

D E C C M A



Workshop Report

Report of the India second district stakeholders workshop (South 24 Parganas), 21st September 2015



DECCMA India team



CARIIAA
Collaborative Adaptation Research Initiative in Africa and Asia



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About DECCMA Working Papers

This series is based on the work of the Deltas, Vulnerability and Climate Change: Migration and Adaptation (DECCMA) project, funded by Canada's International Development Research Centre (IDRC) and the UK's Department for International Development (DFID) through the **Collaborative Adaptation Research Initiative in Africa and Asia (CARIAA)**. CARIAA aims to build the resilience of vulnerable populations and their livelihoods in three climate change hot spots in Africa and Asia. The program supports collaborative research to inform adaptation policy and practice.

Titles in this series are intended to share initial findings and lessons from research studies commissioned by the program. Papers are intended to foster exchange and dialogue within science and policy circles concerned with climate change adaptation in vulnerability hotspots. As an interim output of the DECCMA project, they have not undergone an external review process. Opinions stated are those of the author(s) and do not necessarily reflect the policies or opinions of IDRC, DFID, or partners. Feedback is welcomed as a means to strengthen these works: some may later be revised for peer-reviewed publication.

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DECCMA-India Minutes of the 2nd District Level Stakeholder Meet South 24 Parganas,
Indian Bengal Delta (IBD) At Canning, West Bengal On September 21, 2015; IST 11:00 am
– 5:00 pm

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Attendees

DECCMA-INDIA LEAD INSTITUTION - JADAVPUR UNIVERSITY (JU):

- Prof. Sugata Hazra, Director, School of Oceanography, PI DECCMA-India
- Dr. Somnath Hazra, Senior Research Fellow
- Mr. Shouvik Das, Junior Research Fellow

CENTRE FOR ENVIRONMENT & DEVELOPMENT (CED) PARTNER ORGANISATION WITH JU DECCMA-INDIA

- Dr. A K Ghosh, Director, CED, Work Package-1 Lead DECCMA-India
- Ms. Clare Lizamit Samling, Junior Research Fellow (WP 1 &3), DECCMA-CED
- Ms. Sunita Dey, Junior Research Fellow (WP 1 & 6), DECCMA-CED

GOVERNMENT:

- Mr. Subhas Chandra Acharya, Former Joint Director, Sundarban Development Board (SDB) & Convener for the sectoral Plan for Sundarbans CCA
- Dr. Uttam Kumar Mondol, Indian Council of Agricultural Research (ICAR) - Central Soil Salinity Research Institute (CSSRI), RRS, Canning Town
- Dr. Indranil Sarkar, SDH, Canning
- Mr. Arun Kumar Deb, Fishery Expert-Officer In Charge (FEO), Canning I
- Mr. Partha Pratim Nath, Fishery Expert-Officer In Charge (FEO), Gosaba
- Dr. D Suresh Chand, Head-Sundarban Regional Centre, Zoological Survey of India (ZSI), Canning
- Dr. Supriya Nandy, Senior Research Fellow, ZSI, Canning

NON GOVERNMENTAL ORGANISATIONS / COMMUNITY BASED ORGANISATIONS (CBO):

1. Joygopalpur Gram Vikash Kendra (Basanti)

- Nimai Bhandari
- Kshitish Bishal, Resilience Committee Member
- Badal Maharal

2. Lokmata Rani Rashmoni Mission, Nimpith

- Aruna Das
- Krishna Roy
- Jaba Adhikary

3. Lutheran World Service India Trust (LWSIT), Mathurapur

- Haider Ali

4. Ram Krishna Mission, Narendrapur

- D. Giri

5. Southern Health Improvement Samity (SHIS),

- Sabitri Pal, President

6. Tagore Society for Rural Development (TSRD) - Rangabelia, Gosaba

- Kanai Lal Sarkar
- Nitaihari Mondol
- Rabindranath Mondol

7. WWF-I

- Soma Saha

8. WPSI (Bali)

- Anil Mistry

9. Harindanga Vivekananda Gram Unnayan Samiti

- Bhakti Purkait

10. Bandhu Mahal

- Sabbas Ali, Coordinator

SELF HELP GROUP (SHG):

