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Theme 1

Keynote Presentation

Enhancing governance in Fisheries Management in Southeast Asia Towards 2020: Issues and Perspectives

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Ladies and Gentlemen, let me at the start thank SEAFDEC, ASEAN and the organizing committee of this conference for inviting me to present some thoughts on this important issue of enhancing governance in fisheries management in Southeast Asia. ASEAN and SEAFDEC have been paving the way for enhancing better governance of the region's fisheries within the context of an ecosystems approach and have articulated the approach through the Code of Conduct for Responsible Fisheries (CCRF) adopted in 1995 and in their regionalized CCRF (SEAFDEC, 2003) incorporating internationally accepted set of principles and guidelines for governance and best practices in fisheries development and management. ASEAN and SEAFDEC have also been responding to the other international instruments such as the International Plan of Action (IPOAs) on management of fishing capacity, conservation and management of sharks, reducing the incidental catch of seabirds, and illegal, unreported, and unregulated (IUU) fishing, all of which are aimed at enhancing governance in fisheries management (Mahyam *et al.*, 2011).

Fisheries and the welfare of the people involved in fishing has been my interest for the past three decades. During the past three decades there have been impressive improvements in the wealth of people in Southeast Asia as the case in the various parts of the world. This is however not true for small-scale fishers, many of whom still linger in poverty eking out a living on less than USD1 a day. Why the condition of fishers in small-scale fisheries has not responded to the developments in the economy as a whole? This question has attracted my attention over the years and the answer seems to lay in the difficulty in governing fisheries resources.

Weak governance has been recognized as the main cause of overfishing in the waters of Southeast Asian region although the rise in population and the poverty levels of fishers with limited alternative employment are important drivers for the overfishing pressure. Promoting effective governance which will encompass new and more effective institutional arrangements for the sustainable exploitation of the fisheries resource is thus an urgent requirement. The first step in managing stressed and over-fished stocks is to reduce effort. The next challenge is to control and reduce fishing power in overall fishing effort. Any functioning governance system must be able to address this fundamental requirement for reducing fishing effort in the Southeast Asian fisheries.

Around 90 percent of the 38 million people recorded globally as fishers are classified as small-scale, and an additional 100 million or more people are estimated to be involved in the small-scale post-harvest sector (Béné, Macfadyen and Allison, 2007). Management of small-scale fisheries is therefore very critical, and poses an extraordinary challenge both for local communities and governments. Unlike large-scale fisheries, small-scale fisheries at the national level are difficult to manage for the following reasons:

- 1) Limiting the effort of small-scale fishermen means lower incomes and fewer job opportunities for them.
- 2) Removing free and open access to fishery resources, and imposing management control, often leads to serious short term economic and social problems for fishing communities with limited alternative opportunities
- 3) If the open-access is not controlled, resources get depleted quickly, economic returns fall, and community stability is endangered.

This essentially is the dilemma with small-scale fisheries.

Throughout human history, human wellbeing measured in terms of economic growth and wealth accumulation appears to be driven by three factors; 1) the capacity to develop democratic institutions for collective action, 2) the ability to develop and use new technologies and innovations, and 3) on the willingness and ability to harness the power of markets.

We have done pretty well in the area of developing new technologies and realizing innovations. In addition, more recently, most nations have embraced markets and have opened up to the ideas of free trade and have reduced regulations in the market place. All of these have lead to increased economic growth and well being for their citizens.

Human civilization as a whole however has done badly in the area of natural resources management. Taking fisheries as a key example, a third of fish stocks worldwide are overexploited or even depleted yet more than one billion people depend on seafood as their primary source of protein. (FAO, 2009 and Worm *et al.*, 2009). Within Southeast Asia the state of fisheries resources are only some 8-12 % of those at the pre-fishing state. The figures point to the dire state people who depend on these resources are in and will be facing in the future if constructive efforts are not taken to reverse the trends in over fishing and stock depletion.

