What's the problem?

Fishermen and boat operators may not be aware of the serious consequences of dumping oil, plastic and other garbage overboard. The ocean has long been seen as limitless and able to absorb anything that's dumped or discharged into it. While much marine debris is washed, blown or dumped from land, a considerable amount is generated from boats.

Plastics, oil and other debris can represent a threat to the environment for many years — in some cases hundreds of years — and can injure and kill marine life. They can endanger humans, damage boats, and cause serious losses to the tourism industry.

How much garbage is out there?

While no one knows for certain, one figure indicates that more than 450,000 plastic containers were dumped in the ocean every day by the world's fleet of merchant vessels during the late 1980s. Walk along any Pacific Island beach and you will see hundreds of plastic items and other debris, providing unsightly evidence of what has become a major problem.



Keep Our Ocean Clean

Where to report pollution

Fishermen should keep an eye out for polluting vessels, including those from distant water fishing nations. If you see a vessel dumping garbage or oil overboard, report them to the local authorities, such as your local Ministry of Environment, Marine Board or equivalent. If illegal dumping is not reported and penalties issued, then it is unlikely to stop and we will all suffer.

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Keep Our Ocean Clean

A message for all those who head to sea

THINK!! don't

Keep Our Ocean Clean

How long does it take to break down?

Many items of marine debris, especially plastics, take a long time to break down and may be lying around our beaches and reefs for many hundreds of years.



Here are some specific examples:

Monofilament line/netting600 years
Polystyrene cups and pellets (used in packing material)500 years
Plastic six-pack packaging rings450 years
Aluminium cans80-100 years
Tin cans50-100 years
Orange peel6 months

Keep Our Ocean Clean



What can I do?

The thoughtless disposal of garbage and oil from vessels is bad because it can:

- kill fish, sea turtles, dugongs, corals, invertebrates and other marine species;
- spoil the appearance of beaches, mangroves and reef flats for both tourists and local people;
- block cooling water intakes, which can damage boat engines, resulting in costly repairs; and
- foul propellers and disable vessels.



It's up to each fisherman and boat owner to take responsibility for making sure his vessel does not pollute.

This can be done by making sure:

- crew and passengers know that throwing trash overboard is wrong and against the law
- notices are displayed onboard that explain how and where garbage should be disposed of
- plastic trash is separated from other garbage and disposed of properly, giving special attention to six-pack rings, bait bands and other garbage with the potential to strangle marine animals
- a drip pan is fitted under the engine rather than letting oil leak directly into the bilge
- oil absorption materials are also placed in the bilge to absorb all oils and fuel
- oil leaks are fixed before they drip into the bilge
- old engine oil is transferred into a container and properly disposed of on shore
- detergent is not used to clean up oil in the bilge (this only disperses it more)

Protect Our Sea



What types of garbage are bad?

Plastic

Plastic is the worst kind of garbage. Its light weight means it can be carried hundreds and even thousands of miles by ocean currents and winds. Plastic is used for

all sorts of purposes on boats, including containers and fishing gear. Such items all have one thing in common: they're not biodegradable. That means nature has a hard time breaking them down.



Plastics found on most types of boats include:

- fuel and oil containers
- plastic bags and sheeting
- fibreglass
- disposable cups, plates and eating utensils
- drink bottles and other containers
- six-pack rings

Additional plastic products found primarily on fishing

- fishing nets and monofilament line
- ropes and twines
- lightsticks used in longline fishing
- plastic and styrofoam floats
- bait box strapping



Other garbage

Many beaches and reefs are strewn with marine and other debris, including glass bottles, tin cans, tyres, light bulbs, old shoes, hospital wastes and so on. Imagine your reaction if you travelled thousands of miles to visit a "pristine" tropical Pacific island, only to find it covered with garbage.



Out of sight, out of mind?

What happens to the garbage and oil you dump overboard?

- Sea turtles often mistake plastic bags and balloons for one of their favourite foods - jellyfish. When they do, they die a slow and painful death because their gut becomes blocked.
- Marine animals such as whales, sharks and dolphins see garbage such as bait box straps and six-pack packaging rings as an item of curiosity and become tangled up or strangled to death as a result of "playing" with them



- Seabirds eat small plastic pellets and bits of styrofoam mistaking them for food such as small fish or squid, which can then cause the birds to die.
- Fish, turtles, and other marine animals can get entangled in derelict fishing gear such as gill nets; this gear can continue to catch fish many years after being lost or discarded.



- Marine animals that encounter nets and other fishing gear may drown, lose their ability to catch food, and be more susceptible to disease and predators.
- Seabirds that get covered in oil often die because when they try to clean themselves they ingest some of the oil, which poisons their liver, kidneys, and intestinal tracts. The oil also destroys the insulating and waterproofing properties of their feathers.
- Oil can destroy seagrass beds, mangroves, corals, crustaceans (crabs and lobsters), molluscs (giant clams and trochus), and other reef organisms by smothering them and cutting off light and oxygen necessary for their survival.





Oil and oily waste

nboard engines tend to leak oil into bilges over time, either because of small leaks from hoses or the engine itself, or because sump oil is drained directly into the bilge. When oil from engines and hydraulic systems accumulates in the bilge and is then pumped out whether at sea or dockside - it causes damage to reefs and other marine life. Don't use detergent to break down the oil as it only causes it to sink when the bilge is pumped, and will harm marine life on the seabed.



Ships running aground provide the biggest potential risk of marine pollution, when massive quantities of oil, diesel, and other contaminants are released directly into the ocean. Most Pacific Island countries do not have adequate equipment or training to cope with an oil spill.

Keep Our Ocean Clean







The garbage you throw overboard may ruin your boat or cost someone else their life

• Items such as rope, fishing line, and plastic bags can easily get tangled around boat propellers and block cooling water intakes, causing major damage and expensive repairs to vessels. With no working engine a boat and its passengers may drift about in the sea with no hope of rescue.

What's the law?

A number of Pacific Islands have signed an international agreement (the International Convention for the Prevention of Pollution from Ships - MARPOL 73/78). This Convention lays down three basic rules:

- Do not discharge oil or oily mixtures into the sea.
- Do not throw plastic products into the sea.
- Do not throw garbage overboard within 12 nautical miles of the nearest land or reef.

As responsible members of the international community, Pacific Island countries support these international laws and some are now implementing national legislation based on these pollution regulations. The Secretariat of the Pacific Community and the South Pacific Regional Environment Programme are assisting countries in putting these laws in place.

