

MARPOL

MARPOL Annex IV - Prevention of Pollution by Sewage from Ships

MARPOL Annex IV aims to prevent marine pollution caused by sewage (wastewater) discharged from ships. Sewage pollution can severely harm coastal ecosystems and pose health risks for humans and marine life.

Scope of Application:

- Applies to ships of 400 gross tonnage (GT) and above, or to ships certified to carry more than 15 persons.
- Covers discharge, treatment, and storage of sewage on board.
- Requires certification, equipment, and recordkeeping.

Definition of Sewage (under MARPOL):

- Human body waste (from toilets, urinals)
- Wastewater from medical premises or animal spaces
- Other wastewater mixed with the above (e.g. greywater from showers and sinks if mixed with sewage)

Key Requirements:

O Discharge Regulations:

Sewage discharge into the sea is strictly controlled. It depends on:

- 1. Ship's equipment
- 2. Distance from the nearest land
- 3. Whether the sewage is treated or not

Discharge is only permitted when:

- The ship is more than 12 nautical miles from land, and
- Sewage is not comminuted or disinfected

OR:

 More than 3 nautical miles from land, if the sewage is comminuted and disinfected using an approved system

AND:

• The ship is en route and follows the conditions in the annex



No visible floating solids or discoloration is permitted

Equipment Requirements:

Ships subject to Annex IV must be equipped with one of the following:

- Sewage treatment plant (approved by the flag state)
- Sewage comminuting and disinfecting system
- Holding tank for sewage retention until proper discharge is allowed

Certification:

- Required for ships ≥400 GT or carrying more than 15 persons
- International Sewage Pollution Prevention Certificate (ISPPC) must be issued after successful inspection

Special Areas:

- Baltic Sea is currently the only designated "Special Area" under Annex IV
- In such areas, stricter discharge requirements apply, and advanced treatment systems may be mandatory

⚠ Port Reception Facilities:

- Ports must provide adequate facilities to receive sewage from ships
- Ships should retain sewage on board if discharge is not allowed

Summary:

MARPOL Annex IV helps protect the marine environment and public health by regulating:

- How sewage is treated
- Where and when it can be discharged
- What equipment ships must carry
- What documentation must be provided

It encourages ships to use modern treatment systems, or to store sewage until it can be safely disposed of at sea or in port.