Food security through better management of fisheries resource: prospects, challenges and proposals

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This article looks at the overall challenges facing the world in meeting its food supply requirements particularly from the fisheries sector and how the challenges can be overcome, with specific focus on its status in Malaysia and cooperation at the ASEAN level.

Introduction

A recent piece on ‘ASEAN should cooperate to boost food security’ appearing in the New Straits Times on the 27th of September caught the author’s attention. The Deputy Prime Minister, Tan Sri Muhyiddin Yassin was quoted to state the fact that ASEAN’s food security remained uncertain despite to its great economic progress, at the recent 35th ASEAN Ministerial Meeting on Agriculture and Forestry. Referring to the booming populations in the region and increasing adverse effects from climate change, he emphasised on the need for all ASEAN member states to work together towards preserving the region’s food security. Relating to his concern on ensuring sustainable food supply for the future, the author attempts to scoop further details with focus on the marine area and specific emphasis on the fisheries sector, prospects and challenges involved, and propositions to ensure sustainability.

Fish and fishery products are essentially among the most traded food commodities worldwide with ever increasing volumes and values, and this trend is expected to continue to rise. According to the Food and Agriculture Organisation’s (FAO) report on The State of World Fisheries and Aquaculture...
2012, capture fisheries and aquaculture supplied the world with about 148 million tonnes of fish in 2010, valued at US$217.5 billion, of which 128 million tonnes was utilised as food for people. Data for 2011 indicated an increase with a record 154 million tonnes, 131 million tonnes of which was for human consumption. Of this, Asia accounted for two-thirds of total consumption, with 85.4 million tonnes or 20.7 kg per capita. Overall, world per capita food fish supply increased from an average of 9.9 kg (live weight equivalent) in the 1960s to 18.4 kg in 2009 and further to 18.6 kg in 2010.

The vital contribution of the fisheries sector to global food security and economic growth is however constrained by an array of problems. Impacts from climate change and extreme weather events, pressing food and nutrition needs alongside finite natural resources and the growing population are major challenges facing global communities. Management issues include poor governance, weak fisheries management regimes, conflicts over the use of natural resources, poor fishery practices, to name a few; and these are especially so in developing states in the Southeast Asian region. These factors affect marine resources especially fisheries, which is a major source of animal protein for much of the world’s population and provides livelihoods and income for the coastal communities and call for the need to manage them in a sustainable manner. The United Nations Conference on Sustainable Development or Rio+20 held in 2012 discussed these issues in greater detail besides renewing commitments to addressing challenges faced by the sector as part of its larger focus on oceans and coasts.

To address most of the concerns, it is often argued that an ultimate balance is required in seizing opportunities and addressing threats in the use of technology and resources through sound economic and policy decisions as well as in preservation of the coastal and marine environment. This piece hence looks at some of the issues involved and explores cooperation and management opportunities in creating fisheries food security in Malaysia and in the ASEAN region.

**Fisheries in Malaysia**

The importance of the fisheries sector to Malaysia and its long-term sustainable utilisation and protection for the benefit of the people and nation is irrefutable. There is a need to utilise marine living resources to achieve economic growth, human resource development, capacity building within fisheries and mariculture branches, employment creation and sound ecological balance consistent with the development objectives of the national government. The fisheries sector plays a significant role in supporting coastal communities’ livelihood and the development of the national economy and in contributing to the nation’s Gross Domestic Product (GDP), employment, and foreign exchange earnings and is a vital source of protein.

In 2011 the fisheries sector was valued at RM10.6 billion to the national economy, an increase of almost 7% over 2010. The production of the food fish sector which comprises marine capture fisheries, inland fisheries and aquaculture totalled 1.7 million tonnes valued at RM9.4 billion. Marine capture fisheries (comprising inshore and deep-sea fisheries) remained the major contributor producing 1.4 million tonnes (82.4%) valued at RM6.9 billion (74%) respectively in 2011, recording a decrease of 3.9% in quantity and an increase of 4.3% in value respectively over 2010. It is envisaged that the demand for fish will continue to increase, making the task of managing the fisheries resources on a sustainable basis, increasingly complex.
Cooperation on the fisheries sector in the region: Some examples

