Introduction: Sneha (Social Need Education and Human Awareness, www.snehangt.org) based in Tamilnadu, India working with the small-scale fishers organized the event during 27-29, August, 2018, in Kolkata, India. COAST-Bangladesh, ICSF-India, EQUATION-India, DISHA-India, NAFSO-Sri Lanka, WFFP, Public Finance and Public Accountability Collective-India, National Association for Fisher-Folk-Thailand participated in the workshop. The objectives of the workshop are to i) clarify the definition of the blue economy as per World Bank, ii) a study to document the implications of ‘Blue Economy’ supported by nation state, international bodies and armed with an array of technocrats, economists and experts.

Concepts of Blue Economy:
The importance of the coasts and the oceans to human life is undisputable. Humans have inhabited the coasts for millennia, with several coastal communities around the world having a deep sense of history and intimate cultural relationship with the coasts and oceans. These resources are vital for our livelihood, nutrition and overall sense of wellbeing.

Of late, the concept of “blue economy” as a growth model, pushed by leading global organizations and international financial institutions, has been adopted by the nation-states across the world using ocean eco-system and coastal eco-system to promote economic growth. The blue economy has diverse components, including established traditional ocean industries such as fisheries, tourism, and maritime transport, but also new and emerging activities, such as offshore renewable energy, aquaculture, seabed extractive activities, and marine biotechnology and bio-prospecting (World Bank, 2017)

However, the concepts of “blue economy” are hardly new, but a mere continuation of existing paradigms of exploitative development of the last several decades using coastal and marine resources. For instance, productivity enhancing fisheries based on destructive technology have been promoted the world over. Massive and unplanned industrialization and infrastructure development along the coasts like ill-sited ports, highly polluting factories, power plants, rampant sand mining, tourism projects, roadways and artificial waterways and destructive forms of aquaculture have been steadily growing the world over, and enjoying policy and institutional support globally.

The Blue Economy is a developing world initiative pioneered by SIDS and relevant to all coastal states and countries with an interest in waters beyond national jurisdiction. The Blue Economy conceptualizes oceans as “Development Spaces” where spatial planning integrates conservation, sustainable use, oil and mineral wealth extraction, bioprospecting, sustainable energy production and marine transport. The Blue Economy breaks the “brown” development model where the oceans have been seen as a source of free resource extraction and waste dumping. The Blue Economy reflects the circumstances and needs of countries whose future resource base is marine. The Blue Economy will incorporate ocean values and services into economic modelling and decision-making processes. The Blue Economy paradigm constitutes a sustainable development framework for developing countries addressing equity in access to, development of and the sharing of benefits from marine resources. The Blue Economy envisages further development and refinement of international law and ocean governance mechanisms. The Blue Economy approach offers
the sustainable development of the common heritage of humanity, the resources of the high seas.

**The major human impacts include, among others, the following:**

1. Physical alterations and destruction of marine and coastal habitats and landscapes due largely to coastal development, deforestation, and mining. Coastal erosion also destroys infrastructure and livelihoods.

2. Unplanned and unregulated development in the narrow coastal interface and nearshore areas has led to significant externalities between sectors, overlapping uses of land and marine areas, marginalization of poor communities, and loss or degradation of critical habitats.

3. Climate change, caused by human industrial activity has led to sea-level rise and more intense and frequent weather events - changes in sea temperature, ocean acidification, and major oceanic currents threaten marine life, habitats, reefs, and the communities that depend on them.

4. Flawed extraction of fisheries resources, such as unsustainable fishing as a result of technological coupled with poorly managed access to fish stocks. Fish stocks are affected by illicit fishing, which may account for up to 26 million tons of fish catches a year or more than 15 percent of total catches. In fact, poor fisheries management squanders roughly US$80 billion annually in lost economic potential and 11 percent in catch potential (World Bank, 2017).

5. Marine pollution, for example in the form of industrial effluents, untreated sewage, agricultural runoff, and marine debris such as plastics. An estimated 8 million tons of plastic enter the oceans each year (Jambeck, 2015).

6. In coastal zones, declines in mangrove forest habitat resulting from habitat conversion, wood harvest, destruction of dune systems from sand mining, and changes in sediment and pollutant loading from river basins combined with land reclamation for agriculture or infrastructure have serious negative impacts on fisheries by reducing or degrading spawning and feeding habitats.

