



MARINE ENVIRONMENT PROTECTION
COMMITTEE
46th session
Agenda item 7

MEPC 46/INF.21
15 February 2001
ENGLISH ONLY

RECYCLING OF SHIPS

Environmental contamination in Alang-Sosiya Shipbreaking Yards

Submitted by Greenpeace International

SUMMARY

Executive summary: The attached annex presents a summary of a new investigation of environmental contamination in Alang-Sosiya Shipbreaking Yards, India.

Action to be taken: Paragraph 5

Related documents: MEPC 44/20, MEPC 46/7, MEPC 46/INF.5

1 In June 2000, Greenpeace was officially permitted by the Gujarat Maritime Board and the Bombay Port Trust to enter and take environmental samples from the shipbreaking yards in Alang, Gujarat and Mumbai (Bombay).

2 The results of the analyses reconfirm the results of earlier Greenpeace investigations at these yards in 1998, namely that workers continue to be exposed to a wide range of toxic substances during shipbreaking operations, including heavy metals, asbestos, organotin compounds, and PAHs.

3 The full report of these analyses is being published as:

Environmental Contamination in Alang-Sosiya Shipbreaking Yards

Judit Kanthank, Nityanand Jayaraman
Greenpeace International

4 The summary of the investigation is attached at annex. Copies of the full report are available on request from Greenpeace International.

Action requested of the Committee

5 The Committee is invited to take note of this information.

For reasons of economy, this document is printed in a limited number. Delegates are kindly asked to bring their copies to meetings and not to request additional copies.

ANNEX

**ENVIRONMENTAL CONTAMINATION IN ALANG-SOSIYA
SHIPBREAKING YARDS**

Greenpeace International
Authors: Judit Kanthak, Nityanand Jayaraman

In June 2000, Greenpeace was officially permitted by the Gujarat Maritime Board and the Bombay Port Trust – the Government agencies entrusted with regulating the Alang and Mumbai shipbreaking yards respectively – to enter and take environmental samples from the yards in Alang, Gujarat, and Mumbai (Bombay).

The results of the analyses reconfirm the findings of Greenpeace's October 1998 covert investigation of these yards. If anything, two years of inaction is likely to have heightened the extent of toxic contamination at the shipbreaking yards resulting in increased health risks to workers and communities exposed to the poisons released into the environment from the yards.

Popular pressure from workers unions and environmental groups has led to a positive momentum among various stakeholders. Shipbreakers and even cash-starved shipbreaking countries are prepared to shoulder a part of the responsibility. But the shipowners, whose ranks include many multinationals with stated commitments to environmental and social responsibility, have stoutly refused to have anything to do with decontaminating their ships prior to their export to Asia for breaking.

In a submission dated 31 July, 2000, to the Correspondence Group set up by the International Maritime Organisation's Marine Environmental Protection Committee, the International Chamber of Shipping shrugs off all its responsibility in a swift stroke of the pen: "Working conditions and employee health and safety are not issues which can be determined by shipowners. The issue of worker safety is essentially the responsibility. . . of legislators . . . employers . . . administrators."¹

However, popular sentiment may well go against the recalcitrant shipowners. Across the spectrum – from shipbreakers, Government functionaries, trade union activists to environmental and health activists – support has grown for the demand that the "Polluter Pays," meaning that the shipowners who profit from the operation of the ship for more than 25 years must pay for decontamination before export and safe shipbreaking.

The Greenpeace investigation confirmed that shipyard workers are exposed to a deadly cocktail of toxic substances released during the course of shipbreaking. Heavy metals, asbestos, dangerous levels of organotins, and potentially cancer-causing poly aromatic hydrocarbons (PAHs), contaminate the workplace. The levels of some of the pollutants such as organotins and PAHs in the soil and sediment in and around the yards are high enough to warrant the classification of these soils and sediment as hazardous wastes. Many of the poisons found will end up in the bodies of the workers and remain available in the local environment for long periods of time.

Asbestos, the primary pollutant of concern, was found even in the living quarters of the workers. Given the casual manner in which large quantities of asbestos are stripped from the ships, and the proximity of the workers quarters to the shipbreaking yards, it is highly likely that the asbestos in the quarters is either carried by air-borne dust or by the workers on their clothes.

