

THE EFFICACY OF CITIZEN PARTICIPATION IN ENVIRONMENTAL CONSERVATION: LESSON FROM TWO CONTRASTING EXAMPLES

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ABSTRACT

The intrusion of visitors in excessive number and poorly managed tourism may cause to disturb the biodiversity and the ecosystem of any area and thus can be one of the prime movers to create imbalance in the natural environment of any locality. Upon empirical studies, this understanding and environmental consciousness came late in the last century and it came fairly strongly. Realizing the negative impact of uncontrolled tourism, effective initiatives are being taken in many parts of the world. The conviction of the knowledgeable quarter is that a high level of awareness about the environmental conservation and the direct participation from the part of citizen in sustainable management of resource is pivotal in conserving environment and thus to keep a balanced biodiversity and ecosystem. This article was written on basis of the basis of both quantitative and qualitative data. Working with two contrasting examples, this article showed the importance of intervention from the part of both central and local government. Focusing on tourism, it displayed that a careful regulation for tourism activities was immensely needed in conserving environment. It unveiled the efficacy of citizen participation as well. In fact, it was revealed that broader engagement of the local citizens and proper management of the environmental resources would be the two main pillars in safeguarding environmental degradation among others.

Keywords: Biodiversity, Environmental Conservation, Local Citizens, Citizen Participation.

INTRODUCTION

Despite numerous initiatives to rein environmental degeneration in present days, there is no denying that the environment and the societal progress are inversely interrelated as the biodiversity and ecosystem of environment gradually get worse with the advancement of the society and civilization. In recent years, hundreds of succinct instances to disturb the balance of nature attracted the attention of the global community including the environment scientists. Owing to this reason, retaining a sustainable environment has become a global concern since the latter half of the last century. As a succession of numerous steps, the Goal 15 of the Sustainable Development Goals (SDGs) set to ensure environmental sustainability. The

related targets (Targets 15.1 to 15.9 and 15a, 15b & 15c) were set to reverse and protect the loss of ecological, biological and environmental resources (SDGs 2030: UN).

With the increased number of well-off citizens and improved connectivity, tourism and frequent travelling has been increased astonishingly in recent times. While higher number of tourists can bring a positive result as far as economic and cultural value is concerned, it may bring many hazards in different dimensions as well. Such hazards could be brought either vividly or obscurely or in both ways. It has already been proved that the presence of excessive number of tourists in any area can lead to disturb the balance of nature and can jeopardize the natural equilibrium as a whole. That is why, globally, this is being considered as one of the grievous unconventional threats.

To keep the negative impact of such unconventional threat to a minimal level, it requires multi-dimensional initiatives. Government's role, more than any other else, is pivotal to keep intact the biodiversity and ecosystem of any environs and thus to conserve the sustainable environment. It can promote deliberate effort to minimize the harmful human impacts on the natural environment. Government can take necessary action to raise public awareness about the impact of excessive number of tourists and tourist activities. For instance, government can impose pollution tax or/and tourist tax to dissuade excessive number of visitors and thus can promote broader environmental protection. Moreover, government can support capacity building program at the grass root level in order to enable local and regional authority to better respond to the challenges of environmental degradation. It can encourage and promote the voluntary initiatives as well. Furthermore, government can regulate the activities of various sub-sectors including hotel and catering, transportation, travel agencies and tour operators. Bringing and fitting environmentally sound technology from other countries can also be applied in tourism sector, if deemed necessary.

Complementing with the government initiatives, the local authority and the local citizens can and should play a vital role in conserving the environment of their locality. For instance, the indigenous knowledge of the local government and local citizens of the tourist prone places could be used to reduce the burden of the central government. After all, local citizens can use and nurture the nature efficiently than anyone else. As we perceived, the initiative by the local government and the local citizens of 'Kunigami village' of Okinawa Island, Japan is one of such good efforts. On the contrary, with the same nature of problem, the local government and the citizen in the area of 'Madhabkundu Eco Park', Sylhet, Bangladesh were not performing due role to settle the problem. Depicting the contrast between these two cases, this article explored the efficacy of community involvement and local management in environmental conservation and alongside extracts some striking lessons.