The key to halting the dangerous trend in overfishing and stock depletion is effective governance of the fishers who are withdrawing the resource from a system that is exposed to overexploitation and collapse in the long term. Yet governance of natural resources is one area our modern civilization as a whole has failed miserably. We are still struggling with how to manage exhaustible resources and are crafting new institutions to deal with resources open to the problems of open access and weak property rights entitlement. Community based/co-management has been part of this new institutions development and it took some time before it obtained the recognition it deserves.

The idea of fisheries co-management is that communities and the state should work together to manage fisheries and such a cooperation will lead to a more effective governance of the resource by the people dependent on the resource. This involves the fishers and the resource managers working together to improve the regulatory process for governing the resource.

What have we learned?

Over the last 50 years, we have witnessed a systematic disillusion with centralized management of fisheries. We have shifted form a belief in central authorities for managing natural resources to the distribution of power and authority to a range of stakeholders. This has been driven primarily by the hard reality that fisheries resources are declining rapidly both in developed and developing countries. Fisheries management policies also shifted from favoring the state as the resource manager to market and community orientated management approaches. In developed countries market oriented, Individual Transferable Quotas (ITQs), which sets the limit to individual fisher and fishing firms on the amount of fish that may be taken from the fishery in any one year, were

established. In the developing countries community management and co-management approaches that involved the crafting of new institutions at the local and community level appeared. These movements reflect a paradigmatic shift in fisheries management, both in terms of balance between overall goals and balance in the distribution of authority and power (Siar et al. 2006; Jentoft and Mccay, 2003; Hanna, 2003).

The context of the Asian developing nations is much more complex. We are dealing with small scale fisheries. Small-scale fisheries is characterized by a dynamic and evolving sector employing labor intensive harvesting, processing and distribution technologies to exploit marine and inland water fishery resources scattered along the coastal line. Small-scale fisheries operate at widely differing organizational levels ranging from self-employed single operators through informal micro-enterprises to formal sector businesses. This sub-sector, therefore, is not homogenous within and across countries and regions and attention to this fact is warranted when formulating strategies and policies for enhancing its contribution to food security and poverty alleviation (FAO, 2004). The management of such fisheries by centralized authorities has not succeeded and delegation of management of small-scale fisheries to the local resource users is now seen to be the only rational way of obtaining effective governance over such resources. In the Asian developing countries alone, almost 65 percent of the world's fishers, framed as the poorest of the poor, continue to depend on fish for food and livelihood survival. Most are small scale fishers who catch fish in near shore waters and inland water bodies and rely on labour intensive fishing technologies (The WorldFish Center, 2005). The over populated fishing industry, coupled with poverty issues and open access characteristic of water bodies, made Individual Transferable Quotas (ITQ) which are used in Developed countries as an impossible management tool in the Asian context.

Top down legislative changes which focused on regulation and enforcement to control fishing efforts has failed to prevent over-exploitation of fisheries resources. Pomeroy and Viswanathan (2003) pointed out that most of the coastal and inland fisheries in Asia are still over-fished. It is argued that the failure is because this form of management is very much still a centralized top-down approach, focusing on objectives relating to fish resources and based exclusively on formal biological science (Viswanathan et al., 2003) and mostly disregards the experiences of fishers (Degnbol, 2003). As a result, the modern laws and regulations that have been put in place to manage fisheries, has not been well received by resource users, leading to the violation of these regulations by fishers whether they are industrial, medium scale or individuals fishing for their daily food and income and the practical failure of governments to enforce the regulations due to a lack of resources (Viswanathan and Sutinen, 1998).

The recognition of the failures of exclusively government managed fisheries led to the emergence of co-management and community based management as options to improve fisheries management. However, a key constraint lies in creating institutional arrangements that can sustain community participation to ensure the benefits really reach the poorer sections of the community and that the institutions are sustainable.

The broader governance approach needed to sustain community participation in fisheries management in the Asian countries thus will have to focus on the crafting of institutional arrangement that are fully nested at all levels of governance from community level to the various levels of powers of government. This will be seen through the role of the government in delivering net benefits and the need to set up legal frameworks for community based management.