7. Massive erosion and siltation along the coasts due to unplanned infrastructure, causing disasters.

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**International Legal Instruments related to Blue Economy:**

1. **Oceans** *(Sustainable Development Knowledge Platform):*
   - Oceans cover 72% of the surface of our blue planet and constitute more than 95% of the biosphere.
   - Life originated in the Oceans; Oceans generate oxygen, absorb carbon dioxide, recycle nutrients, regulate global climate and temperature.
   - Oceans provide food to more than 3 billion people, provide employment to millions and are the means of transport for 80% of global trade.
   - The seabed currently provides 32% of the global supply of hydrocarbons.
2. Threats to the Oceans:
- FAO data (2016) indicate that 66.9% of fish stocks are at biologically sustainable levels and 33.1% are at biologically unsustainable levels
- Maximally sustainably fished stocks (fully fished stocks) are 59.9%
- Under-fished stocks are 7%
- Fully fished stocks and overfished stocks combined are 93%
- Increasing pollution and unsustainable coastal development contribute to the loss of biodiversity, ecological function and the decline in provision of environmental services
- Coastal degradation
- Ocean acidification due to rising atmospheric CO2 levels is changing
- ocean chemistry “at a speed faster than at any time in the last 300 million years”

3. Importance of ocean:
Importance of oceans for sustainable development has been recognized from the beginning of the UNCED process in Agenda 21 (1992), Johannesburg Plan of Implementation (2002), Rio+20 Outcome Document: the Future We Want (2012)

4. Green Economy
- No internationally agreed definition of green economy and at least eight separate definitions (United Nations Sustainable Development Knowledge Platform)
- Green economy is defined as "one that results in improved human well-being and social equity, while significantly reducing environmental risks and ecological scarcities. It is low carbon, resource efficient, and socially inclusive" (UNEP 2011)
- “the process of reconfiguring businesses and infrastructure to deliver better returns on natural, human and economic capital investments, while at the same time reducing greenhouse gas emissions, extracting and using less natural resources, creating less waste and reducing social disparities” (UNEP 2010)
- Green economy is one of the two specific themes for Rio+20: an important tool for achieving sustainable development and poverty eradication, as guided by the Rio Principles, Agenda 21 and the Johannesburg Plan of Implementation, inter alia, to achieve internationally agreed MDGs.

- Fisheries
- Seabed Mining
- Oil and Gas
- Desalination
- Renewables
- Transport and Trade
- Coastal Development
- Tourism and Recreation
- Carbon Sequestration
- Coastal Protection
- Waste Disposal for Land-based Industry
  Coastal and Marine Biodiversity

6. SDG Targets and the Blue Economy
• Goal 14. Conserve and sustainably use the oceans, seas and marine resources for sustainable development
• Target 14.7 by 2030 increase the economic benefits to SIDS and LDCs from the sustainable use of marine resources, including through sustainable management of fisheries, aquaculture and tourism
• Target SDG 14.b provide access of small-scale artisanal fishers to marine resources and markets

7. Legal Instruments
• UNCLOS sets out the legal framework within which all activities in the oceans and seas must be carried out, including the conservation and sustainable use of the oceans and their resources.
• The effective implementation of the Convention, its Implementing Agreements (e.g. UNFSA); Rio Declaration on Environment and Development; and other relevant instruments is essential to build robust legal and institutional frameworks.
• Lessons learned from the Convention on Biological Diversity (CBD) Art. 16 dealing with access and transfer of technology and the FAO Agreement on Port State Measures to Prevent, Deter, and Eliminate Illegal, Unreported and Unregulated Fishing (PSMA) are considered relevant.

My presentation:
Title: Blue Economy and Bangladesh

Blue Economy: Promising Sectors

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<tr>
<th>Sectors</th>
<th>Activities</th>
<th>Drivers of Growth</th>
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<tr>
<td>Fishing</td>
<td>Capture fishery, Aquaculture, seafood processing</td>
<td>Food Security Demand on Protein</td>
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<tr>
<td>Marine Biotechnology</td>
<td>Pharmaceuticals, chemicals, seaweed harvesting, seaweed products, marine derived bio-products.</td>
<td>R &amp; D Health Care Industries</td>
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<tr>
<td>Minerals</td>
<td>Oil and gas, deep-sea mining (exploration of rare earth metals, hydrocarbon)</td>
<td>Energy supply Minerals resource</td>
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<tr>
<td>Marine Renewable Energy</td>
<td>Offshore wind energy production, wave energy production, tidal energy production</td>
<td>Demand for alternative energy sources</td>
</tr>
<tr>
<td>Shipping, Port &amp; Maritime logistics</td>
<td>Ship building and repairing, ship owners and operators, shipping agents and brokers, ship management, liner and port agents, port companies, ship suppliers, container shipping services, stevedores, roll-on roll-off operators, custom clearance, freight forwarders, safety and training.</td>
<td>Growth in seaborne trade and International regulations</td>
</tr>
<tr>
<td>Marine manufacturing</td>
<td>Boat manufacturing, sail making, net manufacturing, boat and ship manufacturing and repairing, marine instrumentation, aquaculture technology, water construction,</td>
<td>Growth in seaborne trade and International regulations</td>
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<tr>
<td>Sectors</td>
<td>Activities</td>
<td>Drivers of Growth</td>
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<td>Marine Tourism &amp; Leisure</td>
<td>Sea fishing by boats, sea angling from the shore, sailing at sea, boating at sea, water skiing, jet skiing, surfing, sail boarding, sea kayaking, scuba diving, swimming in the sea, bird watching in coastal areas, whale, dolphin watching, visiting coastal natural reserves, trips to the beach, seaside and islands.</td>
<td>Employment and growth with global tourism</td>
</tr>
<tr>
<td>Marine Commerce</td>
<td>Marine financial services, marine legal services, marine insurance, ship finance &amp; related services, charterers, media &amp; publishing.</td>
<td>Provide ocean services</td>
</tr>
<tr>
<td>Marine ICT</td>
<td>Marine engineering consultancy, meteorological consultancy, environmental consultancy, hydro-survey consultancy, project management consultancy, ICT solutions, geo-informatics services, yacht design, submarine telecom.</td>
<td>Provide ocean services</td>
</tr>
</tbody>
</table>