1. Suchana Swrnajayanti Gram Swarojgar Yogna (Jharkhali, Gram Panchayat)

- Kabita Biswas

2. Mahila Samiti

- Lakshmi Sashmal

3. Ram Krishna, Naforgang Gram Panchayat

- PuspaMondol

4. Parichiti Mahila Sanchay Prakalpo

- Amala Mondol

5. Banikanta Swanirbhor Samiti

- Kalpana Mondol

6. Nivedita SHG – Ramkrishna Mission, Rupayan, Gosaba

- Satyendranath Roy

7. Manashi SHG – Ramkrishna Mission, Rupayan, Gosaba

- ArabindaSamanta

Agenda

Registration : 10:30 am – 10:45 am

Activity 1: 10:45 am – 11:45 am

1. Welcome Address by Dr. S Chand, In-charge, Sundarbans Field Research Station, ZSI. MoEFCC. Government of India
2. Introductory Address by Dr. A K Ghosh, Director, CED on behalf of DECCMA-India
3. Address from India Team, Lead Institution: Jadavpur University
4. Self Introduction of the participants
5. Presentation on the theme of the meet by Dr. A K Ghosh, Director, CED

TEA BREAK: 11:45 pm – 12 noon

Activity 2: 12 noon – 1:15 pm

6. Presentations by the participants (15 minutes each)

- Mr. Subhas Acharya, Formerly Joint Director, Sundarban Development Board & Convener, Sectoral Plan for Climate Change & Sundarbans GoWB
- Dr. Uttam Kumar Mondol, Indian Council of Agricultural Research (ICAR) - Central Soil Salinity Research Institute (CSSRI), RRS, Canning Town
- Dr. Indranil Sarkar, SDH, Canning

Mr. Arun Kumar Deb, Fishery Expert-Officer In Charge (FEO), Canning I

Activity 3: 1:15 pm – 2:15 pm

7. Dividing the participants into groups for Group Activity and Discussions

- Reaction of the community during Natural Disaster/"Cyclone Aila" in 2009?
- Effectiveness of the Early Warning System/Evacuation Plan/Cyclone Shelters, if any?
- Experience of Post Disaster "Cyclone Aila" scenario?
- What are the Adaptation measures, in terms of Lives, Livelihood in the area? Are these initiated by the Community or the Government, if any?
- Is Gender Sensitivity needed to promote certain kind of Adaptation measures? If yes, how?
- Experience of Post "Cyclone Aila" period's relief?
- Is there any case of Migration from the area?
- If yes, the why? Who is the principle Migrants (able bodied male/some selected members/entire family)?
- **What are the major areas accounting migration? What are preferred destinations of Migrants?**
- **What are the problems/issues/challenges that prevent issues being effectively addressed, or policy choices being implemented? Are these related to governance or some other factors? If any, how?**
- Are there problems/issues with governance (legal, institutional, policy) framework that promote or inhibit certain kinds of adaptation? If any, how?
- Has attention been paid by the Government to the needs of women, children, elderly and people with special needs? If any, how?

BREAK FOR LUNCH: 2:15 pm – 3:00 pm

Activity 3 (continued): 3:00 pm – 4:00 pm

8. Followed by Presentations from each groups 9. Suggestions from the groups Activity 4: 4:00 pm – 4:45 pm

10. Feedback Sessions from the different Stakeholders invited

- Are there particular things that participants believe the project could provide that would be relevant to the issues/problems in the case areas?
- How much awareness do participants have about available adaptation finance initiatives and their appropriateness?
- What the best method of engagement would be between them and the project?

Are there any stakeholders who are not present but are relevant? 11. Sum up Discussion by Dr. Asish K Ghosh

TEA BREAK: 4:45 pm – 5:00 pm

Activity 1

- Welcome Address: Dr. A K Ghosh, Director CED, on behalf of DECCMA-India welcomed all the participants at 2nd District Level Stakeholder Meeting, representing all the thirteen Blocks of Indian Bengal Delta, South 24 Parganas District, West Bengal.

He invited Dr. S Chand, Officer In-charge, Sundarbans Field Research Station, ZSI-Canning to address the crowd. Dr. Chand welcomed all the participants to the workshop and highlighted the main activities of ZSI looking into biodiversity of the area, Dr. Ghosh translated the speech in vernacular (Bengali) and extended his gratitude for lending the office space for the Stakeholder workshop.

He specially expressed his thanks to the representative from ICAR-CSSRI, RRS, Canning Town, Senior District Health Officer, Canning, Fishery Expert-Officer In-Charge (FEO) of Canning I and Gosaba, and the Former Joint Director of Sundarbans Development Board.

He explained in details the objective of the DECCMA project, focusing on the vulnerability of IBD in the era of Climate Change (glacier melting, unpredicted rainfall, river water increasing), and the current modes of Adaptation and on the trend of Migration of human population from the Delta, especially in the Post Aila Period. Remembering Cyclone „Aila“ in 2009 at a speed of 125 km/hr, the Sundarbans people were brave to stay back and fight the consequences. Further it has been pointed out that, on the basis of Delta Vision Document 2011, published by WWF-I of and subsequent studies, it is predicted that more than 1 million people may have to move out 08 Community Development Blocks of IBD between 2030-2050.

