

Research Report *a source book*

Polderisation in Tidal Floodplains:

Exploring Impacts on Social Processes in Bangladesh Southwest Delta

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UNESCO-IHE
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This research report contains the findings of research 'Understanding the Impacts of Flood Polder on the social processes in southwest coastal Bangladesh' under UNESCO-IHE Partnership Research Fund (UPaRF), Integrating the dynamics of social and biophysical processes to support delta management (add-on NICHE Bangladesh 155 and NWO WOTRO Bangladesh). The project was funded by the Dutch government, under the DGIS-UNESCO-IHE Development Cooperation Programme (DUPC).

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Exploring Impacts on Social Processes in Bangladesh Southwest Delta

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Published by

Center for Sustainable Development, University of Liberal Arts Bangladesh.

House 56, Road 4/A, Dhanmondi, Dhaka 1209, Bangladesh. www.ulab.edu.bd

Acknowledgement

My gratefulness first go to the informants of my research, especially the women, men, youth and the senior citizens of Paikgacha of Khulna district. I am grateful to officials of different departments of the government for their kind cooperation and help in my data collection in Paikgacha. I am indebted to my Field Research Assistant Mr. Nur Bhuiya for his very sincere work taking all the struggling traveling to Paikgacha.

I am very much thankful to UNESCO-IHE for giving me the opportunity of conducting this empirical research by accepting me as a postdoctoral researcher. I owe gratefulness to the project team members Dr. Eoruen Warner of WUR, Dr. Giuliano Di Baldassarre, Ms. Jeltsje Kemerink and Dr. Michelle Kooy of UNESCO-IHE for their kind cooperation and intellectual supports in my research work. I must express my especial thanks and gratefulness to Dr. Michelle Kooy for her all out supports for conducting this research.

My colleagues at ULAB-CSD and my son Tahmid Huq Easher made me indebted by providing me with supports in editing, formatting, designing and publishing this report.

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Preface

This research report is the output of my postdoctoral research on impacts of Polder on social processes. I have conducted this research during the period of September 2013 – December 2014. My postdoctoral research was titled as Polderisation in Tidal Floodplains: Exploring Impacts on Social Processes in Bangladesh Southwest Delta. My convincing points, which were agreed upon by the research team members at UNESCO-IHE and WUR as well as my colleagues at ULAB-CSD, to publish my research findings as a research report are: this report would serve as sources book for researchers, especially the young scientists, the academics, the policy people, and the development practitioners. This research report is being published apart from few articles in peer reviewed journals.

This research report contains the findings of research, narratives of interviews, and the working paper that I prepared on literature review prior to my field research. My postdoctoral research was conducted under UNESCO-IHE Partnership Research Fund (UPaRF), Integrating the dynamics of social and biophysical processes to support delta management (add-on NICHE Bangladesh 155 and NWO WOTRO Bangladesh). The project was funded by the Dutch government, under the DGIS-UNESCO-IHE Development Cooperation Programme (DUPC).

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Chapter 1

Introduction

The southwest coastal floodplain region of Bangladesh belongs principally to agro-ecological zone of Ganges Tidal Floodplain. This region is potential area of newly reclaimed cultivable land (PDO-ICZMP, 2005). The tidal floodplain has an almost level landscape crossed by innumerable, often interconnecting, tidal rivers and creeks. Differences in elevation between river banks and basin centers usually are about 1 meter. The region is naturally characterized by having tidal floodplains; capillary river networks; the rivers bring enough siltation to the floodplains through their tidal process; rivers are connected with *beels* (wetlands) that functions as tidal water reservoir and drainage; tidal sediment forms landscape, and enrich land fertility (Nandy, 2011). The area of these *beels* is around 4840 ha (PDO-ICZMP, 2005). Gradual morphological changes have major impacts on the region, which is almost impossible to control (Maddrell, 1993).

Southwest region is consisted of six districts: Khulna, Bagerhat, Satkhira, Jessore, Narail, and Gopalganj (PDO-ICZMP, 2005). The total population stands at 14.11 million, with a population density of 555 per sq. km. The population growth rate between 2001-2011 is 0.6 for Khulna region, compared to national average growth rate of 1.34. The incidence of poverty in Khulna Division is 32.1% while the national average is 31.5% (BBS, 2011).

Polderization

The southwest coastal region of Bangladesh is full of opportunities and vulnerabilities (Coastal Zone Policy, 2005). These two dynamics were tried to deal with local landlords' initiatives of construction of small embankments around individual land to limit saline water overflow and prevent crop damage since the 17th century. The villagers collectively built earthen embankments on both sides of river bank to protect their *Aman* crop. This embankment was built for eight month period every year, because this earthen embankment was washed away by the monsoon tidal surge (Nady, 2011). However, this traditional mechanism of construction of embankments through local efforts practically ceased in 1947 (Islam, 2006).

Following Krug Mission's report, the government designed the Coastal Embankment Project (CEP) in 1961 and constructed 129 polders, 5588 kilometers coastal embankment and 1062 sluice gates to cover 1.01 million hectare coastal land area in tidal floodplains of Bangladesh coastal delta by the end of 1971 with USAID funding support and the World Bank's loan (PDO-ICZMP, 2005). The main purpose of the polder construction was to increase agriculture production in southwest region (*ibid*).

Rapid change in land use occurred in the area after the polderisation. Farmers made their land very productive. They went for intensive rice cultivation. High yield varieties of rice were introduced. Rice production was increased significantly. Some yields increased by 200–300% (Nishat, 1988).

The polderization contributed in significant socio-economic changes in southwest region. These changes embraced land based production increased; land owners' benefits ensured, small, marginal, and landless farmers got scope of doing agriculture through sharecropping systems, and the landless got employment opportunities in agriculture fields. But, these benefits were evaporated within a decade with the introduction of shrimp farming in the agriculture lands (Nandy et al, 2007). The salinity in tidal river water got increased because of obstacles in tidal system by the dikes and lowering of upstream freshwater flow (Nady, 2011). Around the same time, there was increased demand and a high price for shrimp on the international market. To earn hundreds time hire profit, the powerful people among the rich farmers, businessmen and party political leaders including local and outsiders initiated the shrimp (*Penaeus monodon*, which is popularly called *Bagda*) farming in the polderized rice field. Conflicts appeared on the surface centering the changes in land use, e.g., taking away small farmers agriculture land for shrimp farming by the power groups, violating embankment regulation (dike cut) to bring salt water for shrimp farming, creating oppression on the shrimp farming protesters, abuse of women, violence against the small, marginal and landless farmers, unemployment was increased, migration generated, land tenure system changed (Nandy et al 2007). All these have given a new shape to social and biophysical processes. Therefore, research is intended to understand clearly the polderization induced shaped and reshaped socio processes of southwest region of Bangladesh.

Research objectives:

1. Investigate the impacts of polderization in social processes of coastal tidal floodplains;
2. Identifying the interplays of socio-biophysical processes in polderized area;
3. Investigate the social processes of socio-biophysical interplays, focusing on 'transformation of rice cultivation to shrimp farming';
4. Investigate new shape of social processes.

Research Questions:

The main research question of this research was 'how did constitutive socio-nature processes shape the social landscape in the polderized southwest floodplains of Bangladesh'.

Specific Research (sub) Questions were:

- i. How did social relations shape the polder intervention?
- ii. How were social relations/organization shaped by the polder intervention?
- iii. What were the conflicts and the impacts of conflicts?
- iv. How did shrimp farming change the rural economy and labor market?
- v. Who benefited from this changing land use from rice cultivation to shrimp farming, which ways they are benefited?
- vi. Who are the losers? Why and how?
- vii. How the changes of rice cultivation to shrimp farming have impacted on gender?

Research Methodology

In order to attain the research objectives and explore the answers to research questions, attempts were made to collect both secondary and primary data. Secondary information were collected from reports, publications and printed materials of relevant government organizations e.g., Fisheries Department, Agriculture Department, Bangladesh Water Development Board, Upazilla Parishad, Export Import Bureau, and local NGOs working in flood polder areas. Secondary data were also gathered from research publications, articles in per reviewed journal and research reports of research organizations, Khulna University and IWF, BUET.

