reserves have been created round our mainland coasts covering areas from the warm waters around the Poor Knights to Pollen Island in busy Auckland.

An exception is the Kermadec Islands, a huge reserve some 1000 nautical miles north of New Zealand, which skew the result of these sums. Its 748,265 hectares increase the protected figure to 4 percent of our coastline, but this has little effect on the New Zealand mainland.

The present act operates only over the 'terrestrial sea' which extends offshore for 12 nautical miles from the coast. It does not apply elsewhere, in New Zealand's huge economic zone which extends across the subantarctic and beyond.

ny Forest and Bird member who has been involved in a protracted and expensive bid to get a marine reserve will appreciate there are problems in the application process. Many applications have hit snags and taken forever to get out of the water.

The Government has stated that it wants to protect 10 percent of New Zealand's marine environment by 2010 in a representative network of 'marine protected areas' and, for the first time, this goal appears as Government policy, in the New Zealand Biodiversity Strategy.

Barry Weeber, a Forest and Bird conservation officer involved with marine issues, says this is a step forward, 'but the Government has work to do to achieve this.'

To protect a 'representative network' of marine environments, the Government needs to have a classification of marine ecosystem types, he says. The Department of Conservation has been working on coastal marine classifications for 10 years but still has not released them - and then there is the rest of the Extended Economic Zone to classify as well.

And DoC still does not have a strategy to determine how it will choose which areas to protect, and how it will go about protecting them.

'Because there are no ecological criteria and no strategy, we're working blind and ending up with postage-stamp sized reserves, all close to the coast,' says Barry Weeber. 'We get too much opposition to anything of a decent size.'

'The Government's target is to get 10 percent of the sea into "marine protected There is a debate amongst Government departments as to whether this means marine reserves or other forms of partial marine protection.'

The language needs to be specific. A

marine protected area could include any bit of sea that has any kind of fishing restriction or control on it, such as fishing management regimes managed by iwi. These areas are not protected for conservation purposes and conservation outcomes are not a priority in these areas.

Marine reserves are the most powerful tool for protection of ecosystems and species, generally banning all fishing. Yet provisions in the Act allow for non-commercial fishing at the discretion of the Minister, and this has happened.

The fishing industry — and the Ministry of Fisheries — seem to baulk at any restriction for conservation reasons. But excluding fishing from 10 percent (some scientists suggest, even 20-50 percent) of the marine environment will enhance fish stocks and have a positive, not negative effect, on the fishing industry's catch rates.

That is because protected marine areas function like stud farms — they improve surrounding marine areas for fishing.

Internationally marine biologists are calling for 20 percent of the sea to be established as no-take marine protected areas, by 2020, to protect biodiversity. This call is supported by New Zealand conservation groups.

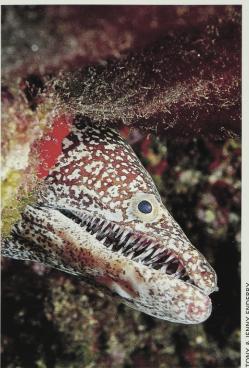
Ten percent is a minimum buffer amount: 'Our big insurance against the many foolish decisions in fisheries management,' as Cath Wallace of Environmental and Conservation Organisations puts it.

Professor Bill Ballantine of Leigh Laboratory has been advocating protection of 10 percent of the marine environment — immediately — for at least 20 years. 'And I'm now saying that fishermen should consider moving it up to 20 or 30 percent, in a representative network, because there's a very good chance that that would suit them better.'

Barry Weeber: 'We need to get a network of marine reserves, including some of the most biologically diverse and productive areas. We should not do as we've done on land — protect the useless bits and wreck all the rest.'

Cath Wallace says that a rewrite of the Act is necessary, but it must be seen in the context of much broader environmental reform.

'The wider reform is that our ethos our attitudes to the sea, and our decisions about the sea - need to change from being almost all about allocating resources, towards considering ecosystems and safeguarding their future.'





At top, mosaic moray, and above a colourful nudibranch, or sea slug, photographed at the Poor Knights Marine Reserve, off Northland. A current from the north brings warm conditions here and the reserve hosts occasional visitors from subtropical seas.

n December 1999, the Parliamentary Commissioner for the Environment recommended in its marine report that the Marine Reserves Act be reviewed.

DoC is to release a public discussion document shortly but a date was not available when we went to press. An amendment bill may be before Parliament by mid 2001.

'The scope of the review is broad,' says Jim Nicolson, principal policy analyst at DoC. 'We're not looking to rewrite it, but to clarify its purpose as a protection tool.'

## The review is considering:

1. Clarifying the purpose of the Act to reflect its use as a conservation tool. The Act was originally formed with impetus from Auckland University scientists who wanted to protect a marine area near Leigh in lower Laboratory Northland. Consequently, the Act states that reserves