Further, he quickly threw light on the theme of day long discussion regarding the recent adaption/coping activities undertaken; if unable to cope up, whether the people would prefer to choose the option to migrate; If they have to migrate, then the possible and preferable places they would opt for; peoples opinion towards skill development; whether migration (labour works) has improved the situation/condition; and finally the workshop also aims to hear about the gender issues, if any.

Unless the farmers and the fishers of Sundarbans are empowered with additional skills, it may be extremely difficult for the immigrants to settle in the new localities. Mentions were also made that, this workshop is a step towards further interactions with the community, throughout the life of the project, to understand the gaps within the concerned government departments, expectations of the people and execution of the plans and policies at the receivers end.

He mentioned about the community initiative to make the adaptation for food availability a success with the Salt Tolerant Paddy cultivation, after the incidence of “Cyclone Aila” in 2009, and to what extent the initiative has helped the community to cope up with the crisis. This is just but one example.

- Welcome Ceremony: The distinguished panelists on the dais were felicitated with flowers and the workshop was called open.

- Prof. Sugata Hazra, representing JU Lead Team, introduced the DECCMA Project to the participants. He informed the participants about the two selected study areas (Sundarbans Delta and Mahanadi Delta) in India. He mentioned that the aim of the project is to identify the climate stress vulnerable spots in the two deltas, besides, assessing the social yardstick (impacts on people and population), poverty hotspots and gender issues. Focus was made on no proper records of Human Migration (from the submerging islands of Lohachara and Ghoramara due to sea level rise and land erosion to Sagar Island) in Sundarban with the State Government. Studies show that the later migrants after Cyclone Aila are compelled to move to the cities and ends up living in slum. This project focuses on collecting information of both male and female migration.

He also talked about the cases from census data analysis on in-migration in the area and wishes to confirm the same during further discussions of the day. Mentions were made about the review of the existing government policies to that of the problems of Migration. Mention were also made about the present social structure of the community being male oriented. He also pointed out some of the possible adaptation processes being carried out in the field of agriculture, fisheries, irrigation and whether the people have any awareness about the present government policies and subsequent gaps in it.

Prof. Hazra also mentioned about the Intergovernmental Panel for Climate Change (IPCC) where the coastal areas are identified as highly vulnerable areas due to impacts of climate change, and Indian Sundarban part of Ganga-Meghna-Brahmaputra Delta is on high alert due to the large number of population it supports.

Activity 2

- Dr. Indranil Sarkar, SDH/Asst. Chief Medical Officer (CMO), Dept. of Health, Canning, was the first speaker on the theme. He thanked the organizers for inviting them to the workshop and highlighted the activities of his Department in the region. Most of the patients admitted to the hospitals, he claims, belong to the “Below Poverty Line” (BPL). Mention was made about the introduction of Janani Sishu Suraksha Karyakram (JSSK) i.e. free medical treatment for the expecting mothers and infants (up to one year), which is operative in four blocks (viz. Gosaba, Basanti, Canning I & II).

He also mentioned about another program for Mother and Child Care, known as the National Rural Health Mission (NRHM) which has helped in decreasing child and maternal mortality. The health Department is actively working in the districts of Indian Bengal Delta. There are two most prevalent diseases, namely, Malaria and Kala Azar. The cases of Kala Azar are more frequent in the Chowrabikta Gram Panchayat of Basanti Block. He also shared his knowledge about the possible seasonal occurrence of Malaria i.e. during summers and during rainy seasons, pointing out that, the seasonal variance could affect the breeding periods of the Malaria vectors (mosquito). Mentions were also made about a special group of women (recognized as women clad in pink saris), who go around the villages in the blocks treating malaria cases. Similarly, there is another such women group, known as „Asha Karmi” (women who wear purple saris), treats pregnant woman and children under the age of one, besides providing treatment for the cases of diarrhea.

Mentions were also made about the 3-tier level structure of the District Hospitals (viz. Tertiary-BD College, Secondary-Canning Hospitals and the highest hierarchy hospitals in the cities). If the treatment cannot be done at one level, then the patients are being referred to

the city hospitals. He also pointed out that the seasonal variations could also lead to the increase in the Snake-bite cases in the area, which the department is already taking care off. The increasing trend of Malaria could also be held responsible due to the unhygienic living conditions of the rural people, living in the mud houses, unprotected, which further serve as the breeding grounds for these mosquitoes.