Foremost focus was given on primary data collection, which was collected from the primary stakeholders of the study area. Primary stakeholders included small, medium and large farmers. These farmers were engaged in rice cultivation in the first decade of polder and until the shrimp farming was introduced. Now, the small farmers are displaced from their land. They became shrimp farm laborers, rickshaw van puller, daily wage labourers, and many migrated to cities. Other groups of primary stakeholders are landless and shrimp farm laborers, labors in shrimp processing factories, shrimp fry collectors, shrimp feed collectors (snail collectors), and labor in shrimp/fish landing markets. Another category of primary stakeholders were women from small and medium farmers' households and landless people.

Primary data were also collected from power group members like; shrimp farm owners, village leaders, political party leaders, local moneylenders, brokers, shrimp traders, outside investors, and local government (Union Council) representatives, police, and government officials.

The study followed several methods and techniques for primary data collection. Several PRA Tools such as Social Mapping, Focus Group Discussion, and Transect Walk were utilized for data collection. Other methods such as group discussion, individual interview, case study, and observation were also adopted during the study.

Data Collection Process

The field research was carried out during the period of March - November 2014. On the basis of literature review and scoping study, discussions with Khulna based journalists, NGO leaders (who run projects in flood polder areas), and researchers from Khulna University, it was convincing that Paikgacha Upazilla is more relevant for conducting this research. Paikgacha, which is located at about 35 km towards southwest of Khulna city consisted of 10 Unions (Union Parishad is the lowest tier of rural local government). All these 10 unions are located inside the Polder no. 23. The whole polderized area was brought under intensive rice cultivation. But, at some point (after one decade of polderization), the rice fields were brought under shrimp farming over a period few years. The whole area under polder no. 23 has been experienced with socio-natural interplay processes.

The field research for primary data collection was conducted in the villages around the shrimp farms. Field research was conducted by the Postdoctoral Researcher Dr. Hamidul Huq with

assistance of a Research Assistant. Help of local college students, school teachers, village leaders, officer of Bangladesh Fisheries Research Institute was taken in identifying the primary stakeholders and in organizing interviews, group discussions, focus group discussions, and field observations. Furthermore, a checklist/questionnaire was followed in conducting interviews with individuals and groups, and in conducting FGDs. Note book, audio recorder, flip chart paper, and camera were used to keep data recorded. The research assistant aided the research process by transcribing, organizing and processing field data.

Research Findings

This research found that the flood polders have been taken by the power groups (businessmen, politicians, moneylenders, large farmers, local government leaders) as advantage of creating scope and opportunities of introducing saline water shrimp farming. This has led to the transformation of rice fields into shrimp farms. This transformation generated complexities in biophysical systems and generated serious impacts on social processes, e.g., established hegemony of power groups, destructed institutions and social harmony, created food insecurity, displaced the marginal, small and landless people from agriculture, established power groups' hegemonic land tenure system, created coercive environment for the marginal and poor people, pushed the women in vulnerability, and made the farmers indebted to moneylenders; both traditional and microcredit NGOs. Following sections present findings related to impacts of polder on social processes.

Agriculture

For the first 10-12 years after polderization it did have a positive effect on the economic situation of the people from Paikgacha. Due to a comparatively successful management of the flood during monsoon, farmers in the area were able to grow rice. People of the area observed ample food production and thus food security was ensured to an extent. Though surplus food was not produced at that period, at-least people had enough to pounce on. Due to sufficient natural siltation there were enough crops, while the water eco-system services were also available in ample quantity. There were practices of shared cropping and the community used to have open access to fisheries. The bio-diversity and natural environment supported the livestock. As the farmers depended on each other for farming, there were limited, if not any, power exercise between themselves or by external forces. The landless farmers worked in the lands and earned living, while the rich bio-diversity and open access to the natural food sources allowed them to avoid conflicts with landlords or bigger farmers. The family structure was simple in a sense that the work between men and women were segregated. The females looked after the household and in addition to that grew vegetables, fruits and took care of livestock adjacent to their household. The males on the other hand, were responsible for making the food available for the family through work outside household. The society was in harmony with the nature during the initial stages of the polderisation, which meant that there was no conflict over the usage of land or water bodies.

According to the gher owners (shrimp farm owners), who participated in the Focus Group Discussion (FGD), before shrimp farming was introduced in the area, the lifestyle was happy and

peaceful life; and there were no scarcity of food or livelihoods. There were cattle almost in every household and fodder was available. Chicken, duck, goat were also there. Plenty of open water fish was there. There were lots of trees around this area. Lots of fruits were available. The participants of the FGD shared: *'We had food for the whole year; we did not buy anything except salt. Though we did not have cash money in hand always, but we were not indebted. We were happy and there was peace in our area'*.

Shrimp farming

After a decade of polderisation, external businessmen, in collaboration with local large farmers, party political leaders, started saline water shrimp (*Penaeus monodon*, locally known as *Bagda*) farming taking more lands on lease from the small and medium farmers applying force/muscle power. They brought saline water for shrimp farming by breaching the rules and regulations. Over a period of 10/12 years, the whole area was brought under shrimp farming. Highly profitable export market of shrimp was the main attraction of shrimp farming.

Land leasing

Initially when the farmers leased out their lands, they received money for two years and within a year or at times before, they finished the money. There were also conflicts with regards to the lease rate as initially farmers did not understand how much was enough for them and later when new investors arrived, they offered more money to the farmer/land owners. So, negotiation took place between the land owners (farmer) and the old party. During this period the whole region experienced such negotiations inducing conflict between old investors (generally outside parties) and middleman, while new opportunists (local investors) kept on offering higher prices for leasing out land. Dissatisfaction between shrimp *gher* owners (investors and middlemen brokers) and farmers intensified due to the mentioned complexities. During this whole process farmer lost control over their land and eventually the land had to be leased to the powerful shrimp *gher* owners.

Unemployment

The immediate implication of shrimp farming was displacement of rice cultivation, which generated unemployment of the farmers fast. Shrimp farming required only 10-15 labours for 30 acres of land annually, while at least 10 to 15 labours were employed by rice cultivation per .33 acre per season. Though the farmers earn money against leasing out their lands, but they had no scope or very limited scope of investment for income generation. In the initial stage of shrimp farming leasing rate was taka 2000 (price of three *maund* rice/120 kg rice by which a family can run one month) per .33 acre land, currently it is around taka 8000 (price of five *maund* rice/200kg rice by which a family can run one month). A farmer who has three acre land can earn around taka 70000 - 72000 (Euro 700) per annum by which he can meet up only food for 8 -9 months. But, a family has several other expenses. The respondents reported that the farmers can run family up to four to six months by the earned money against land leasing.

As the farmers, landless do not have access to natural sources anymore, such land and water, they became workless and idle. In this situation they are forced to migrate in search of work. They go to

cities to work as rickshaw puller, construction labourer, etc. They also go to other inland districts to work in paddy fields during winter time. They return home in rainy season when there are some employment opportunities in the area.

Indebtedness

These conflicts with regards to control over land and water use led farmers towards borrowing money from multiple sources. They started taking loans from local money lenders and also forced their wives to borrow from micro-credit NGOs. As the official purpose of micro-credit is to invest in income generating activities, while they did not have access to their land where they could use it for farming or other purpose, the borrowed money is used for consumption. Hence, the loan from the NGOs became a burden for the family. The farmers migrate in search of income sources and also avoid the legal and social responsibilities associated with their loan. In the meanwhile, the women remain at home and face all the difficulties with regards to being responsible for the rest of the family (both financially and socially), bringing up her children and experiencing pressure from NGOs or money lenders. Furthermore, due to the financial responsibility of the family, the women are somewhat forced to choose to work in the shrimp gher in low wages. The migration of the males leads to multiple burden on the women as they are left alone to face family livelihoods burden, social oppression, and loan burden. Eventually, to suffice the multiple pressures the land has to be sold and loose the asset to shrimp gher owners.

