

Safe & Sound Recycling Official Smploying over 100,000 workers, are:

Turkey



- Pakistan
- Bangladesh
- India
- China



China, Greece and Germany largest sources of Ships for Recycling

The purchase of vessels for recycling makes up 69% of the income earned by the industry in **Bangladesh**, versus 2% for labour costs.

Safe & Sound Recycling his have a limited be span, reflecting economic, technical and occasionally regulatory



30 years - Average life of a ship.



1670 - Average Number of Ships to be recycled every year.



\$400 per ton - Average price paid (\$4–10 million), and the poorer the environmental legislation the higher the price.



Safe & Sound Recycling

Ship recycling contributes to the sustainable development of the environment since every part of the ship can be re-used (ship's hull, machinery, equipment, fittings and even furniture etc).

97% - 98% Amount of Recycled World Tonnage

10% recycled steel covers India's steel needs.

Reprocessing of Steel to become reinforcing rods for use in the construction industry or as corner castings and hinges for containers.





Ships' generators can be re-used ashore.

Batteries can be re-introduced into the local economy.

Safe & Sound Recycling of Ships



Hydrocarbons on board become reclaimed oil products to be used as fuel in rolling mills or brick kilns.



Light fittings find further use on land.



New steel production from recycled steel requires only **one third** of the energy used for steel production from raw materials.



Economic Development

DIRECT through the engagement of local and regional communities where scrapping yard facilities are located.



INDIRECT by the additional employment generated by its associate industries and also by the large scale of trading in second hand equipment and machineries.



Why recycle in developing countries? Costs: Removing the metal for scrap can potentially cost more than the value

Costs: Removing the metal for scrap can potentially cost more than the value of the scrap metal itself (i.e. costs associated with removing asbestos, along with the potentially expensive insurance and health risks, have meant that ship breaking in most developed countries is no longer economically viable).

Litigation: Shipyards can operate without the risk of personal injury lawsuits or workers' health claims, meaning many of these shipyards may operate with high health risks.





Main Obstacle: NEGLIGENCE from National Governments, Shipyard Operators, and former ship owners disregarding the Basel Convention.



Why recycle in developing countries?

Yard owners and local authorities are complicit in attempting to cover up the problem in order to reap the economic benefits.

According to the **Institute for Global Labour and Human Rights**, workers who attempt to unionize are **fired and then blacklisted**. Employees have no formal contract or any rights and sleep in over-crowded hostels.



Child labour is also widespread: 20% of Bangladesh's ship breaking workforce are **below 15 years of age**, mainly involving in cutting with gas torches.



Why recycle in lowever, while the principle of ship recycling is a found the, the working practices and environmental standards in recycling yards often leave much to be desired.

Pressure demanding a **safer and more environmentally** friendly ship recycling industry began building up over the years.

Public Sector has looked for ways to regulate ship recycling with international common standards.





Process five column

Basel Convention

Control of Transboundary
Movements of Hazardous Wastes
and their Disposal

EU Waste Regulation No 1013/2006

- Adopted in 1989 by 184 Parties and entered into force in 1992.
- The Basel Convention protects the human health and the environment against adverse effects that result from the generation and management of hazardous and other waste.
- The Basel Convention focuses on regulating the transboundary movement of hazardous wastes in its effort to protect developing countries from importing hazardous wastes that they are unable to manage in an environmentally sound manner.
- The Basel Convention DOES NOT establish a dedicated system for ships.



Process five column

Hong Kong Convention

for the Safe and Environmentally Sound Recycling of Ships

Ship Recycling Regulation No. 1257/2013

- During its 53rd session in July 2005 the Maritime Environment Protection Committee, agreed that the IMO should develop, as a high priority, a new instrument on recycling of ships with a view to providing legally binding and globally applicable ship recycling regulations for international shipping and for recycling facilities.
- The text of the Hong Kong Convention was developed over three and a half years, with input from IMO Member States and relevant nongovernmental organizations, and in co-operation with the International Labour Organization and the Parties to the Basel Convention.
- Regulations in the new Convention cover: the design, construction, operation and preparation of ships so as to facilitate safe and environmentally sound recycling without compromising the safety and operational efficiency of ships.
- The operation of ship recycling facilities in a safe and environmentally sound manner; and the establishment of an appropriate enforcement mechanism for ship recycling, incorporating certification and reporting requirement.



EU Ship Recycling Regulation No.

These requirements are designed TO PREVENT HEALTH RISKS TO THE WCRKZRS involved and the neighbouring population and to minimise any adverse effects on the environment.

They also provide for **specific training and protective equipment** for employees dismantling the vessels and require a record to be kept of any incidents or accidents.





EU Ship Recycling Regulation No.

"It aims to precent reduce and minimise accidents, injuries and other negative effects on human health and the environment when ships are recycled and the hazardous waste they contain is removed".

- Applies to ALL SHIPS flying the flag of an EU country and to vessels with Non EU flags that call at an EU port or anchorage.
- The ONLY EXCEPTIONS are warships, other vessels on non-commercial government service and ships below 500 GT.
- Sets out responsibilities for ship owners and for recycling facilities both in the EU and in other countries.









Every newship bas to have on board and ventory of the hazardous materials (such as

Every new ship has to have on board an UVENTORY OF THE HAZARDOUS MATERIALS (such as asbestos, lead or mercury) it contains in either its structure or equipment. The use of certain hazardous materials is forbidden.

Before a ship is recycled, its owner must provide the company carrying out the work with **SPECIFIC INFORMATION ABOUT THE VESSEL** and prepare a **SHIP RECYCLING PLAN**. This, for instance, identifies the type and amount of hazardous materials and waste that will be generated from the obsolete vessel.

Recycling may only take place at facilities listed on the "EU List of Recycling Facilities". The facilities may be located in the EU or in non-EU countries. They must comply with a series of requirements related to WORKERS' SAFETY and ENVIRONMENTAL PROTECTION.



EU Ship Recycling Regulation No. n by Ship Owner to Approved Ship Recycling Facility;

- Obligations of Ship Owner (Inventory, Surveys), Member State and Ship Recyclig Facility:
- Notification to National Administration;
- Ship Recycling Plan;
- Ship Recycling Facility: Location (EU / NON EU), Approval for 5 Years, Communication of list to EU Commission.



EU Ship Recycling Regulation No. 125 (120) \$\partial \mathbb{H}_{\text{ALLENGES}}\$

REFLAGGING TO NON - EU FLAGS



Art. 29 of SRR







Thank you.





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