LITERATURE REVIEW

(a) *Why Environmental Conservation necessary?*

When we talk about environmental conservation, it comes the issue of biodiversity and ecosystem. In other words, the concept of 'biodiversity', 'Ecosystem' and the 'Environmental Conservation' are interlinked with each other. 'Biodiversity' or 'Biological Diversity' narrates the coexistence of animals and plants in any specific area. Oxford Dictionary defines, "Biodiversity is the existence of a large number of different kinds of animals and plants which make a balanced environment". According to the 'Convention on Biological Diversity (1992)', biodiversity is defined as "the variability among living organisms from all sources including terrestrial, marine and other aquatic ecosystems and the ecological

complexes of which they are part; this includes diversity within species, between species and of ecosystems (Article 2:pp 3)". On the other hand, all the plants and living creatures in a particular area considered in relation to their physical environment is called as 'Ecosystem'. Again, the 'Environmental Conservation' could be elucidated as the protection of environment. Since the environment means the natural world in which people, animals and plants live; striving for environmental conservation means striving for protecting biodiversity and ecosystem. It means ensuring biodiversity or ecosystem or protecting environmental conservation have the same spirit and purpose.

There is no denying that degradation, by any means, causes threat to biodiversity and ecosystem of a given locality. It put paramount pressure on endangered species and can damage local ecosystem in extreme cases. It is evident that lack of consciousness, shortage of caring mentality and overuse of natural resources are some of the reasons that biodiversity and ecosystem is increasingly getting worse. Thus, no one but the human being is behind the chief cause of hurting biodiversity or ecosystem. It is already been proved that unharmed biodiversity and ecosystem is crucial as to keep the existence of all species including mankind. An imbalance in biodiversity and ecosystem can cause huge cost which even can lead to wiping out the endangered species and can jeopardize the human existence as well. Thus for sustainable development and for human existence, protection of biodiversity and ecosystem and thus the environmental conservation, as a whole, is pivotal. The contemporary world community has shown some great efforts in different parts of the world. One such example would be the adoption of National Environmental Management Act, 1998 in South Africa. As a main component of this Act, input of the environment conscious citizens was secured through consultation before forming the Act (Environmental Evaluation Unit, University of Cape Town).

(b) An Unconventional Environmental Problem: A Matter of Concern

It is easily understood that the ecological disturbance in any area could be occurred by excessive number of visitors/tourists or occupier or the intruders who come and may exploit natural environment unscrupulously or unconsciously. Within a country, the wealthy people may visit beautiful and resourceful areas bringing many tourist activities that may hamper the natural balance of environment. Moreover, tourists of developed country also visit beautiful places of other countries. When visitors visit any place they bring a lot of activities, both in positive and negative way. Along with disturbing the serenity of any locality, tourist activities pollute the surrounding in numerous ways. It can disturb the co-existence between the flora and fauna. Excessive number of visitors can even act to damage the harmony and can threat the survival of already endangered species living in any area. The presence of tourists in any locality can cause different harms like land contamination, disruption of wildlife behavior, generation of excessive waste or disruption of animal migration etc. Consumption of large amount of natural and other resources related activities like transportation, heating, cooking, conditioning etc. can cause pollution of air, soil or water. These tourist activities and pollution can cause serious disruption of wildlife habitats. Thus uncontrolled expansion of tourism can put pressure on natural resources and ultimately can generate adverse environmental impacts. Even, in extreme case, it can ruin the local habitat and delicate ecosystem.