Gender relation

Gender roles have changed over the period of changes through decades of shifting from rice cultivation to shrimp cultivation. Due to the regions' reasons for shifting to shrimp business, the women became vulnerable to oppression. They were oppressed economically by the shrimp gher owners, while their multiple-additional roles of a housewife and bread earner have made the women socially more vulnerable. Moreover, knowing that there are limited investment opportunities, male are forcing their wives to borrow money from NGOs. The female face pressure to payback borrowed money and are oppressed. So women's situation becomes far more oppressed, undermined, ignored, and discriminated in the region.

Dowry has increased along with divorce rate. Family ties have broken and mutual respect, cordiality has gone away. The family conflicts have increased and the social structure has changed, while the young generations have spoiled. Social ills like addictions, robbery, rape and women oppression has increased. Another decadence of the society is happening through employing women as daily wage laborers in the shrimp *ghers*, where the poor women are oppressed and abused.

Migration

After the initial first decade of polderisation, which led to an initial substantial production of crops, people in the locality did not migrate. The reasons behind not choosing to migrate were multiple; the prime reasons being the pull factors within the region. As the region, during that period, was observing increased crop production along with access to water eco-system services, the people of the region did not need to migrate. With the passing time, the region observed changes as

consequences of interventions of shrimp aquaculture. The changes are crop cultivation replaced by shrimp farming; local peoples' access to open fisheries was closed with interruption by the power groups because the open fisheries systems were converted into shrimp farming system by them. Such changes resulted in the gradual diminishing of employment, livelihood options and opportunities. Consequently, the people in the region, mostly involved in crop cultivation, took up migration as an easy option. About 30 % people, who are landless, have left the area with bag and baggage. They migrated because they were weak.

Migration, which was taken as an easy option initially, gradually started to unfold the underlying problems associated with it. As the land owner-farmers leased out their lands, they lost control over their land to the powerful gher owners and their associates. Afterwards, when the money taken from leased out land started to fall short from the needs, the farmers started lending money from multiple sources. They took loans from local brokers/Arotdars/local money lenders and also forced their wives to lend through micro-credit. As the purpose of micro-credit is to assist in income generating activities, while they did not have access to their land where they could use it for farming or other purpose and increase income, the loan from the NGOs became a burden for the family. To avoid the legal and financial pressure associated with the loan, the farmers were forced to migrate. In the meanwhile, the women remain at home and face all the difficulties with regards to being responsible for the rest of the family (both financially and socially), bringing up her children and experiencing pressure from NGOs or money lenders. Furthermore, due to the financial responsibility of the family, the women are somewhat forced to choose to work in the gher. The migration of the males leads to multiple burden on the women as they are left alone to face family livelihood burden, social oppression, and loan burden. Eventually, to suffice the multiple pressures the land has to be sold and loose the asset to gher owners.

Conflict

Due to the changes in the bio-physical state of the regions' environment, the social processes have undergone changes, which have resulted in power struggles between different interest groups. Conflicts were observed between new gher owners and the old ones, insiders and outsiders, and also between insiders. The conflicts also took place between gher owners and land owners over the time in trying to have access to the land for shrimp farming, while crop growers (both land owners and landless) were also in persistent conflict with the gher owners and their alliance. There are different forms of conflict associated with shrimp farming in the region and three inside vicious cycles have eaten up all of the incomes generated from shrimp farming. The cycles are:

- Vicious Cycle of Middlemen
- Vicious Cycle of Terrorists, and
- Vicious Circle of NGOs.

Vicious Cycle of Middlemen: The middlemen are a group of people who are less educated, cleavers. They create conflicts in the societies and if anyone does a good work, they fit enemies against them. At the same time they do double-dealing with the enemies. The main purpose of the

middlemen is to earn easy money. They are connected with the policemen, party politicians and NGOs in this regard.

Vicious Cycle of Terrorists: They are powerful and collect subscriptions directly. Even the police cannot escape from them and they also need to give subscriptions like the gher owners. The terrorists are backed by the local powerful group, UP chairman, and ministers of the parliaments. They are terrorists, they have arms, but are friends of police. If anybody goes against them, or denies giving subscriptions, they face a problem of life risk. They may take the positions of the gher owners, ransack the gher or office, take away the fish gathered for selling; sometimes family members (especially the female) may be tortured or kidnapped. Most of the times they drive away the outsiders (who come from other distance district and takes up gher business) by ruining them totally ruined and eventually taking away the positions of the gher owners.

Vicious Cycle of NGO: As the money flow in this area is good so hundreds of NGOs are grown in this area. The NGOs are dependent on the Middlemen to disburse loans and use help of the local terrorists to recover loans and interests. The NGOs are very much interested to give loan to the gher owners. They have their representatives and middlemen groups to keep close alliance with gher owners. NGOs' tendency is to give loans fewer amounts than the client require. For example, if a borrower needs a loan of taka five hundred thousand then the NGO will give him only taka one hundred and fifty thousands. Then this borrower is compelled to go to other lenders including the local Mohajan (local individual moneylenders). Mohajan charges interest rate about 60%, 80% or 100%. Once one borrows a loan, he must pay back the loan with the interest otherwise, he will lose his lands.

If an NGO gives a loan, its recovery installments start from next week of the loan received. The borrower must pay back the loan in 20 installments. NGO comes every week and per week installment is 10,000 taka for 150,000 taka loan. Often the borrower fails to manage this big amount. A miss of installment, makes compound interest. Then NGOs come with terrorists groups and create pressure to pay loan installment with interests instantly. The borrower, who is a shrimp farmer, is then bound to sell his shrimps immature and in less price. At that time the middlemen and terrorists and gher owners come to an agreement that after one month one middleman will harvest shrimp later and he took paid advance to the borrower.

Economy

Because of the changes in the bio-physical situation of the region, the income sources have shifted from agriculture to shrimp farming initially, and now to a unique system where people of the region have adopted local initiatives to address the changes in the physical environment. As the poor and landless do not have access to income generating natural sources such as land and open water, they are forced to migrate in search of work during winter. According to an interview: *'they have less work then; at times they go to Gopalganj and work in paddy fields, while some people go to Dhaka or Khulna for other works and return in rainy season when there are some earning opportunities.'* The changed economic activities in the region have initiated the shift of power from the farmers and

land owners to shrimp farm owners and investors. The big investors, both internal and external become economically and socially more powerful with the utilization of the land through this business. Whereas the middle class in the region, who are mostly people with limited land or poor laborers become victim of the hegemonic cycle. Most of them are forced to lease out their lands to the big gher owners, who are backed by partisan politicians and eventually they lose complete access of their land. Previously, prior to polderisation or immediately after polderisation, the people of the region were not unhappy and had ample food. They did not have huge amount of money but their economic situation were decent. As people had access to their own land and could avail open water sources, could survive in a decent manner. But with shrimp farming practices in the region, most of the small land owners have lost either access to their land or their lands are no more usable for crop cultivation. It is true, on the other hand, that several group of people have been financially benefitted from this business. The business chain involved have benefitted when the business has gone well. But at times due to the virus in the shrimps and loss due to several other reasons, a lot of gher owners have been left shattered.

Labor market

Prior to shrimp cultivation, the region experienced a market based around agricultural activities where farmers were directly involved in the market. Whereas, with the initiation of shrimp in the region has experienced the change in the market. Previously, where the labor market was full of men working in different parts and not centered towards one type of business only, now the labor market is not conducive for labors, regardless of male or female. The reason behind this is because the region was previously based on agriculture and thus required more labors and now in shrimp business the need for more labors has decreased comparatively. Moreover, the labor market was more sex-segregated previously, where mostly men dominated all aspects related to the aquiculture based business chain. With shrimp farming, the market requires less number of male workers, which resulted in unemployment. This has created a market environment bringing females in the workforce not by choice but through the structural setting of the market.

Who are benefitted?

