

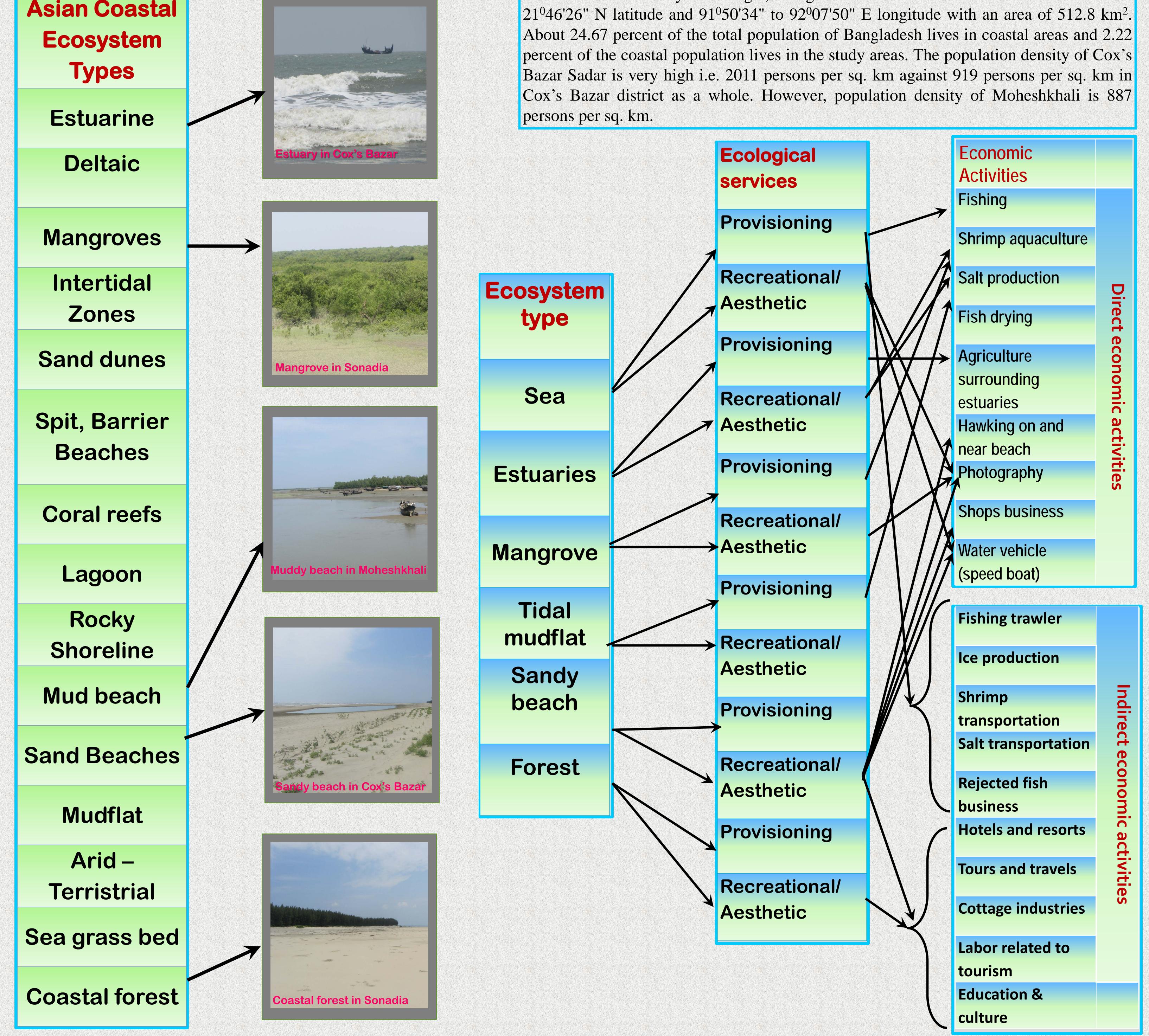
Coastal Ecosystem, Ecosystem Services & Changing Economic Activities of Cox's Bazar-Moheshkhali Area, Bangladesh