It is easily understandable that many tourism-rich areas can be literally overwhelmed by large numbers of tourists. Given the inadequate physical infrastructure and limited capacity to absorb excessive number of tourists, it is bound to have negative environmental and socio-

cultural impact on local communities. On top of that, excessive number of visitors could be a threat to the healthy biodiversity and ecosystem of any locality and thus could be a great concern to the environment. To sum up an unhealthy tourism can possibly affect several areas like- soil, water bodies, flora and fauna, air, landscape etc. which in turn can cause to damage environment critically of any area. Two distinctive cases from Japan and Bangladesh, where excessive number of tourists and their negative impacts were great concern for environmental conservation, were discussed in the following part of this article. Extraction from the interpretation and explanation of these two cases will show the efficacy of citizen participation in environmental conservation.

METHODOLOGY

This article was written on the basis of two empirical evidences. As for first example, Kunigami village of Okinawa, Japan, was selected based on the knowledge and experience of visiting the area by one of the authors. The tourist-attracting Kunigami village was taken and studied where the local government ensured the sustainable resource management. The local citizens of that area were sufficiently conscious about the cause and impact of environmental degradation of their locality. Alongside, they were cognizant about the excessive number of tourists and its negative impact on their locality. Under the banner of a nonprofit organization naming Kunigami Tourism Association (KUTA), citizen played a pivotal role in conserving environment. The concerns of the local citizens regarding the environmental issues were greatly understood by the author through visiting and observation method. Relevant secondary data was used to complement the experience. On the other hand, the second example was taken from Madhabkundu Eco Park, Sylhet, Bangladesh, one of few areas in Bangladesh with abundance of natural resources for tourism. Unfortunately, lack of proper management by the local authority and near absence of citizen involvement has been causing depletion in the natural resources of that area. While empirical knowledge and relevant secondary data was used to explicate the first example, both primary and secondary data was used to explain the second case. Semi-structured questionnaire was used to collect primary data of the second example, taking the local citizens, local administrators and visitors/tourists as the respondents (40, 10 and 30 respectively) for the survey.

CASE STUDY

Kunigami Village in Okinawa

Kunigami is a small village situated in the northern part of Okinawa in Japan. It is a pristine subtropical rainforest habitat that attracts thousands of visitors from around the globe including from mainland Japan. Canoeing, bird watching, snorkeling, kayaking, walking in forest etc are some of the tourist activities in that area. Experiencing an increasing number of tourists in recent years, the environmentally conscious local citizens of that village were worried about the negative impacts to the environment of that locality. In such a backdrop, with the active participation by the local citizens, a non-profit organization naming 'Kunigami Tourism Association (KUTA)' was established in 2002. Although KUTA was formally established in 2002, it started its journey right from 1998. KUTA was a common platform from where the environment conscious inhabitants of Kunigami village did a range of works from rubbish collection to surveys conduction to environmental training program and so on. The brief history and activities of KUTA held in Kunigami village are presented as follows (Table 1):

Table 1: Brief History of KUTA

Year	Activities/History
1998	Kunigami Ecotourism Study Committee was established.
2000	Opened the Community Study Group.
2001	Conducted a survey on the visitors of Kunigami Forest Park. Submitted the Proposal for Effective usage of 'Kunigami Forest Park' to the Kunigami Municipal Office.
2002	'Kunigami Tourism Association' was established.
2003	Conducted a survey on the rubbish, dumped illegally in the forest area.
2004	Founded a study committee for forest tourism with the Kunigami Municipal Office, local forestry union & Forestry Department of Okinawa Prefecture.
2005	Participated in the Okinawa NGO Forum. Held a training workshop on Environmental Education for School Teachers and Community Workers.
2006	Conducted a training workshop for KUTA nature guides. Conducted an environmental education program for the local primary school.