Though the region has experienced a decaying socio-economic situation due to the advent of shrimp farming, there are several levels of people who are benefitted as well. The investors, who invest money on shrimp farming usually, gain a lot if they are able to invest ample. There is a general understanding that if someone invests 25 lakhs then the return would be close to 125 lakhs. There are large land owners, who are investors as well who benefit from shrimp business. They utilize their lands as well as money to earn money from this business. Some fry collectors benefit from this chain of business. They collect shrimp fries and sell to the brokers and thus earn money. As a result the brokers are connected with this chain of gain. They work as a sort of middlemen as they buy fries from the field and sell it to the gher owners with profit. Shrimp exporters and traders are directly involved as beneficiary of this business, while the Mohajon enjoy multiple levels of benefits because of their roles. They lend money to the fish traders and collect money as an exchange of service from both the buyer and seller. As part of the total supply chain involved in the

shrimp business, female labors, fish feed producers, and traders are benefitted financially. According to the informants, the people who belong to upper 20% are the main beneficiaries of shrimp farming (Figure 2). These people are capital investors or shrimp farm owners, large farmers/land owners, moneylenders, and traders.

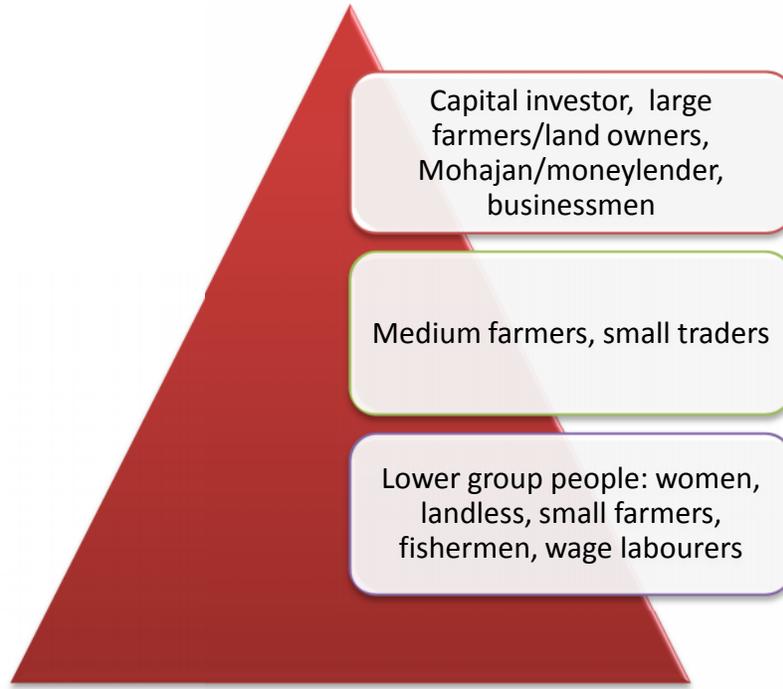


Figure 1: Distribution of Social Strata in flood polder area

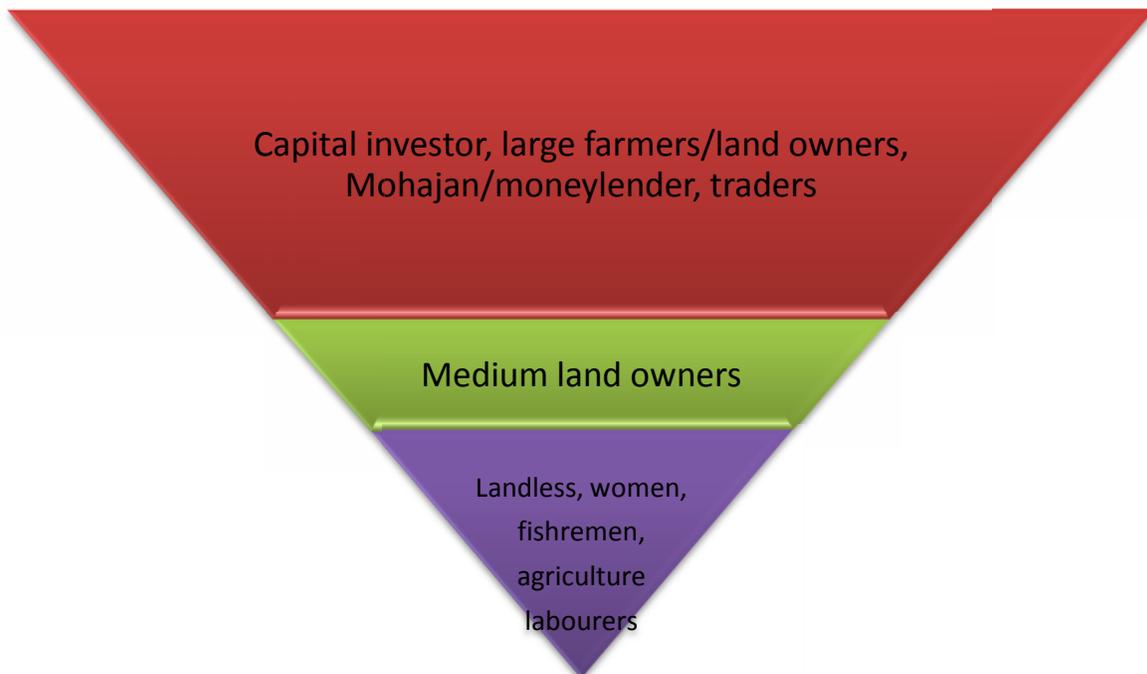


Figure 2: Distribution of benefits from Shrimp farming

During the first decade of flood polder or during the period of agriculture/crop production in polderised area, distribution of benefits looked like below (Figure 3):

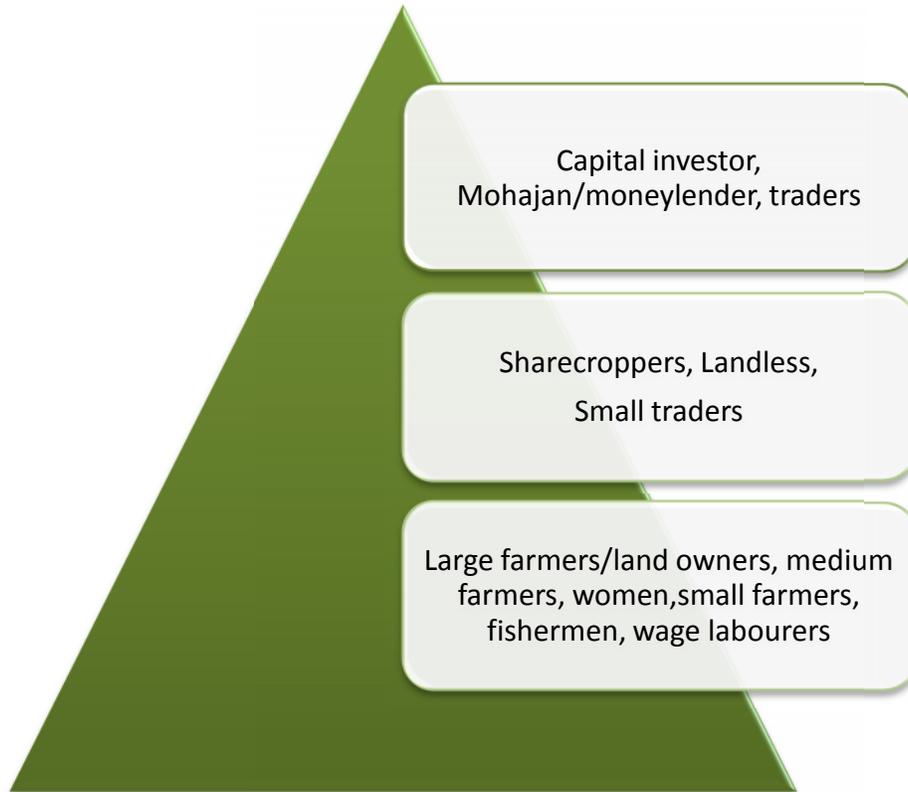


Figure 3: Distribution of beneficiaries in polderised area

Figure 4: Vicious cycle that generated centering the shrimp farming



Role of government

The respondents opined, the polder was built with an intention to protect the land from saline water intrusion which happens with the emergence of tidal surge. The foremost goal of polderisation was increasing cropping intensity and for some years the farmers were vastly benefitted by polderisation. But with the introduction of saline water shrimp farming, the main objective of polderisation got slowly started to become dysfunctional. Government did not respond against introducing and scaling up of shrimp farming in place of rice cultivation in the region, nor did they consider the consequences. The respondents expressed, in one way government prohibited bringing saline water in to the cropland, and on the other hand allowed the investors to adopt shrimp farming in the same land. Such an unwanted situation could take place because the investors in shrimp farming belonged or associated with the political party leaders, elected parliamentary members, rich businessmen, and collaborated with the local administration including police and higher *mastans* (hooligans) assisted by the political party leaders. According to informants, *There is very high connection between ghers and politics. I think, gher owners are the fathers of politics. Politicians come to the gher owners to take du'a (blessings), because, without their donations they can't run their elections. You see, there are some big ghers, within this 4 or 5 months two times the Parliament Member has come and we see big arrangements of feast. Always MPs (Member of Parliament) are their big brothers, Police are their friends, terrorists are their servants. You can't do anything against them. Sometimes gher owners become the politicians. In our locality you can observe, no important roads, culverts or bridges are made or repair by the government initiatives. Only unimportant roads, culverts or bridges where gher owners' interests are involved, are made by the governments.*