On being questioned by Mr. Subhas Acharya, one of the Panelists, on the effectiveness of the Disaster Management Committees, he pointed out that, in every block there is a Disaster Management Team, whose members are largely from the Department of Health. According to him, the team is fully functional giving the example, of the flood incident which occurred in Canning in the month of July, this year, when the team promptly responded.

Dr. Ghosh, Director CED, enquired whether it would be helpful if a Paramedic Training Program could be organised for volunteers from NGO/CBO in the region who in turn could assist during the period of disaster. Dr. Sarkar, acknowledge the benefit of such training and for which the Block Samity could approach with a regulation in this regard.

- Mr. Arun Kumar Deb, Fishery Expert-Officer In Charge (FEO), Canning I, acknowledged the Presentees and extended his heartfelt gratitude for inviting him to the workshop. According to him, due to heavy rainfall this year, there was an acute problem of drinking water in the region. He further pointed out that, the issue of water shortage would be the main cause, if another world war would take place. He gave a brief note on the science behind climate change.

Dr. Ghosh, Director CED, insisted him to highlight the initiatives undertaken by the Fishery Department in Sundarbans in the changing climate scenario. To this, Mr. Deb, added that the environmental changes is leading to the increase of Brackish water ponds affecting agriculture and fisheries, due to this some of the indigenous fish species (koi, singhi, tangra and magur) have become locally unavailable. The department is presently working on developing new technologies to resolve the crisis.

- Dr. Uttam Kumar Mondol, ICAR- CSSRI, RRS, Canning Town, gave a power point presentation on the activities of local CSIR Laboratories. It was observed that, the highest rainfall recorded in the month of July, this year was 838.4 millimeter. He pointed out two major seasonal problems affecting the region i.e., salinisation of the agricultural fields during summers and the problem of water logging during rainy seasons. To overcome this situation, the department is working under the National Innovations in Climate Resilient Agriculture (NICRA) supported by Indian Council of Agricultural Research (ICAR). He further pointed out that, ICAR has developed few technologies (viz. farm- pond technology, deep furrow and high ridge technology, broad bed and furrow technology, paddy cum fish technology and brackish water aquaculture through rain water harvesting) to combat climate stress. These land shaping activities undertaken, resulted in the increase of cropping intensity, introduction of the salt tolerant paddy cultivation, initiation of agro forestry with brackish water fish cultivation, besides, vermin composting.

- Mr. Subhas Chandra Acharya, Former Joint Director, Sundarban Development Board (SDB) & Convener for the Sectoral Plan for Sundarbans CCA, started with the note that regarding the theme in question, the problem is more of talk and less of action. He shared his experience on the preparation of West Bengal State Climate Change Action Plan

(SAPCC) and his association during the formulation of the sectoral plan on Sundarbans undertaken National Action Plan for Climate Change (NAPCC). He clearly pointed out that the stress was given on both Adaptation & Mitigation in the Sectoral Plan for Indian Bengal Delta. He further claimed that the region is already experiencing effects of Climate Change. He pointed out that for the formulation of the West Bengal SAPCC; no stakeholders were consulted but relied on review of various reports, research and websites.

He pointed out that, the devastation of "Cyclone Aila" has led to the creation of saline banks i.e. agricultural lands ingressed by saline water, unfit for agricultural production, on various islands facing the sea. Earlier the entire Mangroves on the islands of Indian Sundarbans were cleared to accommodate people moving in from the adjoining areas of East Bengal (after Republic of Bangladesh), Midnapore district and states of Odisha. But in recent times due to cyclones, rising of sea level and land subsidence, the area is witnessing out migration of the population. The destination of the migrated population can be traced to fringes of the Kolkata Metropolitan Region viz. Baruipur, Sonarpur, Behala and others. He also mentioned about the forms of Migration observed from the region viz. Forced Migration-which is due to the loss of livelihood and income, Willing Migration- among the youth is may be due to the lack of employment facility or training of skill development; he added that, though there are degree colleges for higher studies in the 16 blocks out

of 19 blocks of IBD but there is not a single Poly Technic Institute for imparting Vocational Training. Mentions were also made about the recorded number population displaced in last 30 years totaling more than 7, 000 and of Seasonal Migration - e.g. people migrating to Kerala to work in Coconut farms, during lean season.

He clearly stated that, migration should now be considered as a strategy of Adaptation because the land per person ratio is 0.06%, with a population of 4.7 million. He also pointed that, due to lack of skill development and training, the emigrants often takes up toilet cleaning and sweeping as their means of livelihood in places like Delhi. He also stated that since Cyclone Aila occurred during daytime, the number of casualties were less. The villages in the areas like Atapur, Jharkhali, Dulduli, and Patharpratima were the most affected because of the ineffectiveness of the Early Warning System and the slow evacuation process, which still remains undeveloped.

