

Beach Management and Coastal Tourism Development in Ngu Hanh Son and Son Tra Districts of Da Nang City, Viet Nam

Nguyen Dieu, Pham Thi Chin*, and Do Mang Thang

Department of Natural Resources and Environment, Da Nang, Viet Nam
 15th Floor, Da Nang Administration Centre Building
 24 Tran Phu Street, Da Nang, Viet Nam

Key Message

- Effective beach management and sustainable tourism development in Ngu Hanh Son and Son Tra districts were greatly enhanced through an integrated coastal management (ICM) program of Da Nang City.
- A clear vision, policy and legislative support, as well as integrated planning and management were critical to addressing multiple use conflicts and achieving measurable benefits through sustainable tourism.

Endowed with rich marine resources, these two districts were a logical choice to be the focus of Da Nang City’s tourism development. The city hoped that by boosting tourism in these areas, as detailed in the socioeconomic development master plan, it would subsequently stimulate economic growth for the city.

In 2000, Da Nang City was selected as a national demonstration site for ICM. The project aimed to strengthen capacity in managing and protecting coastal resources for sustainable use while promoting development potential.

Abstract

Viet Nam’s Ngu Hanh Son district is largely associated with the Marble Mountains and Non Nuoc Beach, while the Son Tra district is known for the Son Tra Peninsula, a natural reserve with huge ecotourism potential for activities such as mountain climbing, scuba diving, and fishing.

This case study introduces beach management and coastal tourism development in the Ngu Hanh Son and Son Tra districts, and how they were developed as part of the overall ICM program of Da Nang City.

Valuable lessons learned from this initiative are evaluated.

* Email: chinpt@danang.gov.vn; chindng@gmail.com



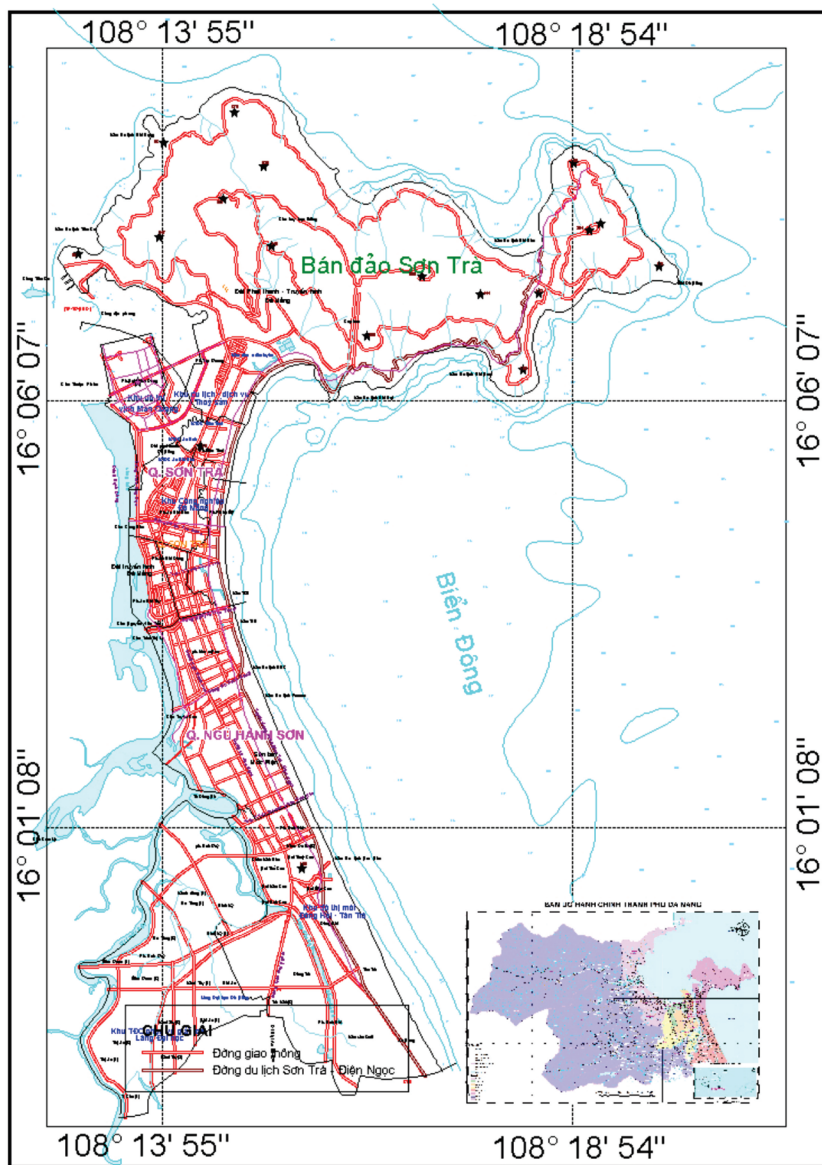
This case study is part of the book: Chua, T.-E., L.M. Chou, G. Jacinto, S.A. Ross, and D. Bonga. (Editors). 2018. Local Contributions to Global Sustainable Agenda: Case Studies in Integrated Coastal Management in the East Asian Seas Region. Partnerships in Environmental Management for the Seas of East Asia (PEMSEA) and Coastal Management Center (CMC), Quezon City, Philippines.