The respondents expressed their highly critical observations on government role in relation to using the advantages of flood polder. Government, seeing that the local people, especially the farmers, using land and water in line of official objectives of the flood polder, that is growing crops intensively, growing livestock and using the benefits of open water fisheries, allowed the commercial shrimp farming that displaced the agriculture all out. Bangladesh Water Development Board (BWDB) held back rather than taking any actions against the shrimp farm owners who breached the law – cut embankment, kept the sluice gates open the bring saline water in the croplands for shrimp farming. The respondents opined, if the law was enforced, shrimp farming would never have been possible by the outsiders in their area, and the area would have flourished with continued cropping intensity. The farmers, the land less, the fishermen, even the businessmen would have benefitted in terms of food security, economic growth and social harmony. Livelihoods of landless and the fishermen would have been better. Farmers as a whole would have been benefitted in terms of growing food, producing fish, livestock, and social harmony could have been peacefully maintained. The local people expect the government and their political agencies would change their behavior to protect interests of the local people.

Conclusion

Polderisation in coastal zone of Bangladesh has been experiencing with multi facet opinions by insiders and outsiders. It starts from acceptance, protests, conflicts, violence, and biophysical changes. Impacts of polder on socio-natural processes are explicit. This study focused on social processes. The study explored, polder created enabling environment for agricultural practices of the local people, which contributed in improving livelihoods, economic growth, livelihoods assets, and food security. But, allowing (government kept silent against it) shrimp farming in place of rice caused displacement of crops cultivation, livestock, livelihoods opportunities, and access to ecosystem services of the local people. Official objectives of flood polder got killed by the shrimp farming against which no action taken by the government. Though the farmers, except the very large farmers who were partnering with outside investors, protested but failed to prevent shrimp farming because the investors happened to be very powerful and protected by the government agencies and party political forces. Agriculture, after polderisation, benefitted all level of local people, but shrimp farming benefitted only the investors, outside businessmen, local moneylenders and a small number of traders most. Some local people are benefitted in the market chain as small traders, wage labourer, transport worker, and retailers. Some people are benefitted out of selling fish feed, catching and selling shrimp fry and working in shrimp farm as wage labourer.

There have been many project interventions in the area by the government, NGOs and private business organizations. But, as the respondents shared, all these projects have been rather creating more liabilities of the local people instead of solving their problems. It is because, shrimp farming has closed the scope and opportunity of diversifications. Apart from salinisation, river got silted up, canal and channels have been filled up long ago, water flow slowed down; biodiversity has been lost. Study suggests, interplays between bio-physical and social process in polderised areas are highly influential in social shaping processes. Well documented interplays between biophysical system and social processes of polderised areas need to be accounted in policy processes and governance systems. This study also suggests, the technical universities/institutions need to include these interplays issues in their academic programme.

Chapter 2

Annexure

Narratives of interviews and FGDs

Narrative 1

1st visit to Paikgasa

Visit period: 19-21 March 2014, staying at Guest House of Bangladesh Fisheries Research Institute (BFRI), Paikgasa.

Places visited: Gher area of Paikgasa Village and Betbunia; Paikgasa Village, and bazaar at Paikgasa Village; Fish Landing Station at Paikgasa; Offices of the Fisheries and Agriculture Extension Departments.

Interviews conducted with: President of Water Management Committee [Sholadana (Union) Pani Babasthapana Committee], resides at Paikgasa Village; Belayet Gazi – a tea stall owner at Paikgasa Village Bazar, he is also a small farmer (owns 66 decimal land); Zaheduzzaman Ripon – a college student cum Gher Owner of village Laskar; Abdul Aziz – a fish businessman of village Betbunia; Majibar Mia of Kaguji Arot, A. Rob and Mr. Raju of Urmi Matsho Arot; some retailers at fish landing station; fie rickshaw–van pullers and one ex-crab businessman who is currently running a medicine shop at Paikgasa; Interviews conducted with Agriculture Extension Officer and Assistant Fisheries Officer of Paikgasa. I have also talked to one Scientific Officer of BFRI of Paikgasa and one local journalist.

General Information: Total area of Paikgasa Upazila is 383.87 sq. km. Total population is 247983 of which 123900 are male and 124083 are female. Paikgasa is a Pauroshova (Urban Local Government). There are 10 Unions under Paikgasa Upazila.

Land and land uses: Total amount of agriculture land is 28169.23 ha of which 100% was brought under rice cultivation during post polderisation period. The land owner farmers cultivated rice in their land. The landless were engaged in agriculture work as laborer. Many of landless were engaged in rice production in share cropping system. The large farmers allowed the small and landless in share cropping. Many laborers came to this area during paddy transplanted and harvesting time in those days. But, “our villagers now to other areas like Faridapur, Netrokona to work as agriculture laborers”.

Shrimp farming: There are 3940 Shrimp Ghers in Paikgasa Upazila covering 17145 ha land. Other types of fish are also cultured in shrimp gher, which are known as ‘white fish’. Local people also do aquaculture in 6010 ponds, which cover 350.52 ha area. Total fish production in 2013 was 5790.5 metric ton shrimp and 4710.8 metric ton white fish.

Interview with Mr. Sarder Amin Uddin (60), President of Sholadana Water Management Committee, Block C, BWDB

Date of interview: 20 March (Morning), 2014

Location: Village Purulia, Sholadana Union, Paikgacha

In the morning of 20 March 2014 around 8:30 am I arrived at a home at “Village Paikgacha” near the embankment of Polder No.23. I saw one man was cleaning boundary wall of that house. I offered Salaam and he replied and came forward to talk to me. I introduced myself and the purpose of my visit to Paikgacha. I asked whether he can spend some time for talking with me. He gladly accepted and invited me to go inside of the house. But, there were nice concrete benches at the entry of his house, on embankment side and airy. I opted to sit there. I told him that I’m a researcher and also teach at BRAC University, engaged in collaborative research projects of BUET and the purposes of my research. Then the gentleman also shared about his engagement with water management committee of flood polder sluice gate, his sons studied at American International University, Dhaka, he runs a garments and cosmetics shop at Paikgacha town. He also mentioned he has two big shrimp ghers.

Polder 23: This flood polder covers three villages (Purulia, Laskar and Village Paikgacha). Length of polder dike is 38 km, total land is 7000 acre. The polder 23 is divided into 20 blocks. This polder was built in late 1960s.

Agriculture in post polder period: The farmers, all farmers, cultivated rice – huge cultivation. Yielding was very satisfactory. Yielding was about 600 – 750 kg per .33 acre land. Agriculture laborers came to this area from northern districts such as Faridpur during transplantation and harvesting season. Freshwater was available, mainly rain water. River water was also brought in the polder during monsoon/rainy season, because in this season river water was not saline. Water of Shibsra river during the months of *Ashar* to *Magh* (mid June to mid January) is fresh (not saline).

Almost every house had have cattle, milk cow, duck and chicken during those days (first 8-10 years of polderization). Huge fish was available in the *beels* (wetlands in the polder). This fish was grown naturally. After rice harvest, sluice gates were kept open and fish lings, fish from river entered into the beels. Villagers could catch fish sufficient for their consumption and some could sell to earn money.