He further pointed out that, there are cases of in-migration observed, in the Blocks of Kakdwip from the nearby village islands. Mentions were also made regarding a sharp decline in the agriculture landholdings from 3.15 lakh hectares in 1981 to 2.41 lakh hectares in 2011, from the islands of Indian Bengal Delta. He focused on the sharp increase in the monsoon rainfall distribution of 848 millimeter during a span of 28 days (i.e. 157% increases) in 2015. This situation has led to water logging in the agricultural fields, which have damaged the standing crops such as paddy.

- Commenting on Mr. Acharya's statement, Dr. A K Ghosh stated that the available data shows that, at least 2 million people were affected by Cyclone Aila in 2009. About 1300 km length of embankment was breached and 197 human deaths were reported besides, yet to be estimated loss of live stocks.

Mr. Acharya also emphasized on the need for skill development of the local people on use of handlooms and the crafts to increase their per capita income, and also in the service

industry viz. local tourism, and increasing the height of the embankments, as the three measures that could lessen migration. He felt the importance that practical skill development would provide more opportunity to the local youth, which would further contribute to the growth of area's Gross Domestic Product (GDP).

Further mentions were made regarding the construction of 33 bridges across the islands in IBD, while 22 more are still awaiting construction, whether this infrastructural progress could bring in change to the present scenario towards better adaptation. He ended his speech with the possibility of seeking ways by which the people of IBD would continue to adapt in the future.

Activity 3

- Participants were divided into three groups for focused discussions on the given topics.
- Reaction of the community during Natural Disaster/"Cyclone Aila" in 2009?
- Effectiveness of the Early Warning System/Evacuation Plan/Cyclone Shelters, if any?
- Experience of Post Disaster "Cyclone Aila" scenario?
- What are the Adaptation measures, in terms of Lives, Livelihood in the area? Are these initiated by the Community or the Government, if any?
- Is Gender Sensitivity needed to promote certain kind of Adaptation measures? If yes, how?
- Experience of Post "Cyclone Aila" period's relief?
- Is there any case of Migration from the area?
- If yes, the why? Who is the principle Migrants (able bodied male/some selected members/entire family)?
- What are the major areas accounting migration? What are preferred destinations of Migrants?
- What are the problems/issues/challenges that prevent issues being effectively addressed, or policy choices being implemented? Are these related to governance or some other factors? If any, how?
- Are there problems/issues with governance (legal, institutional, policy) framework that promote or inhibit certain kinds of adaptation? If any, how?
- Has attention been paid by the Government to the needs of women, children, elderly and people with special needs? If any, how?
- Ms. Sunita Dey, Junior Researcher DECCMA-CED, circulated the questions among the team members, translated in the vernacular language (Bangla) to help the participants with better communication during group discussions.
- Ms. Sunita Dey and Ms. Clare Lizamit Samling, Junior Researcher DECCMA-CED, coordinated with one of the groups to make them understand the given questions (in

vernacular) and helped selecting two rapporteurs-one male and one female to present on behalf of each of the groups. Each of the groups was given 20 minutes for the discussion.

- Post Graduate students (2 female & 2 male students) of Human Rights & Zoology Department, University of Calcutta, who also were present at the Stakeholder Meetings, assisted (2 students per group) in writing the observations from each of the groups. It was ensured that, opinions expressed by both male and female members of the group are equally given importance and recorded.

Afternoon Session ACTIVITY 3 (cont.):

- Presentation on the Group Findings: The following points could be noted from the discussions,

Group I

Ms. Sabitri Pal, President, Southern Health Improvement Samity (SHIS) represented the group, recalling the event of Cyclone Aila of 2009, almost all of the team members unanimously shared that it was the most devastating natural disaster they faced, till date. However, the group also shared their experiences of getting affected by Tsunami, few years back in Sundarbans, but admitted the damage was not severe. It was evident during the discussion that, the news of the advent of cyclone Aila was disseminated to a few regions over radio, but most of them did not take the message seriously as they have least faith on the natural calamity forecast provided by the Indian Meteorological Department (IMD). So, the people were not at all prepared and no prior evacuation plan was executed.

During Post Aila period, certain places were identified (like school buildings) and new buildings has come up, called as “Cyclone and Flood Shelters”, where the village people can take protection, during a disaster hit. Many among the group members were of the opinion that, in future, the shelters should be built at a place, easily accessible to the people dwelling especially, near the embankments. Mentions were also made regarding drinking water crisis during post cyclone Aila, due to the contamination of the fresh/sweet water sources. The crisis severely affected the sweet water fish culture, cultivation of paddy and other vegetables. Destruction of human lives, cattle and houses were also reported, severely affecting the social and economic structure on these islands. Most of the people had no access to food, clothing and basic medicines” for more than a week or so.