Background

Son Tra district is located east of Da Nang City, stretching along the right bank of lower Han River on its west, and bordered by the East Sea to the east, Tho Quang Bay to the north and Ngu Hanh Son district to the south (Figure 1).

Son Tra district supports important coastal ecosystems including coral reefs and sandy beaches, thus providing favorable conditions for coastal ecotourism development.

Figure 1. The Ngu Hanh Son and Son Tra districts.



Son Tra district also hosts an international seaport, a major facility for the city's maritime transport services, where warehousing and stevedoring activities offer significant employment opportunities.

Ngu Hanh Son district is located southeast of Da Nang City, roughly 8 km from the city center. It is bound by the East Sea to the east; Hoa Vang, Cam Le, and Hai Chau districts to the west; Son Tra district to the north; and Quang Nam province to the south (Figure 1). It has close to 37 km² of natural area, about 40% of which is agricultural land.

Ngu Hanh Son district has natural forests in Marble and Non Nuoc mountainous areas, and diverse natural vegetation with relatively large, year-round cover along the coasts of Marble Mountains.

The South Sea area of Ngu Hanh Son district is a major fishing ground of Quang Nam Province, offering high value marine harvests such as fish, prawns, squids, clams, abalones, and seaweeds. The district is located in the lower delta of Co Co and Cau Bien Rivers, hence creating a brackishwater environment, conducive for aquaculture development.

The year-round warm climate, fine-sand beaches, historical monuments, and famous landscapes such as the Marble Mountains (symbol of both Da Nang City and Ngu Hanh Son district), were ideal for coastal ecotourism development (Figure 2).

Over the past years, the coasts of Ngu Hanh Son and Son Tra districts were utilized for multiple economic activities including tourism services, maritime transport and port operation, fishing and aquaculture practices, development of coastal industries and infrastructures as well as housing developments for residential use. These activities were causing environmental degradation and loss of natural habitats, for example:

- a. While majority of the district's coastal residents relied on fishing and coastal aquaculture, many fishers were employing destructive fishing gears such as electric fishing and fishing rakes which were harmful to the sustainable harvest of fish resources.
- b. Many coastal stakeholders were typically uncooperative, especially for coastal land and resources uses which did not conform to the city's land use and development plans.

Figure 2. Scenic attractions at Ngu Hanh Son (a) and Son Tra (b) districts.



(a)



(b)

As a result, unregulated use of the coastal areas often resulted in conflicts especially in zones designated for specific use, and in areas assigned for multipurpose activities. Industrial, aquaculture, and tourism establishments rarely observed zoning requirements. Overlaps and conflicts likewise occurred among various sectors' activities including those of maritime transport, port development, fishing, aquaculture, tourism and urban development as well as those related to environmental protection and biodiversity conservation.

The rapid growth of tourism and allied services in the coastal areas of Son Tra and Ngu Hanh Son districts pose further environmental concerns as the current wastewater treatment facilities are inadequate to fully control discharge into the adjacent coastal waters, especially those from nonpoint sources. In addition, seafood contamination as a result of increasing seafood demand and inadequate health safety measures, further pose new threats to public safety. The influx of aquaculture infrastructures to accommodate increasing demands from old and new hotels and restaurants along the coast not only changed the coastal landscape but also triggered soil erosion in some parts of the coast.

Conventional land use plans did not appear to have adequately considered land-sea interaction, thus missing the crucial impacts and potential of the sea. Moreover, the master plan for Da Nang City's development was silent on coral reefs and seagrass beds, and as such contributed to the continuous deterioration of these important coastal ecosystems.

The lack of a multidisciplinary approach and knowledge on the interconnectivity between land and sea also contributed to inadequate or poor management of the city's coastal areas. As the pressures on the use of space and resources in the coastal areas continued, life in the coastal community became more challenging due to the loss of living resources and damage to the ecosystems.