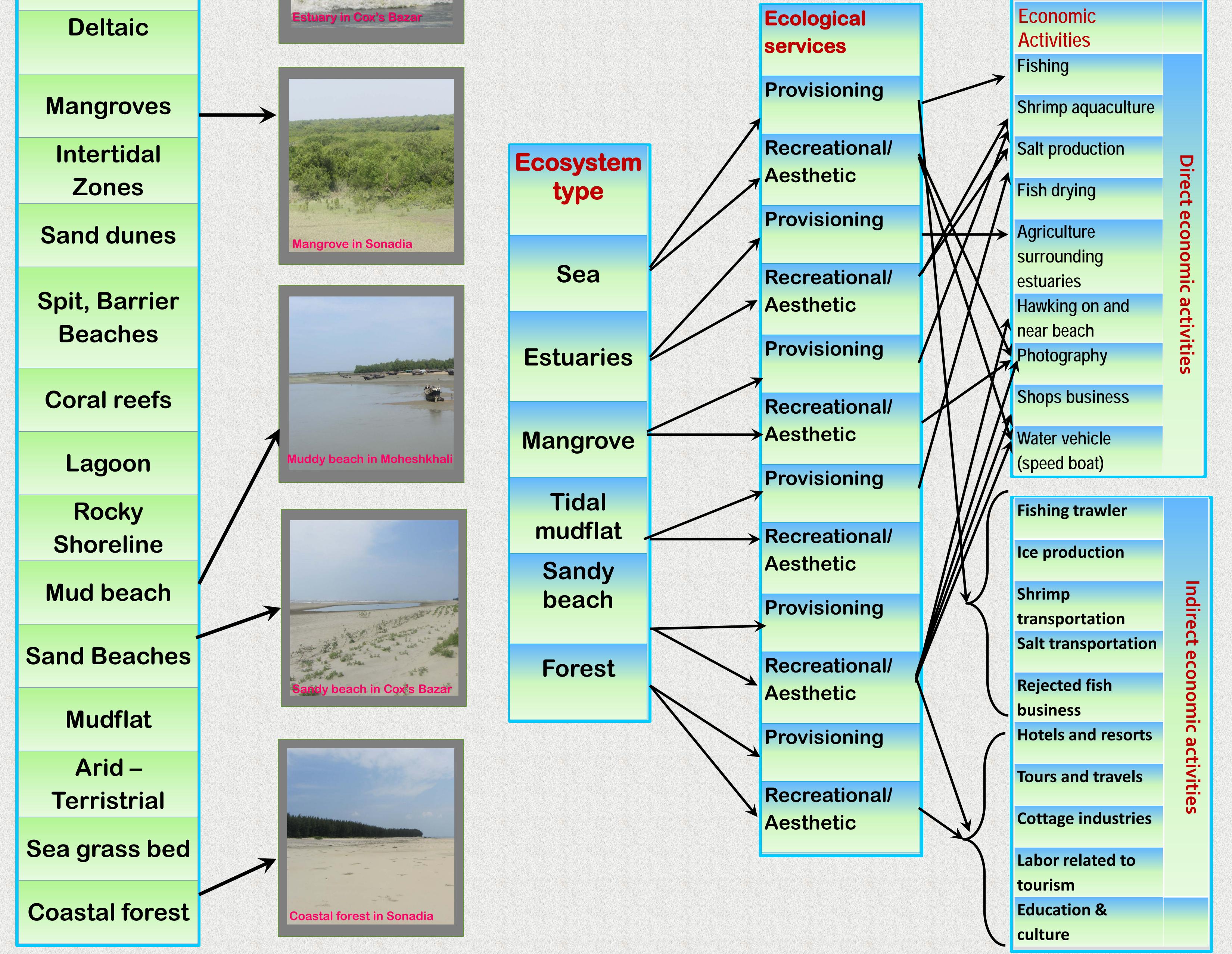
Coastal ecosystem is a dynamic interface between land-based and oceanic influences

Cox's Bazar-Moheshkhali Coastal Ecosystem: a part of Asian Coastal Ecosystem

Asian Coastal Ecosystem



The study area: It is under Cox's Bazar district of the Chittagong division and located about 390 km from Dhaka capital city and 152 km south from Chittagong port city on the east coast of the Bay of Bengal, Bangladesh. The area lies between 21°23'16" to



Acknowledgements:

Project Title: "Coastal Ecosystem and Changing Economic Activities: Challenges for Sustainability Transition along Chinese and South Asian Coasts"

Project Reference Number: ARCP 2012-12NMY-ROY

Asia-Pacific Network for Global Change Research for providing financial assistance

Contact: Professor Dr. Md. Giashuddin Miah, Department of Agroforestry and Environment, Bangabandhu Sheikh Mujibur Rahman Agricultural University Gazipur-1706, Bangladesh, Tel: 88 oz 9205315, Cell: 01816776914, Fax: 88 oz 9205333, Email: giash1960@gmail.com