Though the villagers did not have cash money in hand, no fancy houses during those days, but they had have enough food, fish, milk and other materials like fire woods, etc. Villagers had have time for recreation, people were happy – we had peace in our village.

Shrimp farming:

First the shrimp farming was initiated in Shatkhira area. Some people from Paikgacha area went to Shatkhira to work in Shrimp Gher as labor. They found that shrimp farming is very profitable.

During those days (in late 1970s and early 1980s), one kilogram Shrimp was sold for Tk.600, while price of one *mond* (37 kg) rice was Tk.600. These people also earned skills and experience of shrimp cultivation by that time. These people (among from small and medium farmers) initiated shrimp farming in Paikgacha area in early 1980s. They built linkages with the shrimp *gher* owners from Shatkhira to invest in paikgacha. The investors in shrimp farming in Paikgacha area were from Shatkhira in the initial phase, at least for five years.

Land tenure system in shrimp farming:

So far the land tenure system for agriculture work like rice cultivation I Paikgacha are mainly two types – share cropping, and land leasing. A farmer, generally small and landless farmer, can be given land by the owners for rice cultivation on fifty-fifty share basis. Leasing goes against money, generally for one year agreement.

For shrimp farming, the landowners gave their land on leasing system, and it was for one year in the initial phase of the shrimp farming. Landowner was paid Tk.600 per .33 acre. In initial stage only the large farmers leased out their land for shrimp farming. Some small farmers leased out their land under pressure. Pressure was created by the local large farmers. Most of the small and medium farmers refused to lease out their land for shrimp farming. They were convinced with rice production, which was their food security. They were also convinced to keep the *beel* for open water fisheries from which they could catch enough fish for their consumption as well as for selling. But over the period of 10 years the whole area were brought under shrimp gher.

Shrimp Gher Owners:

When farmers found that it was easy to earn Tk 2.5 million if one invested Tk100000 annually. So, many medium and large farmers invested in shrimp farming. Outsiders were dominant investors. Mr. Wazed Biswas of village Kajla, Kaliganj, Shatkhira was the largest investor in shrimp farming. In order to establish his control over land for shrimp farming, Wazed Biswas himself opened gun fire on the villagers who protested shrimp farming and disagreed to lease out their land to shrimp gher owners. Currently Mr. Mashiur Rahman is biggest shrimp farm owner and the second biggest owner is Mr. Abdul Majid Sana, who has 3400 acre land under this gher.

There are also medium size shrimp gher in Paikgacha. Sarder Amin Uddin (this interviewee) has a shrimp gher of 40 acre land of his own. He also cultivates rice in this gher. Last year the yielding of rice in this gher was around 2200 kg per acre that is he produced (2200 x 40) 88000 kg rice last year. Sarder Amin Uddin uses his land for shrimp and rice cultivation since last 15 years. He can sell rice. He earns much income from shrimp (Tk.1000 – 1200 per kg).

Recently some large shrimp gher owners have been withdrawn themselves from shrimp farming because of losses in shrimp farming with affects of virus in shrimp farm and affects of tidal surge (SIDR 2007 and AILA 2009). Some small farmers are doing shrimp farming by themselves in small scale in their own lands. They also cultivate rice.

What happened to land leasee:

The farmers, small and medium, who leased out their land to shrimp gher owners, are displaced from agriculture. They are engaged in different types of works. Some are rich van pullers, some work in brick fields as laborer, some work in shrimp gher as day laborer, some are migrated to cities, some go to other parts of Bangladesh like Faridpur, Netrokona as agriculture labor, some go to India for short term, some are engaged in small business, some run tea shop, some are engaged in fish business.

All of these categories are borrowers of microcredit NGOs and local moneylenders. It would be hard to find someone not loan taker/borrower.

Interview with: Mr. Mohammad Belayet Gazi (53), Tea Stall owner.

Date of interview: 20 March (late Morning), 2014

Location: Tea stall at a market place of road site, Village Purulia, Sholadana Union, Paikgacha Level of education: Class IV

Narratives:

It was around 10 O'clock in the morning of 20 March 2014. I, along with my Field Research Assistant, entered into a tea shop. I found that one middle age and another young man were preparing singara, piazoo and chop (snacks items). I asked whether we can have tea. They requested us to sit. I asked them whether singara, piazoo, chop are not afternoon snakes items? They replied, in the late morning people passed by from the field, the rickshaw van pullers, motor bike drivers (motor bike in this area is a popular transport – two to three persons can travel by motor bike on hire), motorized van drivers are the customers. However, tea was served by this time. I continued chatting with the man. At one point I also asked for singara and another round tea. My talking to him took shape of interview.

His tea shop:

Belayet Gazi has been running this tea shop for last 15/16 years. This shop is with thatched wall and CI sheet roof, but half of the roof was damaged by storm. He needs at least ten thousand taka to repair it. His plan is to borrow from NGO and repair the roof. His elder son (24) works with him in the tea shop. He started this tea shop because his agriculture land was leased out to shrimp gher owner. He borrowed money from NGOs and invested in this tea shop. He borrows regularly, because to run the shop and family he cannot manage without borrowing loan.

His land use:

Belayet Gazi is owner of .66 acre land, which he first leased out to Mr. Paresh Paul from Shatkhira, who continued shrimp farming in this area for four years. The local farmers were motivated by the local large farmers to discontinue leasing land to Mr. Paresh Paul, who was outsider. So, the land

owners demanded higher money and period (three years lease period) with which Paresh Paul did not agree. But, the local large farmer came forward with a offer of higher rate and period of lease. Paresh Paul left. The local gher owner was irregular in paying lease money to the land owners. Though the rate was higher (one was Tk.600 for one year per bigha, second one was Tk.1500 per bigha for one year) than the first gher owner. Belayet Gazi was not paid lease money for three years out of seven years. He failed to collect this lease money, because the gher owner was a local powerful large farmer. This was a big loss for him. However, after seven years, Belayet Gazi stopped leasing out his land and started shrimp culture by himself. He made a small gher in his .66 acre land. Locally it is called 'pocket gher'. he can earn 30000 to 40000 taka annually from his pocket gher. Last year he earned Tk.40000 from shrimp. Since last four years, Belayet gazi also has been cultivating rice in this gher. He got 32 mond rice (one mond = 37 kg) from his .66 acre land last year. Belayet Gazi is engaged in his tea shop as well as shrimp and rice cultivation. His two sons join him.

Some small and medium farmers started doing gher individually and in some cases jointly. Some large gher owners reduced their gher size. The lease rate has also dropped down. Currently it is Tk. 800 per bigha for one year. However, the small farmers cultivate rice and shrimp in their pocket gher. Many small farmers, whose land is still in leased out to shrimp farm owners, they go to other districts like Gopalganj, Faridpur, Netrokona to work as harvesting labor. Whereas, a time was there, people from other districts came to our area to work as agriculture labor.

Narrative 2: Interview with Shrimp gher accountant

Sirajul Islam

Accountant, Muktijoddha Gher

Village: Kagozibari, Laxmikhola, Paikgacha

Mobile: 01918061475

There are four adjacent ghers accumulated on 800 bighas (267 acre) of land. It was first run by Muktijodha Sansad (Freedom Fighters' Association), there after it is named so. It is said that this was first shrimp gher of Paikgacha thana.

- I have been working here as an accountant for 25 years. If we look back to 25 years ago, we can see, the social condition was harmonious and peaceful. River waters were available; there were plenty natural fishes and shrimps (Horiana, lobster, chaka, rushnai, chali and prawn), barn (gola or store house for rice/paddy). But they couldn't make their livelihood properly. By the month of Kartik (November or December month of the year), their rice

would have been finished. There were dadan business (advance money as a loan from local moneylender), one could take one maund (37 kg) rice for one hundred taka (which was very expensive for that time). Many people eat only wheat *firny* without sweet. Lots of people were unemployed. If we called for one labor, two labors came instead. In this whole village, there were only one or two motor bikes.