Approach and Methodology

In 2000, Da Nang City started to implement a national demonstration project on ICM which introduced a new and comprehensive coastal governance and management approach. Key activities undertaken included: (a) profiling the socioeconomic, cultural, legal, and environmental conditions of project site; (b) conducting public awareness campaigns and promoting stakeholder participation; (c) developing a coastal strategy and coastal use zoning plan; (d) establishing a coordinating mechanism to reduce policy and management conflicts among agencies; (e) establishing an integrated environmental monitoring program (IEMP); and (f) developing the capacity of local staff to support plan implementation. The ICM approach provided a sustainable development framework and process which allowed the city government to achieve its sustainable development objectives over time using its own human and financial resources. Both Ngu Hanh Son and Son Tra districts were covered by the project and therefore benefitted from its development and execution.

On 10 October 2005, the People's Committee of Da Nang City approved the coastal use zoning plan through Decision No. 7825/QDUB. Prior to its development, the land use and sectoral development plans of Da Nang City had excluded the marine and coastal areas (PC, Da Nang City, 2005).

Da Nang City's coastal use zoning initiative was aimed at improving the effective planning and management of its coastal space and natural resources and at optimizing the coastal area's potential for sustainable development.

The zoning plan provided for tourism development of Son Tra–Dien Ngoc coast. It covered the beaches of Nom, Con, and Trem, including waters within 300 m of the coastline. Also identified were the tourism spots around Son Tra Peninsula (coast,

beaches, and about a square kilometer of seawater) and Bac Tien Sa, located along the eastern shore of Da Nang Bay.

Coastal management of Da Nang City was guided primarily by the following strategies:

- a. Develop Da Nang coast into a major tourism area within its capacity, both at national and regional levels;
- b. Conserve and protect the landscapes and ecological values of the coast, especially in Ngu Hanh Son area;
- c. Maintain stability in the coast and mitigate risks of erosion, flooding, and groundwater contamination;
- d. Limit economic development in high-risk or sensitive ecosystem areas; and
- e. Ensure public or community access to public beaches.

This case study places its focus on strategies a, b, and e as they relate to Son Tra and Ngu Hanh Son districts.

Results

Prior to the approval of Da Nang City's Coastal Strategy in 2001, relevant sectors and district governments proposed to enact the necessary legislation(s) to regulate the use of coastal and adjacent marine areas as well as the natural resources therein. The Department of Agriculture and Rural Development likewise sought the city government to issue regulation on the management and conservation of coral reefs and other coastal habitats from Hon Chao to South Hai Van and Son Tra peninsula. The Department of Natural Resources and Environment advised the city

government to issue regulations on ICM for Son Tra and Ngu Hanh Son districts.

In response, the city issued regulations on fisheries and protection of coastal aquatic resources, particularly in mitigating the negative impacts on spawning and nursery grounds. It also enacted specific guidelines for managing fishing activities and aquaculture practices in the inland and coastal waters, as well as guidelines for regulating pertinent business and service activities related to the use of beaches particularly for environmental protection and preservation of beach landscapes.

Various initiatives from stakeholders also supported the city's efforts in sustainable management of the coastal areas. Relevant sectors and district governments stepped up their information and education campaigns especially at community levels. They also conducted activities to facilitate surveillance to protect and conserve forest and fisheries resources. Projects to recover and improve coral reefs and seagrass beds in the waters surrounding Son Tra peninsula and Ngu Hanh Son areas were implemented. Similarly, local fishers were encouraged to take up new livelihoods to reduce excessive fishing efforts.

The city government officially decided that Da Nang will be transformed into an Environmental City by 2020. This policy decision greatly enhanced the efforts of district governments to include environment protection and conservation as a crucial component of sustainable economic development programs.

A major effort was to improve fisheries management by regulating fishing and controlling illegal fishing. The local authorities implemented the following:

1. Five new ships were built for offshore fishing worth VND 3.2 billion (US\$ 145 thousand), along with the following assistance: (a)

insurance premium to some 3,000 crew members of fishing vessels with a capacity of over 50 CV (*cheval vapeur*); (b) sea products storage; and (c) aid to fishers switching jobs or give support equivalent to roughly VND 4 billion (US\$ 182 thousand);

2. Linked up with various organizations and enterprises in building 183 houses for fishers, and assisted in the implementation of three welfare projects valued at more than VND 8.2 billion (US\$ 372 thousand);
3. Constructed four safety/rescue stations to support the operations of 660 fishing boats, 42 of which were for offshore fishing;
4. Motivated relevant line agencies to implement key decisions and new regulations including: (a) Decision No. 06/2005/QD-UB, which regulates organized fishing; (b) Directive No. 08/CT-UBND issued on 3 April 2006, which prohibits the use of rakes in fishing and other illegal fishing activities in Da Nang City's coastal area; and (c) Decision No. 8329/QD-UBND dated 19 October 2007, which seeks to develop and protect the aquatic resources from 2010 to 2020; and
5. Promoted sustainable aquaculture practices in areas allocated for aquaculture practices in the zoning plans. Consequently, aquaculture production reached 913 tons in 2010 – an increase by more than 160% compared to 1997. The total value from aquaculture production increased by 85%, estimated at VND 360 billion (US\$ 16 million).

