

Held on 21st March 2025 in Lusaka, Zambia

Building on the June 2023 workshop “[Transitioning to Mercury-Free Lighting in Asia-Pacific Countries](#)”, the purpose of this Workshop, led by CLIC/CLASP and organized under the umbrella of the Global Mercury Partnership, was to convene a meeting among interested Parties, relevant government and non-governmental observers and experts in lighting, to discuss measures that could be taken to foster the phase out of fluorescent lighting as per [decision MC-5/4](#) of the Minamata Convention.

Key takeaways and lessons learned

Fluorescent lighting phase-out under the Minamata Convention

- In November 2023, at the 5th Conference of the Minamata Convention on Mercury, 147 Parties agreed via [decision MC-5/4](#) to amend Annex A **to phase out most fluorescent lighting by 2027**. This amendment was originally proposed by the African Region to address the challenges posed by mercury-added products such as hazardous waste management, energy efficiency, among others.
- **Entry into force of the COP5 amendments:** In accordance with article 26 and 27 of the Convention, the [COP-5 amendments](#) will enter into force on 25 April 2025 for all Parties, except for Parties who notify the Depositary in accordance with subparagraph 3 (b) of article 27 of the Convention and those who made a declaration with regard to amendment of annexes in accordance with paragraph 5 of Article 30 and did not deposit with the Depositary any instrument of ratification, acceptance, approval or accession with respect to the amendments adopted at COP-5.
- COP4 amendments entered into force on 28 september 2023 for all parties, except the parties who made declarations as per paragraph 5 of article 30, but did not deposit with the Depositary any instrument of ratification, acceptance, approval or accession with respect to the amendments adopted at the fourth meeting of the Conference of the Parties. This means that these COP4 amendments did not enter into force for these parties: **Argentina, Armenia, Canada, Czechia, Ethiopia, Germany, Iran, India, Jamaica, Liberia, Malawi, Maldives, mauritious, Namibia, Peru, Republic of Moldova, Serbia, Seychelles, Suriname, Thailand, Turkey, and United States of America.** <https://minamataconvention.org/en/amendments/2022>

Adoption of Minimum Energy Performance Standards as another compliance pathway to comply with the Minamata FL phase out decision

- **Countries can set technology-neutral efficiency requirements at levels that fluorescents cannot meet.** Large economies around the world have or are in the process of implementing MEPS that are in line with the Minamata convention's fluorescent phase-out. In Africa, two regional blocs EAC and SADC have agreed-upon harmonized efficient standards for lighting, that member states can adopt at the national level, by updating their energy efficiency regulations. The MEPS adoption regulatory pathway will close the loop on mercury in lighting and at the same time ensure market access to high efficiency and quality lighting technologies.
- **Availability of high-quality mercury-free lighting:** Today there is wide availability of efficient LED products as mercury-free alternatives; local importers in many countries are well-positioned to source high-quality LEDs from international markets. Higher efficacy LEDs are a more cost-effective solution in the long run for both consumers and businesses as they reduce energy consumption and have longer lifespans, which reduces replacement costs over time. Longer life spans also lower waste generated.
- **Industry statements confirm that adoption of standards at 90 lumens per watt would allow poorly performing products to remain in the market.** LED lamps with an efficacy range of 50-99 lm/W are generally considered to be of poor performance, while those with an efficacy of 220 lm/W are regarded as top-performing products¹.
- **High efficacy LEDs are available at the same price as low efficacy LEDs.** This trend is consistent in many markets around the world. More efficient lamps are not priced higher, meaning that their affordability is not compromised, nor does it affect importers' profit margins. Considering that the price differential is negligible, countries should aim to steer their lighting market towards high performance mercury-free lamps.

¹ Luminous Efficacy and Useful Lumens: A Comprehensive Guide to Efficient Lighting Design:
https://www.ledrise.eu/blog/led_efficacy_efficiency_explained-lr/?srsltid=AfmBOooXS_s7nto9jlTU5a5Un6FfEQ2Xp7sbEWlp_3OYTVm92ZbCBEJ8
Industry Leading LEDs: https://led-ld.nichia.co.jp/en/product/lighting_757.html
Mid Power LEDs performance comparison test: Nichia 757 LEDs in first place:
<https://www.lumistrips.com/lumistrips-blog/mid-power-nichia-757g-led-test/>

Challenges and opportunities

- **Compliance and enforcement challenge:** Multiple countries already made regulatory decisions to transition to mercury-free lighting but enforcement and compliance remains a major challenge and extra attention should be given to the same. Implementing agencies should collaborate among themselves, and leverage on the available resources and capacity.
- Despite the fluorescent ban, developing and emerging economies are still at a high risk of becoming **dumping grounds for outdated, inefficient mercury-containing fluorescent lamps that are now banned elsewhere.**
- Owing to their **porous borders**, fluorescent lighting as well as low quality LEDs still find their way even in the regulated developing country markets because compliance and enforcement remains a significant challenge.
- **Regional harmonization can result in multiple benefits for Africa to curb the porous borders challenge.** By aligning compliance throughout the Africa region, countries can reduce regulatory costs, promote product safety and facilitate simplified trade for importers, as they would only need to comply with a single harmonised performance standard. Harmonization of compliance can also improve product efficiency as manufacturers focus on innovation targeting a large unified market.

The roles of the manufacturing countries especially China and India are critical for global compliance with the Minamata Convention's decisions

- By fully committing to and supporting the Minamata decisions that were made at COP4 and COP5 to phase out fluorescent lighting by 2027, these two remaining fluorescent manufacturing countries can ensure that the global benefits to protect human health and the environment from mercury-added lighting will be upheld.
- There is need for collaboration among all stakeholders at international, regional and national level in order to effectively say farewell to fluorescent lighting.