Since the 1960's the participation of local resource users and communities in development and management has become part of the development process in Southeast Asia. There is also an increasing commitment of governments to policies of decentralization and community-based

resource management. This is seen in a variety of policies and programmes in the Philippines, Thailand, Malaysia, Indonesia, Laos and Vietnam. (Pomeroy, 1996)

It is now clear that for fisheries co-management/community-based resource management initiatives to be successful, the basic requirement is for government policy to establish supportive legal rights and authority framework. Effective community-based resource management is dependent upon the strength of the local organization and its ability to command respect from its members and enforce institutional arrangements. Success is often simply due to the leadership of the local organization. One important question for revitalization of community-based resource management systems is whether leadership qualities can be transferred to other locations, individuals and organizations.

The future of fisheries governance

What is the best approach or way to govern fisheries? This is a challenging question as our experience from both the developed and developing world shows us that success stories are few and failures are plenty. A consensus is however emerging with regard to how should fisheries be governed. The vision most people agree on regarding what fisheries management should deliver are as stated in Degnbol, 2009.

- Healthy marine ecosystems
- A profitable and economically independent sector
- Supply of sea seafood to consumers originating from sustainable fisheries and aquaculture
- Contribution to development and alleviation of poverty in the coastal regions
- Simple and cost effective policy with implementation close to the people

Co-management and community based management of fisheries is becoming central to the idea of effective governance of fisheries. Gutierrez, Hilborn and Defeo (2010) in their examination of 130 co-managed fisheries from 44 countries with different degrees of development, ecosystems, fishing sectors and type of resources concluded that strong leadership as the most important attribute contributing to success of co-management. Their study, the first comprehensive global assessment of social, economic and ecological attributes contributing to fisheries co-management success shows that co-management holds great promise for better governance of fisheries worldwide in terms of realizing the outcome of sustainable fisheries. The potential for any governance structure for improving fisheries management depends on proper incentives, decentralized institutional arrangements and cohesive social organizations. All of these are more likely to happen under well-established co-management regimes.

The analysis of governance of fisheries and co-management worldwide has generated a body of general knowledge useful for the design of effective institutions for fisheries governance. (Wilson et al, 2006). Sustaining fisheries co-management/community management as a governance approach in a particular setting will also dependent on a process of learning and adaptation in place.

Challenges Ahead

Developing co-management institutions on a larger scale

Many of the problems and issues facing fisheries can be solved only on provincial, national, or even international levels. Fishery resources are generally too large to be entirely within the control of a few communities. In these cases it is imperative to provide for representation of fishery groups at different levels.

Reconciling local and global agendas

Often international agreements on fisheries and local environmental management contradict each other. The government needs to meet its double obligation of attending to international agreements while sharing decision making power for fisheries management with communities.

Identifying a management knowledge base acceptable to stakeholders

To maintain scientific validity and achieve wide acceptance, co-management systems need to reconcile both formal scientific knowledge and fishers' knowledge. One approach may be to identify science-based indicators of the status of the resource system that also reflect fishers' observations.

Developing approaches to manage conflicts

Management arrangements may require access rights to be limited to some resource users and to exclude others, often resulting in conflicts. Participatory approaches for managing such conflicts are crucial for successful co-management.

Reforming existing institutions to empower local communities to participate in determining management objectives

This step may require substantial changes in governmental fisheries management agencies and in stakeholders' perceptions of their respective roles. These issues must be addressed in practical experiments with collective action and co-management. The results need to be documented and the experiences communicated to others who may be in the process of establishing or developing collective action capacity among fishers

Conclusion

The increasing population of Southeast Asia coupled with a stagnation of production in capture fisheries and ineffective governance of coastal resources will result in dire consequence for the poor fishers of the region. Centralized fisheries management systems, which consist of fisheries policies, institutions, and support systems burdened by bureaucratic inefficiency, institutional weaknesses, and fragile human resource bases, will not be able to govern the coastal resources of Southeast Asia to deliver on the vision of a healthy coastal ecosystem. Since the centralized, government-led system of protecting and managing fisheries resources is not working effectively in most cases, alternative approaches are necessary. In addition, there is an increasing consensus that fish and fisheries must be properly harnessed so that they will continue to provide sustenance for present and future generations. Community based management and co-managed arrangements in fisheries management are seen to be feasible options for bringing together the relevant levels of government and the users in pursuing a common set of goals to improve resource conditions and socioeconomic conditions of the community.