Driven by the Coastal Strategy, the city was able to collect and treat wastewater at its centralized treatment station, hence reducing waste discharge into the coastal waters. Many of its recreational beach areas, in particular those along the coast of Son Tra and Ngu Hanh Son districts, benefited

since many point-source pollutants could be controlled.

In line with the government's thrust to develop coastal ecotourism, relevant line agencies have either rehabilitated or constructed coastal roads, making it easier to promote designated coastal areas for tourism. The influx of tourists provided livelihood opportunities to those living in the coastal communities of the districts. Former fishers became resort staff after training, while some trained on fine arts/handicrafts. Others became involved in providing services in hotels, restaurants, and parking places near the beaches. However, the city imposed regulations, such as restrictions on tourist infrastructure (i.e., not to develop more than 30% of total area), greening requirements in resort areas, solid waste collection, etc.

Thousands of fishers transferred to new housing, and got employment in public and tourism services. Consequently, Da Nang City was able to set the stage for effective tourism development including building infrastructures and tourist facilities.

With increased public awareness, beach management gradually improved the conditions of the beaches, which became clean and clear of beach vendors and litter. In 2005, Forbes Magazine cited the coast along Son Tra and Ngu Hanh Son districts as one of the six most beautiful beaches in the world.

The convergence of Ngu Hanh Son's natural beauty, the near-mystical charm of the Marble Mountains and the coastal road which connects with Hoi An, (an ancient town in Quang Nam province) attracts thousands of domestic and foreign tourist as well as investors who confidently built world-class resorts. Da Nang City could now boast of having the finest beaches with an excellent road network, top-class facilities, and a scenic landscape ideal for the booming vacation resorts.

More tourists mean more jobs especially for the locals, and increased revenue to the districts and the city. To help fishers switch to a more sustainable livelihood and reduce their dependence on nearshore fish resources, the Da Nang Department of Agriculture and Rural Development implemented a transition support program in 2011. Six pilot fisher-households in Son Tra district received nearly VND 400 million (US\$ 18 thousand) worth of assistance under the program. It introduced a new group-fishing scheme, replicated later on in other coastal districts of the city.

According to Mr. Dang Van Phu Em, a program participant and resident of An Hai Tay commune, Son Tra district, each of their 6-7 day fishing trips generated VND 400 million (US\$ 18 thousand) in gross revenue, or an equivalent to VND 260 million (US\$ 11 thousand) net profits.

Lessons Learned

The following key lessons were learned from the above initiatives:

1. Sustainable coastal development is the guiding principle that enables the local government to consider not only economic growth but also environmental integrity and social benefits. ICM provides a broad, holistic planning and management framework that ensures adequate interagency coordination as well as policy and management integration. The vision towards an environmental city has generated not only the direction for future development but also set the target for city planning and implementation.
2. With the broad city development framework and direction, district governments could reap not only social and financial benefits but also collective support in the conservation and

protection of their coastal ecosystems. District governments could play active and cohesive roles under a larger local government framework.

3. The experiences of Son Tra and Ngu Hanh Son districts have demonstrated that regulatory measures and management interventions are necessary in addressing multiple uses in coastal areas. While zoning plans reflect not only the best use of the ecological potentials, appropriate measures are needed to address current dominant uses such as fishing. Support and participation of the stakeholders are also critical.
4. Both districts have been able to take advantage of city policy in ecotourism development to bring about major reforms of the coastal communities not only to sustain fishing as one of the major economic activities but also transform local tourism into a major industry with significant increase in domestic and international tourists.
5. The construction of the coastal roads has certainly facilitated transportation and effectively prevented damage to coastal areas caused by unrestricted entry of vehicles and use of coastal lands. There is evidence of improvement of quality of coastal water and reduction in sediment discharge, and restored habitats in Da Nang Bay. Some wetland areas along the rivers that were previously pollution hotspots and a source of diseases have now become modern residential areas with parks for public recreation.

Reference

- PC (People's Committee), Da Nang City. 2005. Coastal Use Zoning Plan. People's Committee of Da Nang City, Viet Nam. (In English and Vietnamese). 58 p.