Hardly any pro-active measures were taken to protect people from the rampage of cyclone and other natural calamities, on the islands of Sundarbans. She referred to one of the group members, Haider Ali (TSRD) mentioning their organisation’s effort of creating “Dharma Gola” i.e. grains storage, which helped the people to overcome the crisis. Almost every group members agreed to the fact that, special attention should be given for the provision of vocational training and development, especially for women folk. Proper training is also needed for Paddy processing, embroidery work, jari work, fish cultivation, poultry farming, micro financing, Jam & jelly making, tailoring, doormat creating, Jute bag making, etc. They believe that, these training and knowledge sharing, would open up the way of independent livelihood earnings among the locals in future. Along with training facility separate bathing enclosure, awareness and advice regarding health-hygiene, campaign for both mother and child, special educational camps for elders and women, might bring in change to the present

scenario. Many of them have agreed upon the fact that, very less has been done for the women folk in Sundarbans, compare to the current needs, for the betterment of livelihood.

People of Sundarbans are largely agro-based highly dependent on the intensive subsistence agriculture and rearing of livestock, who are highly sensitive to the events of natural calamity. Therefore, there is a requirement of infiltration of more secondary and tertiary activities to encounter the economic the adverse situation faced by the people.

In case of migration, maximum cases indicate mostly Male members (30%) and few females (10-15%), and in rare cases, entire family emigration takes place. It was also reported that, most of them are temporarily migrating those who are largely dependent on seasonal employment. Recently, farmers are also seen to migrate to various places like Kolkata and in the peri urban places like Sonarpur and Behala, due to unpredictable weather conditions and inadequate farming infrastructure, besides lack of economic prospects. However, people are interested to move to places like, Kerala, Tamil Nadu, Mumbai, Andhra Pradesh, Delhi, Ahmadabad, Andaman and Gujarat. Overseas countries like Saudi Arabia and other countries of Middle-East have high preferences related to better earnings. Majority seems to be working in gold factory, or as construction labour, daily labour, embroidery work (Chikankari), besides, also working as sweeper and room boy in hotels, malls and other places.

Main problems identified during group discussion, is lack of employment, lack skill development, political corruption, less awareness and infiltration of various government schemes to the village grass root level. Therefore, there is urgent need and requirement of providing training to the people in the fields of poultry farming, mobile repairing, Goat farming, and computer hardwiring. Governmental Schemes such as – NHM (National Health Mission), ICDS (Integrated Child Development Scheme) have come to the places but there is a requirement of infiltration at the block levels. ASHA workers under Janani Sishu Suraksha Karyakram (JSSK) are providing services, but the current service and infrastructure provided does not meet the overall need and demand. Further, they have also pointed out the lack of proper planning and implementation, among the government departments, which could be held responsible for the present drawbacks.

Group II

Mr. Rabindranath Mondal, Tagore Society for Rural development (TSRD) Rangabelia, presented on behalf of the group (of 05 female and 03 male). They recalled Cyclone Aila in 2009 as the major natural destruction event during recent past, among several others. Recently, in the month of July 2015, the region receives heavy rainfall resulting in flood, water logging and affecting standing agricultural crops, besides, hampering aquaculture. The mechanism of early warning remained non-functional in majority of the area, but few villages under Rangabelia Gram Panchayat (GP) got the warning from various sources, which they further disseminated to the nearby adjoining areas. According to them, the worst affected areas include several GP's (viz. Gopalganj and Kaikhali) under Kultali Block. Other than loss of lives and livestock, devastation of property in the form of valuable documents and papers, agricultural yield and fisheries was severe. Some of them had to survive without food and safe drinking water for as long as a week or so, which triggered acute cases of diarrhea in the entire region.

During the crisis, various organizations like, UNICEF, Ram Krishna Mission, TSRD, distributed relief materials. The relief distribution from the government sector took longer time to disseminate to the affected areas, due to interruption of the transport and communication system. The Government initiated relief in the remote villages through Helicopter services, went unutilized, as the materials were dropped into the water and became inaccessible and contaminated. The disaster hit people took shelter in the school buildings and places comparatively higher elevation. The people in the region believe that, had not the event of Cyclone Aila taken place during daytime, the cases of human mortality would have increased many folds.

The then school buildings turned into emergency shelter during the disaster, lacked adequate space to accommodate all the people in the village and its adjoining. It did not have proper and separate sanitation facility for men and women, which led to the unhygienic conditions and spread of several contagious diseases.