More than two decades of research have provided sufficient conclusive support for co-management and community based management as approaches for effective enforcement and equitable access for the poor and often voiceless fishers (Dey and Kanagaratnam, 2008). However, it must be emphasized that a community based fisheries approach may not be applicable everywhere. It cannot succeed in isolation. It is a complex process involving continuous consultation, negotiations, information sharing, and conflict management between stakeholders for improving existing management systems. There is a need to scale up the process to sustain institutions developed under community based management. This includes understanding the role of the government as partners in delivering a net benefit rather than just delegation of powers.

The success of co-managed partnerships depends heavily on political will. Hence developing a legal framework for community level management in that partnership is important in sustaining community based organizations. Community participation in decision-making is as crucial as government support and political influence in ensuring improved policies, fair regulations, and effective enforcement.

The context of small scale fisheries in Southeast Asia is complex. The issues of commercial fisheries versus small-scale fisheries and their co-existence while maintaining healthy resource conditions will be an important consideration.

The need to reduce fishing capacity to sustain the resource and rebuilt stocks will be another important objective of governance.

The development of an effective Monitoring, Control and Surveillance (MCS) programme will be part of enhancing good governance.

Embracing the co-management/community management approach will improve governance and develop capacity for self-governance. The empowering of communities to participate and contribute to the governance of the resources on which they depend will be the new shift in the governance approach in much of Southeast Asia. This shift will represent a new and improved facet of governance of fisheries in the region. Good governance will also require complying with global instruments and regional agreements on fisheries and countries in Southeast Asia will have to take into account their specific conditions and problems of their fishers such as the poverty of small scale fishers, the multi-species and multigear conditions within their governance framework.

We have come to recognize that the ecological, political and economic complexity of aquatic resource management will require an approach to governance that cannot be free from the cross-scale linkage of communities and active civil society engagement in the governance of the resource. From a governance perspective fisheries co-management fits in well with the adaptive ecosystem management approach that is now part of the International Plan of Action for fisheries management. Without the active participation of fishers in management it is very difficult to see how information could be gathered and decisions made and implemented in a sufficiently timely fashion for an ecosystem approach to fisheries to be implemented. The flexibility of co-management is an important factor in making it attractive as a governance approach for managing small scale fisheries of Southeast Asia.

I am an optimist and I believe there are good prospects within Southeast Asia over the next decade to improve the governance of the fisheries. The involvement of communities and civil society with government for managing these complex resources will be the secret for successful governance of these resources. Co-management and community based management will be in the forefront for governing the fisheries resources effectively. Thank you.

References

- Ahmed, M., K. K. Viswanathan and R.A. Valmonte-Santos (2004). Collective Action and Property Rights in Fisheries Management. In Meinzen-Dick, R. (eds.) Collective Action and Property Rights, 2020 Focus Special Issue. International Food Policy Research Institute, Washington D.C. p.11-12.
- Bene. C., G. Macfadyen and E.H. Allison. 2007. Increasing the contribution of small-scale fisheries to poverty alleviation and food security. FAO Fisheries Technical Paper 481 Food and Agriculture Organisation of the United Nations, Rome. Italy. 125 p.