- Maritime victory
- Future challenge of agriculture in our country.
- Future population & Food Security will be a challenge.
- BoB also be a part of our economic development strategies
- Achieve SDGs by reducing environmental degradation

**Growth and Poverty Reduction:**
- Around 298 verities are available with commercially viable stock
- Opportunity for coastal people in fisheries
- Policy, investment and technologies can produce higher value than existing

**Bangladesh can be exporting country in salt:**
- 55,000 population engaged with BDT 3,000 cr. Transaction
- Existing production could be double including new areas in coastal belt.
- Introduce technologies for other mineral salt (e.g. Magnesium, gypsum etc.)

**Opportunities to establish as global trade Hub related to port and shipping:**
- Around 90,000 ships moving through BoB & Indian Ocean.
- 9.8 billion MT products are being transported/yr.
- China “Belt & Road Initiatives” (include 60 countries globally)
- Constructing Deep Sea port with increasing capacity of logistic services can realize the dream

**What we need for Blue Economy:**
- Employment generation for poor
- Ensure access to coastal resources (especially fisheries)

**Blue Economy and Bangladesh:**
• Social Equity and gender
• Address environment and climate change
• Ensure balance investment to create opportunities for both poor and capitalist
• Develop long term strategic plan
• Inclusion related ministries, sector and departments in planning coordinating and implementation process

Study to be undertaken:
SNEHA is undertaking a study to document the implications of ‘Blue Economy’ supported by nation state, international bodies and armed with an array of technocrats, economists and experts.

Objectives:
• To enable the process of evolving an alternate ecosystem (network of systems) of policies, institutions, people centric jurisprudence at the regional level for the cause of coastal communities with a special focus on small scale fisher-folks and women, by generating knowledge from a people centric perspective
• To promote a platform for the voice of the Global South, which seeks to challenge the dominant discourse of development that has not only failed to respond to needs of the people, but resulted in loss of right over resources and loss of livelihood of coastal communities and large scale damage to the environment

Expected Outcomes:
• Regional solidarity is strengthened and participating groups and individuals learn from other country experiences and evolve common strategies for regional, national and local struggles.
• Generating knowledge from a pro-people’s perspective to advocate changes in the policies, institutions and jurisprudence to promote an alternate ecosystem in favour of traditional fisher folk especially small scale fisheries sector.
• Promoting a platform for the voice of the Global South which will advocate for an international legal instrument, policy to protect the rights of the traditional fisher folk especially small scale fisheries.
• Community leaders in India and other coastal states are better prepared to defend their rights given their new familiarity with the consequences of the various facets of ‘blue growth’ as a result of their exposure visits and participation in Tribunal.
• Dialogue is initiated with policymakers at South Asia level to change their perspective through influential INGOs like FAO, UNDP & WFP regarding the need to protect and promote the rights of the traditional fisher folk especially small scale fisheries using the declaration as the advocacy tool.

My learning from the workshop:
1. Clear concept on Blue Economy
2. Aquaculture is also the part of Blue Economy.
3. Blue economy is also called Green Economy.
4. Introducing the different leaders working with fisher-folks in the Bay of Bengal and Indian Ocean.

My future plan with Blue Economy:
1. Assisting the study to be conducted by the SNEHA.
2. Involving for the report of the study
3. Raise the voices with the policy makers for the betterment of fisher-folks with the outputs of the study.

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Kolkata, West Bengal, India
Date: 1 September, 2018

Report prepared by