Source: <http://kuta-okinawa.org/en/about.htm#history>

KUTA conducted several important tasks with the active participation of the local citizens that were extremely beneficial to the environmental conservation of that area. For example, it conducted cleanup campaigns at local recreation area; encouraged local businesses to conduct cleanup at community area and its surroundings; co-operated local schools and groups with their environmental programs for children; conducted nature observation programs; provided various nature tour programs; supervised the sustainable use of local resources etc. It also worked to sensitize the local citizens. Moreover, it hosted workshops to educate local citizen on forest environment and the sustainable community development. It is significant to mention here that the local government of the Kunigami village area was succinctly engaged with the activities of KUTA. There was a vivid mutual support between the local government body and the KUTA. The different works done by KUTA could be categorized as the following manner (Table 2):

Table 2: KUTA's working areas:

Areas	Activities
Human Resource Development	KUTA hosts workshops to educate local people on forest environment and sustainable community development.
Environmental Conservation	KUTA conducts cleanup campaigns at local recreation area, community area which encourages local businesses to conduct cleanup at community area.
Environmental Education	KUTA co-operates local schools and groups with their environmental programs. It conducts nature observation programs for children in local community.
Promote Local Community	KUTA publishes bimonthly newsletter to report on local events. It participates domestic and international symposiums and exhibits to share its experiences on
Partnership	KUTA conducts human resource development planning for local government. It supervises community development within the local area. It also supervises the

Source: <http://kuta-okinawa.org/en/activity.htm>

The above mentioned activities depicted the multi-dimensional capacities of KUTA that engaged local citizens in many environmental events and thus contributed to conserve environment of that area.

Madhabkunda Eco Park, Maulavibazar, Bangladesh

Madhabkundu Eco Park is sited at Barlekha Upazila of Moulavibazar District under Sylhet Division. It is one of the popular tourist's spots in Bangladesh. It is a lush green Eco-park with 'Madhabkunda Waterfall' having spectacular viewing. The Park is surrounded by beautiful tea estates and is full of water lilies. It is about 350 km from the capital city. Government of Bangladesh declared Madhabkundu Eco Park as a protected area with the goal to conserve the biological diversity. It was declared as Eco Park (with an area of 265.68 hectare) in 2001 with a view to conserve the 'Madhabkunda Waterfall' and surrounding biodiversity. Declaration of this site as an Eco Park has widened the endeavor of biodiversity conservation and research in this area. Being attracted by its natural beauty, about one hundred thousand visitors are drawn to Madhabkunda Eco Park each year. Unlike Kunigami Village in Okinawa, the local people in the vicinity of Madhabkundu Eco Park were not environmentally conscious and there was no KUTA-like community organization. The contrasting features of the two cases are depicted in the following sections.

DATA ANALYSIS AND DISCUSSION

Legal Foundation: Environment conscious government can play pivotal role in protecting the environment in the first place. By formulating and introducing laws and environment-friendly policies, the central government can protect environment by governing its inhabitant and the local government bodies. From the study, it was understandable that the legal protection for the government was ensured both in Japan and Bangladesh. For instance, the second chapter of 'The Basic Environmental Law, 1993' of Japan stipulated the basic policies for environmental conservation. It stated that "Local governments shall comprehensively and systematically implement and promote policies corresponding to the national policies provided for in Section 5 and other policies necessary for environmental conservation in accordance with the natural and social conditions of the local governments' jurisdiction. In this case, the prefecture (one of the 47 sub-national jurisdictions) shall mainly implement the policies for a large area and comprehensively coordinate the policies administered by the municipalities (Section-7, Article-36)".

In the same light, although Bangladesh lacks active local level participation in environmental conservation, its legal basis is not weak in any way. According to Section 45(1) of the 'Local Government (Union Parishad) Act, 2009', there should be a Committee on 'Environmental Development, Environment Conservation and Tree Plantation' at the basic tier of local government (Union Parishad). Bangladesh government tried to make strategies and policies to involve local citizens in environmental conservation. For instance, as a policy level endeavor, the government of Bangladesh adopted necessary Acts, Rules etc. Government enacted 'Bangladesh Environmental Conservation Act, 1995' to conserve environment along with retaining biological diversity and ecosystems. One of the provisions of this Act was that the government can declare Environmentally Critical Area (ECAs) if any area falls in an environmentally critical situation or is threatened to be in such situation (Article 5-1). Moreover, Article 7 of this Act stated the remedial measures for injury to ecosystem, ie the government can realize the compensation and can direct anybody, involved in causing injury to the ecosystem. In addition, Bangladesh government developed the 'National Biodiversity