- Hazi Abdul Mojid Sada, at first introduced shrimp farming in this area. Shrimp farms were in Satkhira, Khulna or in other areas. Primarily there were 7 or 8 natural canals. Waters came from river through sluice gates, and canals. The gher were grown beside the small rivers or canals. Then people came to know that the shrimp farming is very profitable (understand the hidden/secret of profit) then everybody started shrimp farming. They made canals and fences. They started to reserve saline water in their agricultural land. Then agricultural lands became/turned into the shrimp gher. The livelihood, social, economic, and structure of the area have been changed.
- At present the economic condition is good. The Number of population has increased. You will not find anyone who lives without food. If we want two labors we get one labor. In every house you will get at least one motor bike.
- From 1995 to 2005 was a golden era of shrimp farming. The gher owners got ten times more than their investments. You may call that as a shrimp revolution. But now the gher is affected by a virus. Fish are not grown. Profits are in fate. We can grow paddy at the gher for half of the year in which we could grow hundreds maunds of rice. Day by day nature has become cruel. We are responsible for that. The fertility of land has been reduced. Seasons have changed. There were southern winds but now they do not exist. We could grow water melons and other vegetables but we can't do anything now. There are no grasses or trees. Alternatives of grasses are *kata sheola* (horn mosses), those are not grown everywhere. After rotting these mosses make the lands fertile. Last year we invested 3.5 lac taka for paddy cultivation; we got return only 1500 maunds of rice, because of lower fertility of lands and draughts. To grow more paddies it needs rains for fresh water, and insecticides. These are very harmful for the environment and people. These insecticides are imported from India where these are totally banned by their government. We export shrimps and import poisonous!
- What can I say? The people or institutions that are responsible are not showing their responsibilities. Governments or NGOs or beneficiaries (people who gain a lot through shrimp farming) do not make any research firm for contingent situations.
- We should have a researcher in the field level. There is a Saline Water Centre in Paikgacha but we do not know about their roles and duties. They do not show any good results. If we had any research centers then we could test the soil, we could find the reason of the virus.

I think, unhygienic and unplanned systems are the main causes of virus. Gher owners cannot make a profit now. Eagerness and greed had influenced them to farm shrimp.

- There are lots of loses now on different sides. The Main loss is in administrative loss rather than loses of virus. Administrative means internal and external administrations. Everybody cannot handle a gher. When we make profit at the same time people coming from Capital are making big loss. Sometimes they lose their full investment, because of the internal administration. No quarrel exists here but corruption. In high tide period somebody has cut the embankment and all fishes go away. Sometimes a manager’s income is more than that of gher owner. External or public administrations are corrupted. Good governance does not exist. Polices are very eager to come in Paikgacha thana because of their high incomes. They always work for the rich groups.
- Normally there no losses in shrimp farming if there is no natural disaster. Before getting involved (employed) in this gher I had seen, the gher owners behaved like Jaminders when they made the lease deeds with small land holders. If any poor/ under privileged did not want to give their land on hari, then the gher owner applied force to sell the land. The gher owners had pet terrorists to oppress the villagers who were anti shrimp farming. Sometimes they were so destructive that they were engaged in kidnapping, killing, raping and other obnoxious activities.
- People of this area are very much foolish. They have no labor union. There is no labor law. The man and woman are working hard as labor but they are paid very low. They never make any protest unitedly for increasing labor wage. Even gher owners, who earn millions of dollar, never take any initiative regarding this matter. The female labors are always deprived; their ways is 20% less than that of male labor.

The estimated average monthly male labor wages from 1990 to 2014 is given bellow:

Year	Labor cost per month in Taka
1990	600-700
1995	800-900
2005	1500-1800
2010	2700-3000
2014	3000-3600

- Because of low labor wages, the poor people can’t maintain their family. So thousands of people migrated to Dhaka, Chittagong and other cities. They work in brick fields, in garments factories, as guards in office and private houses, rickshaw pullers etc. For the lack of education and economic conditions they can’t go abroad. Some unemployed people catch fish in the rivers using nets. For this reason, the sea fish like Vetki, Paisha,

Pangus, Khorkun, Vangon, Guli, Kakka, Horia fishes cannot come to our rivers or ghers. There is a labor crisis now. Where there is an absence of justice, the nature takes it.

- We are facing some problems now on continuation of the ghers. The land owners take more advances in money. They have taken one year in advances of money. We have paid in 2013 for the year of 2014. We give advance more than 42 two lacs taka all together only from our gher. Some people are coming with a false signature of one prominent person/rich businessman (false offer of higher rate of land lease), and telling that, that person is offering them 10 thousand taka per bigha to take their land for gher. If you can make a deal, you (land owner) get higher money. There are some groups whose professions are doing these kinds of activities. We have not decided yet what to do. We want to give hary at best 8 thousand taka per bigha. It is also costly. It will be best if we could give 6 to 7 thousand taka per bigha (0.33 acre).
- I have observed that losses in the gher are made by two groups. One group is in primary session of farming that is hatcheries; another group is in final session that is exporters. The hatcheries sell pollen to the gher owners. They make profit in their ways, getting yearly commissions as an agent, Selling profit from the gher owners, and advance selling commission from the loan holders. The pollens are coming from Kolatola of Cox' bazar. The Pollen producers control the whole hatchery markets. They are very powerful. They also control the seas and rivers, so that sea fish and pollens (that are pure and not affected by virus) cannot enter from Bay of Bengal to Mohipur and Charfashion area. They announce the propaganda through the Bangladesh Navy, Coast Guard, and Ministry to not to catch fishes. Sometimes they hijack the fishes and trollers, and even turn upside down the boats or trollers and capsize them. By this way the pollen producers are becoming gainers.
- The exporters export the shrimp to Japan, Europe and US. Before exporting, shrimps need to be processed and to make them headless. It was done manually in our local areas 15 years ago. Many people were engaged in this work. But the exporters showed the causes that, locally and manual headless shrimps were not liked by the buyers because it was harmful to the environment and unhygienic. But they are very corrupted and doing unethical business. They push white cement, distilled water into the shrimp bodies. Therefore, in international market we are under graded. So comparative price is low. We are losing profit.
- The future is uncertain. As I told, the day by day nature is becoming cruel. Therefore, this system may not be sustainable s in the long run. People may be changed there. Some people are doing crab business. Adaptations come to the fishes also; some lobsters are growing in saline water.

Narratives 3: Discussions with school teachers

Pankaj Bain

Age: About 45 years

Mobile: 01722835638

Small Farmaer: 6 bighas of enclosures

Teacher: Betbunia Primary School

Polash Kranti Sen

Age: about 40 years

Mobile: 01757808484

Small Farmaer/ Gher owner 2.5 bigha

Teacher: Betbunia Primary School

Azmiri Sultana (M A)

Teacher: Betbunia Primary School

Mobible: 01716484546

Group Discussion: In 1988 there was a flood, and we were affected and got only 18 maunds of rice in 5 bighas of land. It was our last rice cultivation, I remember. (Pankaj Baine started)

- The first time, the enclosures were available in Satkhira, Kaligonj, Kaira regions. In this area we got water from the Shibsha River in the month of Magh (Middle of January). We cultivated paddies in this land. Our relatives who lived in higher areas, they told us, they got more than 50 thousand per year from one bighan of land, but get only 8 or 9 maunds of rice only. Then we were inspired.
- At that time, shrimp farming started with a big land owner's land of 50 or 60 bighas (Around 20 acres). Hari (lease) rate was Tk.700 to 800 per bigha. We planted rice but we did not get the environment. Saline water licked and entered into our land and we could not grow well. We observed here is no profit in paddy cultivation. Seed plants have to bring from non saline regions. But freshwater region paddies did not grow in the saline water regions. Finally we decided to do shrimp farming.
- But those, who had small land - less than five bighas, (1 bigha = 0.33 acre) inside the big gher, had no opportunity of shrimp farming. They had no priority to the gher owners. They were totally neglected. They pay them hari money (leased) according to their wish or sometimes did not pay. Others who had 20, 30 or more bighas of land, they had the priority, and they also had the power. Power means political power (presently Awami League), muscle power, hello power, money power etc. Money power is predominant now

also. They got their price according to their deeds. The Gher owners had very good relations with them. If they have 5 years deed, after 3 years, gher owners invited them and presented gifts and money in advance to make agreement for ten years.