- Degnbol, P. 2009. Future fisheries management in the European Union – What are our options. ICES Annual Science Conference, Berlin. 22 August 2009.
- Degnbol, P. 2003. Science and user perspective: the gap co-management must address, p. 31-49. In D.C. Wilson, J.R. Nielsen and P. Degnbol (eds.). *The fisheries co-management experience: accomplishments, challenges and prospects*. Kulwer Academic Publishers, Netherlands.
- Dey, M.M., and Usha Kanagaratnam. 2008. Community based management of small scale fisheries in Asia: Bridging the gap between fish supply and demand. Conference Paper No. 23. WorldFish Center, Penang, Malaysia.
- Food and Agriculture Organization of the United Nations. 2009. *FAO Yearbook: Fishery and Aquaculture Statistics 2007*.
- Gutierrez, N.L., R. Hilborn and O. Defeo. 2011. Leadership, social capital and incentives promote successful fisheries. *Nature*. Vol. 1, 2011.
- Hanna, S. 2003. The economics of co-management, p. 51-60. In D.C. Wilson, J.R. Nielsen and P. Degnbol (eds.). *The fisheries co-management experience: accomplishments, challenges and prospects*. Kulwer Academic Publishers, Netherlands.
- Jentoft, S. and B.J. McCay. 2003. The place of civil society in fisheries management: A research agenda for fisheries co-management, p. 293-307. In D.C. Wilson, J.R. Nielsen and P. Degnbol(eds.). *The fisheries co- management experience: accomplishments, challenges and prospects*. Kulwer Academic Publishers, Netherlands.
- Mahyam Mohd. Isa, Abu Talin Ahmad, Abdul Razak Latun, Mazalina Ali and Virgilia T. Sulit. 2011. Ensuring Improved Governance in Fisheries Management in Southeast Asian Countries, *Fish for the People* Vol 9 No. 1.:14-18.
- Pomeroy R.S. and K.K. Viswanathan .2003. Experiences with fisheries co-management in Southeast Asia and Bangladesh. In D.C. Wilson, J.R. Nielsen and P. Degnbol (eds.). *The fisheries co-management experience: accomplishments, challenges and prospects*. Kulwer Academic Publishers, Netherlands. p. 100-117.
- Pomeroy R.S. 1996. Community-based and co-management institutions for sustainable coastal fisheries management in Southeast Asia. *Ocean and Coastal Management* Vol. 27 No. 3: pp 143-162.
- SEAFDEC. 2003. *Regional Guidelines for Responsible Fisheries in Southeast Asia: Responsible Fisheries Management*. Southeast Asian Fisheries Development Center, Bangkok, Thailand; 69 pp.
- Siar, S.V., M. Ahmed, U. Kanagaratnam and J. Muir (eds). 2006. *Governance and Institutional Changes in Fisheries: Issues and Priorities for Research*. WorldFish Center Discussion Series No.3, 110 pp.
- Viswanathan, K.K., J.R. Nielsen, P. Degnbol, M. Ahmed, M. Hara and N.M.R. Abdullah. 2003. *Fisheries co-management policy brief: findings from a worldwide study*. WorldFish Center, Penang, Malaysia, 26pp.
- Viswanathan, K.K., M. Ahmed, P. Thompson, P. Sultana, M. Dey and M. Torell (2006). *Aquatic Resources: Collective Management Patterns and Governance for the World's Fish Wealth*, p. 209-216 in M.M. Cernea and A.H. Kassam (eds.) *Researching the Culture in Agriculture: Social Research for International Development*. CAB International Publishing, Oxfordshire, United Kingdom. 467p.
- Viswanathan, K.K. and J.G. Sutinen. 1998. Blue Water Crime: Deterrence, Legitimacy and Compliance in Fisheries. *Law and Society Review* 32(2):309-337.
- Wilson, D.C. Mahfuzuddin Ahmed, Susanna V. Siar, Usha Kanagaratnam. 2006. Cross-scale linkages and adaptive management: Fisheries co-management in Asia. *Marine Policy* 30: 523-533.
- Worm, B. et al. 2009. Rebuilding global fisheries. *Science* 325, 578-585.
- WorldFish Center, The. 2005. *Strategies and options for increasing and sustaining fisheries and aquaculture production to benefit poorer households in Asia*, ADB-RETA 5945: project completion report (main report) Penang, Malaysia: The WorldFish Center, 2005. 235 pp.