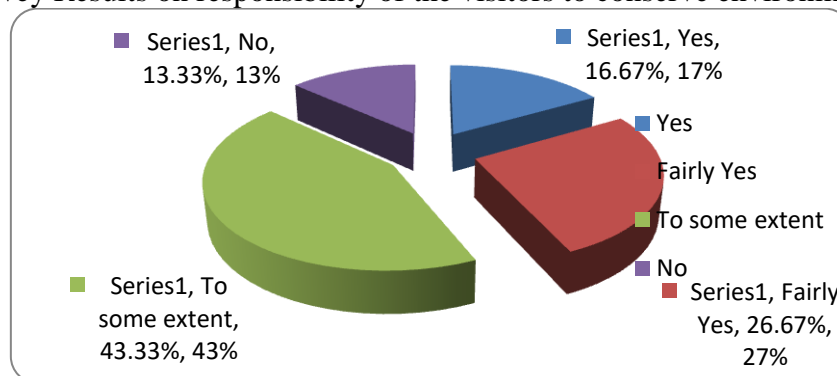
Strategy and Action Plan for Bangladesh' in 2004 to implement effective action plans to conserve biodiversity. Sixteen strategies were developed in that Strategy to shape and direct the actions towards achieving the goals and objectives for conservation, sustainable use and sharing the benefits of biodiversity of the country. Of them, Strategy 6, 7, 9 and 11 stated and emphasized on the issue of citizen participation, awareness and capacity building in environment conservation. Strategy 6 said it would contribute to raising awareness and building capacity of biodiversity conservation among the different sectors of the society. It would promote use of traditional knowledge for conservation, use and protection of the local communities' intellectual property rights (Strategy 7). Strategy 9 said it would enhance Protected Area management, recognizing the benefits of collaboration with local communities in their management (co-management). It would establish participatory mechanisms to receive and utilize the inputs from private sector, civil society, academia and local communities about the different processes leading to biodiversity conservation, use and sharing of benefits (Strategy 11 of National Biodiversity Strategy and Action Plan for Bangladesh 2004).

Environmental Awareness & Due Responsibility: At micro level, the local government and local citizens can play a vital role in conserving environment. Citizens can strive for environmental protection and the sustainable use of natural resources with the collaboration of local governments. This is why, the active participation from the part of local citizens is seen in many parts of the world. From the study, it was found that both 'Kunigami village' and 'Madhabkundu Eco Park' are the tourist-rich destinations that attract thousands of tourists in every year. However, while the local government of Kunigami village understood the potential impacts and the necessity of protecting the biodiversity and ecosystem of the related area, the local government of Madhabkundu Eco Park had not perceived the potential severity, the locality may face in the foreseeable future. Moreover, the local citizens of Madhabkundu Eco Park did not realize the urgency of avoiding environmental degradation of that area. On the contrary, the local citizens of Kunigami village were sufficiently conscious about the natural resources and the necessity to conserve those resources. In other words, local citizens in Kunigami village possess better awareness of environmental cost. That's why they formed a common platform under the title 'Kunigami Tourism Association (KUTA)' and were working to protect environment by engaging their sublime effort. They were very much conscious about the nature and its conservation. It is worth noting that extensive range of economic activities (including employment) generated in Kunigami village owing to an influx of tourists to the area but KUTA and local citizens were expecting to minimize the number of tourists. Kunigami village was successful in maximizing economic activities with minimizing the environmental and socio-cultural impacts. On the contrary, the local government or the local citizens could not ensure human presence at Madhabdundu Eco Park without hurting or degrading the area.