Single cropping agriculture (paddy) continued to remain hindered, for about three years after Cyclone Aila in 2009, largely due to salinisation of the soil. The allocation of Government compensation for partially affected households amounts to INR 5, 000/family, whereas, fully affected households received INR 10, 000/family. But in reality, only 60% households have received the government compensation packages, but now, they are apprehensive that the Government Officers often functioned in a highly politicized mode.

Mentions were made about the initiatives taken by the local NGO's like, Lokmata Rani Rashmoni Mission (LRRM), in the areas of Skill Development (viz. Duckery, indigenous fisheries cultivation, sewing and stitching for women free of cost). The major areas include, Purba Gurguria, Uttar Gurguria, and Uttar Debipur. While, similar initiatives like mobile and cycle repairing, computer hardwiring and tailoring, has been taken up by TSRD, (in exchange of minimum registration fees of INR 2, 000/- inclusive of fooding and lodging, which could be paid in installments; on completion of the training the trainees are provided with a toolbox). It was reported with TSRD that nearly 500 students have been trained by them during last three years, of which 50% are working independently. The selection of the areas of Skill Development is identified through local surveys and according to the peoples' demand.

Migration cases largely include single member migrating (majorly male members) due to unavailability of scope of work round the year (365 days). This group of migrants comprised of both educated and uneducated members, largely male members is found working as labourers in construction sector, garment factories and stone cutting industry. The preferable places as identified are Bangalore, places in Kerala and Tamil Nadu, Surat, Hyderabad, Andaman and even far off places in the Middle East and Italy. In far off destinations they are often guided through the agents or from the earlier sources. These receiving areas are chosen because of higher wages, than in compare to local wages.

The current prevalent problems identified even after six years of Cyclone Aila, are, lack of proper sanitation facilities, less attention towards reconstruction of the breach embankments, lack of infrastructural facilities like electricity and roads, besides inadequate income generating facilities and social problems like alcoholism. They admit lack of awareness regarding Adaptation Fund and government schemes.

Group III

Mr. Kanai Lal Sarkar, from Tagore Society for Rural Development (TSRD), presented on behalf of the group and informed that Cyclone Aila in 2009 was the most devastating event in the recent past. He also pointed that, there was no dissemination of early warning on behalf of the government. He referred to one of the group member, Ms. Soma Saha, WWF-I, mentioning about the receipt of alert (over the frequency covered) on Mousuni Island from Bangladesh radio. Due to the inefficient infrastructure and weak lines of communication, people on the islands failed to realize the actual intensity and the magnitude of the event, since phenomenon of high tides and cyclones are common in the area.

Mentions were also made about the lack of government-built flood shelters with inadequate infrastructures to serve larger population on these islands. They also pointed out that, mainly school buildings or other concrete buildings or uplands are taken as shelter during floods. Baliara High School, Baghdanga on Mousuni Island, and another at Jharkhali have been identified as flood shelter by government after Cyclone Aila. Report of a few other Shelters viz. on the islands of Bali, Sagar was also made. Almost everyone in the group agreed that, there was water logging at least for 15 days immediately after Cyclone Aila due to breaching of earthen embankment and coastal inundation. The concept of running community kitchen for over a month during post cyclone Aila in the water logged areas on Mousuni Island was the only support supply of food to disaster hit community. Government reliefs were provided through Panchayat, like disinfectants, medicines and tarpaulins, but the supplied quantity was very less in compare to the need.

He also mentioned about certain places under Gosaba Block viz. Choto Mollakhali and Lahiripur, which were among the worst affected areas. Mentions can be found of some problems viz. access to safe drinking water, lack of proper sanitation and hygiene, increase of water borne and skin diseases, loss of cattle, damage of houses and more importantly loss of agriculture and fisheries due to increase of salinity and saline contamination of the fresh water ponds. No proper pro-active plan was made by the Disaster Management Department to safeguard the life and livelihood of the disaster affected people.

Mention was made of a Project called „World vision“, which provided modern agricultural equipments and knowledge about the salt tolerant traditional farmers” choice paddy variety in the region. WWF-I in collaboration with local NGOs was engaged in distribution of salt tolerant paddy seeds and excavation of ponds for rainwater harvesting for drinking purposes. Mentions were made of the service of Ramakrishna Mission, Bharat Sevashram and Marwari Relief Society in regard to excavation of ponds for rainwater harvesting.

Women members mentioned about the rising need for skill development, in the area, to cope up with the adverse situation after any natural calamity. Knowledge and training of working in cottage industry, hand works including rakhi making, tailoring, agarbati making and poultry farming should be initiated at a larger scale to meet the demands of local and city market.