Investigations conducted by Greenpeace in China and Bangladesh indicate that the conditions in both countries are no different. In fact, Greenpeace investigators observed a consistent pattern of hazardous practices relating to asbestos or insulation removal, torch-cutting and waste management in the yards of China, Bangladesh and India. Our investigators report extensive and visible contamination, and patently unsound work practices in the shipbreaking yards of all three countries. In human terms, that translates, at a conservative estimate, to 100,000 workers in the three countries who are directly exposed to workplace and environmental poisons released during the breaking of contaminated ships-for-scrap.

Dr. Frank Hittmann, the Occupational Health Officer of the German state of Bremen, has publicly stated in an interview with ARD-TV (First German TV) that the lack of safeguards in handling the various contaminants means that every fourth worker in Alang must be expected to contract cancer.² Owing to the fact that many of the poisons released in the course of shipbreaking are persistent and bioaccumulative in nature, the magnitude of environmental and human impacts are likely to be greater than those on the directly-affected workers alone.

However, in response to pressure in recent years, the shipping industry, the shipbreakers and world governments now appear willing to start addressing some of the threats posed by the breaking of toxic ships-for-scrap to the environment and workers. India deserves special mention for the small, but resolute, steps it has taken to unilaterally address the problem. Besides mandating gas-free certificates for all tankers – which has reportedly brought down the number of worker casualties due to explosions and fires – the Indian authorities, goaded by the country's judiciary and a vigilant press, have also begun laying out guidelines for safe work practices and penalties for violations of the same.

Most notable among these initiatives is that of the Gujarat Maritime Board (GMB) which has issued a notification with broad-ranging, albeit largely un-implementable, regulations. In Alang, Greenpeace investigators found a marked increase across the yard in the number of workers using hard-hats, gloves and boots. The yards visited also had basic fire-fighting equipment. Although, the types and numbers of protective gear in evidence is by no means adequate, the increased use of protective equipment indicates that with proper guidance, the authorities and shipbreakers will cooperate to make the changes to improve protection for the workers.

The Gujarat Maritime Board had put up a number of colourful, simple messages encouraging safe work practices among workers. Several shipbreakers had also put up signboards on safety issues, although the language of communication (English) leaves one wondering whether the target audience is the Hindi-speaking worker or the critical visitor.

Ironically, India's unilateral moves to enforce gas-free certification has diverted tanker demolition business to Bangladesh, where such regulations, if available, are not properly enforced. Clearly, anything short of a global regime for decontamination and regulation will merely serve to move the problems from one country to another, rather than solve them.

Experience from industrialized nations indicates that to handle deadly material like asbestos, even when highly sophisticated techniques are used under the supervision of effective regulatory and enforcement machinery by trained workers and watched over by an aware community, health risks to workers and others cannot be ruled out. Clearly, the proposal from various quarters that decontamination should be done at the shipbreaking yards in industrializing countries using better techniques is fraught with danger, given the abysmal state of the enforcement machinery

and the difficulty workers have to assert their rights for adequate levels of health and safety protection.

Supported by this new investigation, Greenpeace demands remain unchanged:

1. The Polluter (Shipowner/operators) must decontaminate the ships-for-scrap prior to export;
2. Shipowners/operators must present a complete inventory of all hazardous material on board the vessel, making a register of the pollutants and analysis of the risks from the ships;
3. Shipbreaking should be conducted without threat to worker or environmental health;
4. Tankers must be made gas-free for hot works prior to export for breaking;
5. Shipowners/operators must disclose the selected shipbreaking facility and the assessment done to ascertain good working conditions and environmental record;
6. Shipowners and shipbreakers must carry out extensive consultations on the breaking plan and put in place expert monitoring;
7. Shipbreaking facilities should be freely accessible by citizen groups, environmental NGOs and trade union activists;
8. Shipbreaking should be subject to a global regulatory regime, rather than a matter of unilateral measures.

Looking ahead, Greenpeace demands that:

1. Existing ships should be made progressively cleaner, by systematically removing, and replacing toxic and hazardous substances during maintenance, repair, refitting and rebuilding programmes;
2. The “next generation” of ships should be “clean ships,” i.e. ships that are designed and constructed with a view to eliminating their environmental and health and safety implications upon decommissioning.

As is evident from the above demands, Greenpeace is opposed neither to the shipping nor the shipbreaking industry. We will, however, actively oppose the export of ships that are not decontaminated, and unsound breaking practices that threaten the health of the environment and workers.

¹ Submission by the International Chamber of Shipping to the “Ship Recycling Working Group” on 31 July 2000

² ARD Erstes Deutsches Fernsehen (First German TV), Report Mainz, November 23, 1998