It was revealed from the study that citizen consciousness and their involvement in environmental conservation was somewhat feeble in Bangladesh in spite of an abundance of necessary policies and so forth. Survey at the Madhabdundu Eco Park areas showed that the environment related committee at the basic tier of local government was not functioning, although it should be functioned in line with the 'Local Government (Union Parishad) Act, 2009'. What was more disturbing is that 77.5% of citizens (31 out of 40 respondents) even didn't know that there was a provision of such committee in the existing Local Government (Union Parishad) Act. Moreover, there was no platform for citizen participation on environmental issues. Particularly, there was no such KUTA-like non-profit environment related community organization in that area. Survey showed that 29 responded out of 40 had

the understanding that excessive number of visitors in their locality was causing harm to the biodiversity and ecosystem of their locality. However, a mere understanding of the problem might not enough to go for solving the problem. For local government officials- they were aware that excessive number of visitors was hurting the vicinity of the Madhabdundu Eco Park area. However, 60% (6 out of 10) didn't have any clear idea about how government should act in such situation.

Figure 1: Survey Results on responsibility of the visitors to conserve environment



Field survey also found that most visitors of that area were not so serious about environmental concern. 30 visitors were asked whether they had responsibility to keep the environment intact/pollution free. Their answer was not encouraging at all (Figure1). Only 16 percent confessed that they had the responsibility to conserve environment, while almost the same percentile said they had no responsibility. As per the survey, it was understandable that the rest said yes without any urge to do it.

LESSON EXTRACT FROM THE STUDY

Government machinery alone cannot address all environmental issues without an active participation of local communities. In a similar vein, mere policy introduction is not enough for ensuring environmental conservation. Sensitizing and awareness rising at the grassroots level is pivotal to protect the environment. It might be truer for the case of developing countries like Bangladesh, where literacy rate is low. So the government should chalk out various events of public awareness. If local communities take an active interest in environmental conservation, it may make the job of the government/local government much easier. In fact, the active community participation can work positively- for what sensitizing initiative from the part of the government/local government is necessary.

Environmental management at the local level is required to make things environment friendly. The local government bodies have a crucial role in this regard. They should act as to create a platform at the local level so that local citizens get proper ambience to be involved in environmental issues. Thus, involvement of the local citizens with the government machineries should be given utmost importance. Citizen involvement in planning, development and management can be crucial to minimizing the adverse environmental impact. Therefore, people's broader engagement in environmental resources management is highly needed.

Tourism may bring blessings in many a different ways, especially in economic and cultural aspects- for which we see an unprecedented surge in tourism activities in many parts of the world. However, we should perceive the fact that unplanned and uncontrolled tourism could

be one of the major threats for degradation of biodiversity and ecosystem of any locality. Thus to maintain and to conserve environment, understanding the negative impacts of environmental degradation is a must. Moreover, proper planning and management is required to offset this negative impact.

CONCLUSION

Lack of awareness of the local citizens and their poor engagement, unsustainable exploitation of resources, unplanned management system are the root causes of environmental degradation. Categorically, the human activities negatively affect environment by putting pressure on the natural systems. We can reduce such pressure by building awareness amongst local citizens and by ensuring sound planning and management. For tourism industry, we need to address the unconventional threat that could be generated, in any tourist-attractive place in the world, from the excessive number of tourists. Comprehending the fatal nature of this danger, the local citizens in many parts of the world are collectively working to deter this unwanted situation. Because the environmental hazard doesn't always come quickly and sometimes the effects could be unnoticed for a longer span of time, the local citizens might not act properly as they may fail to comprehend the fatality at the initial stage. Thereupon, the government/local government should take step to sensitize the local citizens. The learning from this study could be drawn that awareness building, ensuring proper ambience for the local citizens to participate in environmental issues and enabling local government bodies are the three prerequisites to ascertain environmental conservation.

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