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## Project Profile

### **Blue Ventures Conservation Community marine turtle conservation in Southwest Madagascar**

#### **Background**

Southwest Madagascar's remote Toliara region contains some of the most biodiverse coral habitats in the Indian Ocean, but also supports Madagascar's largest traditional fishery, with 20,000 fishers operating in the province. Artisanal fishing is one of the primary causes of direct reef damage (Nadon *et al.*, 2007; Ahamada *et al.*, 2008) and unsustainable biomass removal but is also the principal source of income for the indigenous Vezo coastal communities. Protecting the region's biodiversity is therefore inextricably linked to promoting more sustainable resource use. Blue Ventures Conservation and the local community are currently leading efforts to protect and manage marine turtle fisheries in the region.

#### **The traditional marine turtle fishery in Madagascar**

Five species of marine turtle inhabit Madagascar's coastal waters, green (*Chelonia mydas*), hawksbill (*Eretmochelys imbricata*), loggerhead (*Caretta caretta*), olive ridley (*Lepidochelys olivacea*) and leatherback (*Dermochelys coriacea*) turtles. The Vezo population of southwest Madagascar actively fish for and consume all five. Decline in turtle populations in this region has been documented previously by Rakotonirina (1987), who reports

declines in numbers of nesting green, loggerhead and hawksbill turtles. The fishers exploit both the nesting populations as well as the foraging aggregations.

Turtle hunting is considered an important cultural Vezo activity and has several associated ancestral rituals. Traditionally turtle fishing had several restrictions that had to be observed by the hunters in order to catch turtles, although many of the rituals related to the preparation of the meat. Whilst some still observe the traditions or parts of them, there has also been a relaxation of traditions and restrictions, especially where new methods have been used. There are also currently no conservation strategies in place to monitor or manage the traditional subsistence turtle fishery.

#### **Project Objectives**

In October 2006 the first phase of turtle research and conservation programme was initiated in Andavadoaka region, 200 km north of Toliara.

The project objectives are to:

1. Profile the regional turtle fishery;
2. Locate and monitor any nesting sites in the region;
3. Increase awareness of marine turtle conservation issues;



**Figure 1:**

- a.** A community meeting with the village of Lamboara, near Andavadoaka, to discuss the protection of the nesting beach.
- b.** The community marks the nesting beach with a flag and performs traditional rituals to their ancestors.
- c.** Sign constructed to inform other fishers that the beach is protected and that overnight camping is no longer permitted.

Photos: Blue Ventures Conservation, 2008

- 4. Evaluate current awareness of turtle protection legislation;
- 5. Determine the importance of the turtle fishery to the community;
- 6. Develop community-led management strategies for turtle conservation.

**Project results and future objectives**

The research programme has seen widespread support and now monitors the turtle fisheries in 24 villages in Andavadoaka and expanded to the Morondava region, a further 200 km north of Andavadoaka. Turtle fishermen voluntarily report their catch to local fishermen that act as data collectors for the project. The first two years of the project has yielded significant achievements in accurately profiling the extent of the turtle fishery within the region and in starting to promote the idea of management of the traditional fishery. As a result of awareness-raising work, two green turtle nests were protected and successfully hatched – the first known to have done so in the region since 2003 - and led to the community-led protection of the nesting beach.

Blue Ventures is also working to coordinate the implementation of a community-run network of marine protected areas in the Andavadoaka

(Velondriake community marine protected area) and Morondava regions (Kirindy Mite National Park) and this project aims to integrate a local framework for turtle fisheries conservation and management into both. The success of this project will contribute to several themes of the IUCN Global Strategy for the Conservation of Marine Turtles, as well as enhancing understanding of the marine turtle populations in southwest Madagascar feeding into regional and global conservation strategies. However, the most substantial and long lasting contribution that the project will make to nature conservation is through a shift in the attitudes towards the marine turtle fishery amongst the Vezo people. There has already been the first step in community-led management strategies through the protection of a nesting beach and the next steps must now be taken to promote sustainable exploitation.

**Information**

Blue Ventures Conservation ([www.blueventures.org](http://www.blueventures.org)) is a UK-based NGO dedicated to facilitating marine conservation and research. Based in southwest Madagascar, Blue Ventures Conservation aims to establish a sustainable and community-led approach to marine conservation by steering ecological research towards goals that

aid the socio-economic development of the region. Blue Ventures collaborates with the Marine Turtle Research Group ([www.seaturtle.org/mtrg](http://www.seaturtle.org/mtrg)) at the University of Exeter on its turtle research and

conservation program.

For more information please contact Frances Humber ([frances@blueventures.org](mailto:frances@blueventures.org)).

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## NGO Profile

### **Marine Conservation Society, Seychelles (MCSS): An integrated approach to marine turtle management in the inner islands, Seychelles**

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#### **Introduction to the Marine Conservation Society, Seychelles (MCSS)**

The Marine Conservation Society, Seychelles (MCSS) is a Non-Governmental Organisation (NGO) that was registered in 1997 in Seychelles, Western Indian Ocean. MCSS was formed by a group of local marine experts to meet the lack of capacity in Seychelles and to address matters of marine biodiversity, conservation and sustainable use. MCSS remains to this day the only Seychelles based NGO dedicated exclusively to the conservation and sustainable use of marine biodiversity.

In 2000, the MCSS successfully obtained funding from the Global Environment Facility for a three year project focused primarily on the management of coral reefs, whale sharks and marine turtles

following the severe bleaching event of 1998.

The MCSS has pioneered conservation actions in Seychelles through a number of highly successful projects including monitoring the whale shark (*Rhincodon typus*), management of the Crown-of-thorns-starfish (*Acanthaster planci*), the installation and maintenance of environmentally friendly moorings systems, a strategic approach to marine turtle management, the development of marine eco-tourism activities and the sustainable use of marine biodiversity in general.

MCSS bases its work on a policy of open engagement of actors in the domain of marine conservation, sustainable use and development. It works closely with local partners, such as the Ministry of Environment, Natural Resources