Pattern of Change in Economic Activities from Traditional to New

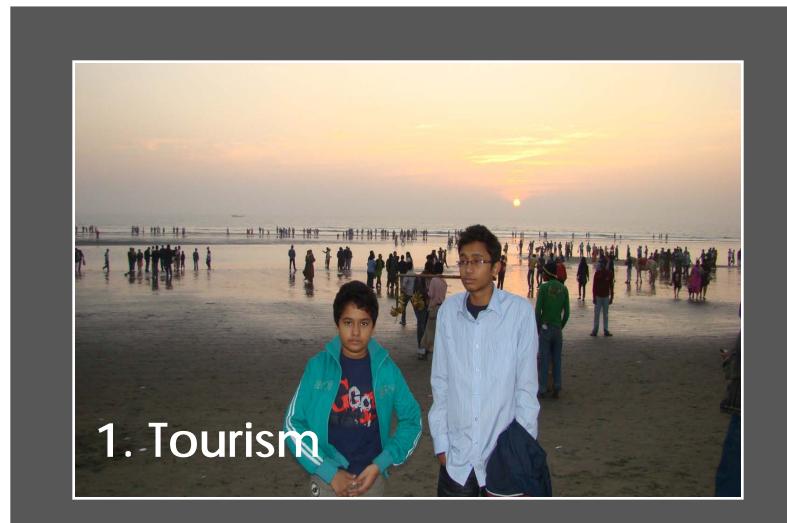
Traditional **Economic Activity**

Agriculture

Unprofitability of crop cultivation (mainly single crop-*Aman* rice) compared to shrimp farming and salt production Decline in crop yield due to salinity, lack of sweet water for dry season irrigation and incidence of pest and diseases

Decline in availability of fish resources; changes in species

New Economic Activities





- Unfavorable climate and uncertainty of crop production
- Rapid expansion of growth of tourism leading to landuse change
- Market drivers resulting in profitability of new economic activities
- Transformation of agricultural land to non-agricultural purposes

composition of catches; the high proportion of juvenile fish in the catch Risk of cyclone and tidal surges and lack of security for the fishermen during fishing in sea from pirates Fishing

- High price of electricity leading to increase costs of fish processing and marketing
- Market drivers resulting in profitability of new economic activities Shrimp farming provides more economic growth compared to fishing from sea

Market and non-market driving forces resulting in unprofitability of fish business

2. Shrimp farming production

8

8

2

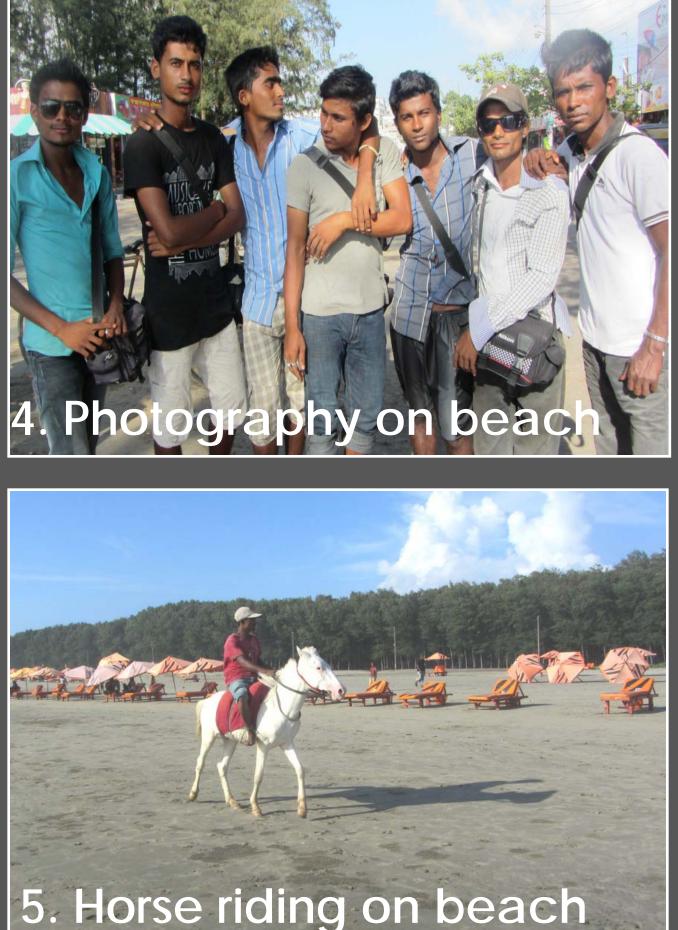
3

5

6

3





Fish trading

Influence of middlemen in controlling fish trading Lack of fishing harbor facilities resulting in unprofitability of fish business

Increase cost of catch fish and variability in market price

Fish exporting

Lack of fish stocks for processing to export Unavailability of fish storage, preservation and exporting facilities Lack of foreign invertors and high cost of exporting Profitability of new economic activities Delay supply of order due to manmade uncertainties

Fish drying

Market driving forces resulting in low wages to the laborer Fish drying processes are gradually shifting from traditional to modern systems Unavailability of catch fish & extreme weather events Profitability of new economic activities





Small scale business

Traditional small scale businesses are less profitable than new economic activities like rapidly growing tourism Market drivers also leading to profitability of the new economic activity Unprofitability of small scale business due to fall in demand because of uncertainties like political unrest, disruption of communication etc.

Project scientists @ GCP-JU

Prof. Dr Md. Giashuddin Miah Prof. Dr. Md. Rafiqul Islam

