

Navakavu Locally Managed Marine Area

Viti Levu Island, Fiji

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Site and Project: The Navakavu LMMA is the fishing ground for four villages: Nabaka, Nammakala, Muaivuso and Waiqanake. The peninsula where the LMMA is located is surrounded by a fringing coral reef, mangroves, and remnants of coastal littoral forest. Coral reefs and mangroves, providing coastal protection against storms and flooding, have a significant indirect use value to local villages where cyclones and tropical storms occur relatively frequently. In addition, given the basic infrastructure in the four villages of the Navakavu area, it is considered that

the waste assimilation function of mangroves is important. Organic nutrients, such as those from human and animal waste, may be retained and recycled by mangroves, which effectively act as a water purification system. Other important indirect use values include the provision of habitat and refuge for marine species, and maintenance of biodiversity.

Local communities have exclusive right to extract fish and other resources from their fishing ground. In 2002, in

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response to concerns about declining fish catches, the community set up a "no-take zone" with the assistance of the Fiji LMMA network and the University for the South Pacific.

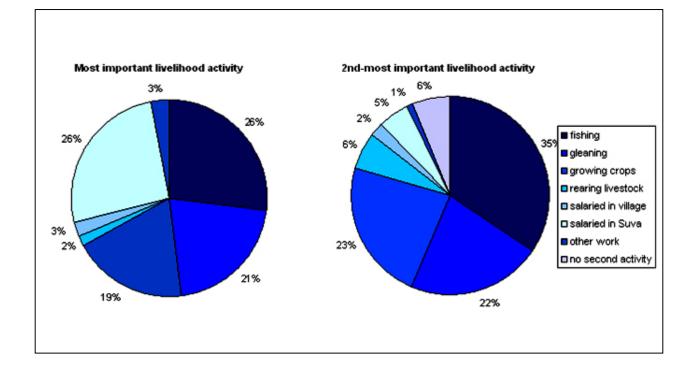
Benefits: DThe economic benefits of this LMMA are linked with fisheries, coastal protection, waste assimilation, research and education as well as bequest values.

A simple analysis of changes in finfish catches between mid-2002 and late 2006 suggests that there has been an average increase of 3% in finfish catch, most likely thanks to the establishment of the LMMA in January 2002. The value of these changes to the local community comes to about US\$ 28,700. It is expected that the economic benefit to local villages from the LMMA will continue to increase, as finfish and invertebrate catches continue to increase for several years.

To estimate the total economic value of key goods and services provided by the Navakavu LMMA, a study has been carried out. Results show that the Total Economic Value (TEV) of the coastal ecosystems within the Navakavu LMMA is about US\$ 1,700,000-1,800,000 per year. Due to this TEV, these ecosystems are worth protecting as they provide many livelihood activities and therefore economical benefits to the communities (Figure below).

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