The North Atlantic Emission Control Area (AtlECA)

The proposed North Atlantic Emission Control Area (AtlECA) would establish stricter regulations on shipping aimed at reducing emissions of sulfur oxides (SO_x), fine particulate matter ($PM_{2.5}$), and nitrogen oxides (NO_x). These pollutants are a major cause of premature death and disease.

In a scenario where ships use distillate fuels such as **marine gas oil (MGO)** instead of **ultra-low sulfur fuel oil (ULSFO)** to comply with the Emission Control Area (ECA), **PM**_{2.5} **emissions from shipping would be reduced by more than 60%** in the territorial seas of Portugal, Spain, the UK, France, and Ireland; and by **29%-53%** in Iceland, the Faroe Islands, and Greenland compared with a Business-As-Usual (BAU) scenario without ECA regulations. **Portugal is set to lead the charge with a remarkable 68% reduction.**





PM_{2.5} is among the most dangerous pollutants as it can affect our lungs and blood system, causing cardiovascular and respiratory diseases and cancers.



- » The AtIECA could become the largest Emission Control Area in the world, covering about 5.05 million km² of the North Atlantic.
- » MARPOL specifies the criteria for designating an ECA.

Fuel burned in 2021 by shipping in the proposed AtIECA



Key findings

- » The biggest reductions in emissions can be achieved when ships use **distillate fuels** such as **marine gas oil (MGO)** to comply with the Emission Control Area.
- » Using ultra-low sulfur fuel oil (ULSFO) or heavy fuel oil (HFO) with scrubbers is not as effective at reducing sulfur oxides, particulate matter, or black carbon.
- » In 2030, Tier III standards will reduce expected NO_x emissions by about 3% below the Business-As-Usual (BAU) scenario if they apply only to ships built in 2027 or later. A gradual reduction in emissions is expected with fleet turnover. When all ships are retrofitted with Tier III standards, this option would lead to a **potential reduction of up to 71% of NO_x emissions**.

www.theicct.org

communications@theicct.org



@theicct.org