Acknowledging the importance of the fisheries sector to the country and the need to work together with neighbouring countries to ensure sustainable stocks are available, Malaysia is an active member of several ongoing regional programmes which include the Coral Triangle Initiative on Coral Reefs, Fisheries and Food Security (CTI-CFF), the Sulu-Sulawesi Marine Ecoregion (SSME), and the Bay of Bengal Large Marine Ecosystem (BOBLME) programme. The CTI for instance is a six-nation multilateral partnership of Indonesia, Malaysia, Papua New Guinea, the Philippines, Solomon Islands and Timor-Leste formed to address threats facing coastal and marine resources. Of the five goals identified under the programme, Goal 2 addresses fisheries through an emphasis on ecosystem approach to fisheries management (EAFM), and Malaysia is currently the chair for the regional grouping under this goal. The SSME is within the CTI area and was established between Indonesia, Malaysia and the Philippines prior to the CTI and involves continuous consultations and participation from relevant stakeholders from the three countries on various areas, including fisheries. Another initiative is the BOBLME programme covering a larger number of countries i.e., Bangladesh, India, Indonesia, Malaysia, Maldives, Myanmar, Sri Lanka, and Thailand.

In addition, a regional project on Reversing Environmental Degradation Trends in the South China Sea and Gulf of Thailand (2002 – 2007), funded by the Global Environment Facility (GEF) and implemented by the United Nations Environment Programme (UNEP) was carried out in partnership with seven states bordering the South China Sea (SCS) i.e., Cambodia, China, Indonesia, Malaysia, the Philippines, Thailand, and Vietnam. This project addressed over-exploitation of fisheries in the Gulf of Thailand as one of the priority areas. Overall, this project engaged six participating ASEAN states, compared to four currently involved in BOBLME and three in the CTI programme.

Additionally, collaboration between ASEAN and SEAFDEC (Southeast Asian Fisheries Development Center) on fisheries in Southeast Asia was established in 1998 and strengthened further through the ASEAN-SEAFDEC Strategic Partnership. More recently, the ministers of ASEAN-SEAFDEC Member countries met in Bangkok on the occasion of the Conference on Sustainable Fisheries for Food Security Towards 2020 in June 2011 and adopted 23 action items on various areas of fisheries cooperation which will be used to formulate and implement programmes, projects, and activities through appropriate mechanisms.

Some observations and prospects on enhancing regional cooperation on fisheries

Despite the existence of numerous collaboration programmes among ASEAN countries necessitated by the transboundary nature of the fisheries sector, several challenges remain. These include sustaining fish supplies to improve food security, facilitate poverty alleviation and improve livelihoods. To some extent, countries in the region also face difficulties in developing strategic partnerships and cooperation among the various stakeholders i.e., government, private sector, as well as the civil society in addressing these challenges. This is apparent from the weak community based fisheries management practices and strong emphasis on top-down management approaches with some states doing better than the others in related areas. Inconsistencies in fisheries practices and management among them point to the need to strengthen and streamline operations such as promoting better management of fishing capacity and responsible fishing technologies and practices, and especially on combating Illegal, Unreported and Unregulated (IUU) fishing in the region.
Although most of the fisheries programmes emphasise the adoption of the EAFM approach for more effective management of fisheries, actions on the ground have been rather limited and sluggish. This is exacerbated by uncertainty with regard to the impacts of climate change on the sector. Although the promotion of enhanced cooperation among ASEAN member states especially on areas of joint research, technology transfer and human resource development have been successful especially via the SEAFDEC and regional programmes, more can be done to address fisheries challenges for ensuring food security in the region.

Moving forward

Addressing the abovementioned challenges will not be easy and results will take time to materialise. Aggravating the situation are the current uncertainties facing the region such as rising prices of food and commodities, financial crisis, as well as the unresolved boundary disputes especially in the SCS which may complicate cooperation on the fisheries sector. These however, should not prevent ASEAN states from cooperating. The greater the cooperation and coordination among these countries the better the prospects for overcoming uncertainties and difficulties and in ensuring a sustained recovery from their individual and collective travails.

Overcoming these concerns require recognition of the wider societal role of the fisheries sector within the governance framework. The Resolution on Sustainable Fisheries for Food Security for the ASEAN Region Towards 2020 could be a significant way forward; provided individual and collective efforts among the ASEAN states are galvanised to promote sustainable fisheries for food security in the region. Priority should be given to developing national roadmaps and supporting programmes in consultation with relevant stakeholders and in tandem to the Resolution, to harness successful results. For instance, one way to achieve effective fisheries management could be through the adoption of an ecosystem approach throughout the region, implementation of streamlined practices and operations, as well as implementation of better inter- and intra-agency coordination and cooperation among and between the countries. It is also important to ensure that any effort taken be based on the principles enshrined in the Code of Conduct for Responsible Fisheries, and provisions of adopted guidelines and relevant instruments to foster responsible and sustainable fisheries in the region.