In context of migration, it was pointed that, seasonal or temporary dislocation/commutation from the area is a common feature, which has been aggravated more during Post Cyclone Aila period. But the case of permanent migration (with entire family) occurrence is few. In maximum cases, male members are the first to migrate in search of better livelihood, especially as unskilled labor working in construction or factory worker or sweepers or on

daily wage basis. This trend of family migration often results in school dropouts and diverts these children as „child labors“. The trend of migration is observed exclusively towards the main landmass, i.e. to extended areas or suburbs of Kolkata (viz. Mahestala, Barasat, Sonarpur, Baruipur etc.) Report has been made, of people migrating to the far off places like, Tamil Nadu, Gujarat, Karnataka, and Maharashtra. Another trend has been observed especially from the islands of Sagar, people have opted to migrate to the Middle East countries for better livelihood (via agents on contractual basis as unskilled labourers).

Few of the major existing problems noted during the discussion are,

- Reconstruction of the damaged embankments,
- Improper planning and infrastructure development,
- Increase of saline blanks and salinity in the agricultural fields,
- Conversion of fresh water ponds into brackish water aquaculture
- The issue of receiving of Post Disaster compensation and
- Lack of adequate access to vaccination for children in the disease affected areas

Activity 4

- Feedback Session:

The Former Joint Director, Sundarban Development Board (Mr. S Acharya) focused specially on the need for setting up the Skill Development Centre at the earliest and expressed his hope that, International funding for Adaptation, the sooner the better, may enable to achieve such a program.

Representatives from the Department of Health and Fisheries, Govt. Of West Bengal, mentioned that the event of cyclone Aila had drawn attention in the past, which led to the development of a separate division to look into the Climate Change related issues in the region. Both the departments are active, but yet to develop a mechanism as how the common citizen can approach and develop faith, to enable the department to serve better. May be a platform like this, might be essential in future as well, to bridge the gap between government and common citizens.

The NGO/CBO representatives in general focused on the need for financial support, especially from banks and other financial institutions, to undertake programs for effective implementations of Adaptation schemes including the construction of Cyclone shelters and revival of Medicinal plants, especially, in the most vulnerable blocks of IBD. They were of the opinion that, it would have been better if the organizers in future can have the provision of inviting the representatives from the Panchayat Raj Institution and the Elected Members of Local Self Government.

In response Dr. A K Ghosh, mentioned that, although the representatives were invited but failed to appear.

Local group of Health Workers from the area were of the opinion that, Block Government Hospitals needs to be modernized and well equipped to face the challenges of Climate Change related disaster, capacities of patient intake should be increased along with the provision of adequate trained medical personnel. It was pointed out that, at present the “Sohaye Prokolpo” i.e. unit for the care of elderly people in the region, is completely ineffective and needs urgent attention.

The Women representatives of the SHG’s also demand adequate allocation of fund to undertake livelihood improvement program, in the Post-Aila Period as well as to combat with the future uncertainties. They also emphasized on the need of training in the areas of agriculture, besides, requirement for effective (reaching last mile individuals) early warning system and a effective evacuation plan at the Block levels. Prior attention is also needed for the safety and security of women and girl child during medical camps and disaster emergencies.

- Sum up Discussion by Dr. A K Ghosh, Director CED

Dr. Ghosh extended his heartfelt thanks to all the participants, who have travelled from far and wide distances. The day long discussion according to him clearly pointed out that; o State level Climate Change Action Plan on Sundarbans subsector is yet to be started in a visible manner

- o In spite of fund being released for construction of concrete embankments, the Land Acquisition Policy of the state prevented to achieve the target, which has so far reached only 20%. However, stakeholders seems to be doubtful of the effectiveness of any reconstructed embankments incase of cyclones hitting with greater intensity

- o Even after six years of Cyclone Aila, a large number of poor and marginalized communities are still to get Government support to rebuild dwelling houses and continue to live in misery, in make shift of polythene.

- o The issue of absence of lack of appropriate Disaster Management System, including lack Early Warning System and absence of Cyclone Shelters, as pointed out by the participants should be given immediate attention in view of the extreme vulnerability of IBD.

- o To achieve successful migration, failing Adaptation or as a part of Adaptation, immediate all out effort should be made to empower the able bodied male and women with appropriate skill development viz. plumbing, carpentry, electrical wiring, masonry, painting, stitching of garments, security guard as demand for such skilled people are increasing all over the country.

- The meeting has ended with a vote of thanks, given by Dr. A K Ghosh, Director CED

NOTE: 1. Dr. Jose Mathew – Communicated over phone, unable to attend the Stakeholder Meeting due to another urgent meeting called by Secretary, GoWB