- Small land owner's lands were sold. If anyone had a small land inside the big gher, at first gher owners proposed them to sell the land, otherwise to give lease for ten years, if not give them for at least five years. Gher owners were always the gainer. They had hello power. If they couldn't manage the land, they used their power. Told the police, and then police took action. Sued unnecessary case, or pushed saline water in the land and made a good environment for farming prawn (Bagda Shrimp). Poor people could do nothing. Ultimately they had to give the land to gher owners. Once they could make an agreement they would never return the land. They would become landless! After arranging so many journalists assembly, the present situation is good, now gher owners do not do the same but they are facing problems because of the virus.
- Landless people had no work. Sometimes they went to Gopalganj or Channai (India). They couldn't go abroad, because they did not enough money. In our early life we saw, the people of Gopalganj come to our regions for working, but now it's reversed. Our people go to Gopalganj for working. They work for rice. They get 12/13 maunds of rice per month. One maund (38 kg) rice can be sold for 800 taka. They are in groups; they accumulate all the rice and hire a Troller (engine boat) and return home. Sometimes they face problems, last year, one truck fled away with 300 mound of rice. People are very lazy in this area. When they cross all the means and have absolutely nothing to do, then they go to work. They also do soil digging (*mati kate*). In soil digging, one labor gets 200 to 250 taka in Paikgacha and 300 to 400 taka in Gopalganj.
- Women do jobs in the gher. They cut moss (locally called shila), spray fertilizers and lime in the gher. They catch pollen prawn (PL/renew shrimp) from the rivers and sell them to the gher owners for farming lobsters (galda shrimps). These works are prescribed for women, normally men workers do not go for these work. Men do a bit harder work like soil digging, brick making, or in other sectors van or nosimon (motorized van) driver, motor bike drivers. The Working hours are 8 am to 1 p m, five hours. A woman gets 120 taka and a man gets 170 taka. Girls go to school but those who are very poor they do not go. Situation has been changed, earlier Muslims girls or boys went to madrasa (School for Arabic based Islamic Education) now all religions boys and girls go to primary schools. Early marriage is one phenomena of illiteracy. Last year one girl of class seven (13/14 years old) got married.
- Most of the people are losers. Only 5% of people are gainers. Economic conditions are not sound. If economic conditions become weak the social conditions must be weak.

- Government or MPs do not do anything for us. They do it for the gher owners. Our Betbunia Primary School is made by CARITAS. Four to five years ago this NGO proposed government to make a drainage system where people can do the both, shrimp farming and paddy cultivation. Mass people signed and affirmed it but it was showed to the government in reversed way. Mass people's signatures were showed as denial. So that proposal went in vein. Public opinion is made but by the pressure of the gher owners it becomes powerless.
- Social relations became weak, family ties decreased, and mutual respect has almost gone away. All are related to prawn farming! You know money gives speed and take away the emotions. There's may be natural imprecations. The Virus took away the happiness of the gher owners. Last year I myself invested 20 thousand and profited taka 2 lacs but this year I have invested 20 thousands but got only taka 20, believe it or not. Another, we do not have drinking water. This crisis is also partially related to prawn farming, because our ponds also do not have freshwater. Earlier we had this. Waters lick from the field to ponds and ponds waters become saline. Pond's water from Goraikhali are brought with cane and sells 20 taka per cane (one cane equals ten litters), and we drink. In our school, we tried to dig a tube well, we had examined 1100 feet deep but did not get layer of pure water. Now we use its water only for washing our faces, not for drinking.

Narratives 4: Interviewing shrimp farm owner

Md. Shahiduzzam

Mobile: 01732718122

Asaduzzaman (brother), Owner of two big gher of 36 acre lands.

Village: Betbunia, Paikgacha

One outsider named Solaiman, at first started shrimp farming here. We observed; it was very profitable and he produced thousand maunds (hundred of metric tons) of prawn every year. Then we (with our cousins) became jealous and derived him up and we started the business. It is about 20 years now we are in this business.

There is nothing if you have millions of taka but you are not healthy. We have everything but we cannot eat anything. We are always eating adulterated foods. Rice is also mixed with powders. Highly poisonous fertilizers are being given in the rice fields. Vegetables are rare in our markets. My sister-in-law is suffering from kidney disease. Millions of taka has been spent but getting no result.

- Flash back was very nice. We have had 15 to 20 cows and enough milk. We got both rice and fish. Though we used to get only 7 or 8 maunds (740-760 KG) of rice per bigha (.33 acre) and now 15 to 16 maunds per bigha, yet earlier time was better because everything was pure and fresh. There is no blood in fishes (fresh fish). Earlier what was Koi (fish) now it is Telapia; what was kukut (chickens) now it is farm chickens. Everything is very much artificial. We have no electricity but we have solar powers. So we cannot generate heavy power to run big freezers or cold storage. For this reason we can't export shrimp directly from here.

Making shrimp Headless (processing of shrimp) also has an effect on our economic crisis. Firstly, many female labors who were engaged in headless process become unemployed. About 25% weight has been lost for automatic headless system. Pushing practice has also been increased. Therefore, we get less profit and price than earlier.

- Sweet water/ fresh water crisis is a big crisis for us. We have to preserve rain waters in the tanks/ponds.
- There was no virus seven years ago. At the beginning we got 50 times more than our investments. There is virus in hatchery fishes but not in river fishes (shrimp fry from river). Nobody knows about the virus but different experts suggest/ provide different ideas. One Indian Doctor reports that, shrimp eggs for pollen are derived from immature shrimps, after which mother shrimps are not killed or eaten but are put in the rivers or hatcheries repetitively to gather eggs. In this way the abnormal pollens are produced and this abnormality is called virus. Another reason, there is no scientific ways or system being followed in shrimp farming. Generally, the field should be dried up before farming but nobody actually follows this system. However, people are quite greedy and all they think about is how to consume or eat. They do not realize that in order to achieve something, they need to invest first. Now, when people would like to farm, the land got dried up not for farming purpose, but due to water crisis.
- Present economic condition is better than previous. Shrimp farming is necessary to mitigate the needs of shrimps. If every district is used for growing paddy where the shrimp will grow? There are always shortages of labors now. Living conditions has improved. Sometimes we have to take loans from the labors.
- Powerful people are now better off. Money crises or loss is the biggest crisis or loss. Government banks give loans, but gher owners have to leave their lands to pay the loans.
- Women works in the brick fields in other seasons. Basically, lower class that pull the vans and upper class that are very rich are sound. Other than that, the middle class who have only five bigha or ten bighas (2 to 3 acre) of land are in big crisis.

- At present gher owners whose farms are caught by virus are in crisis. My uncle has 900 bighas (300 acres) gher, he gets only 2 maunds (70-75kg) of shrimps whereas it should be 15 to 20 maunds (570 to 760 kg) per day. Another one from 700 bighas (200 acre) gher get only 5 kg shrimp because of virus. It is extremely vulnerable due to the attacks by virus. From my farm, I get only 24 Kg shrimp where it should be 4/5 maunds. Last year I have earned about 25 lacs (2.5 million) and this year only about 5 lacs (0.5 million). If it continues for a long time, we cannot run this business. All shrimp farms will be closed.

Narratives 5: Focus Group Discussions shrimp farm owners and businessmen

Dated: July 01, 2014 (Time after Zohor prayer)

In front of, Khatuamary Mosque

Soladana Union, Betbunia, Paikgacha, Khulna

Number of Participants: 06

Status of Participants: Villagers directly or indirectly involved in shrimp farming.

Name, age and contact number:

1. S M Afzal Hossain (50 yrs): Directly involved in shrimp farming, highly educated and observer, also lived in Finland for several years.
2. Mohor Ali Sarder (68 yrs): Lease Provider and village intellectual.
(mobile: 01711143792)
3. Md. Safikul Islam Sarder (65 yrs): Lease Provider and Gher owner.
4. Arifin Sarder (34 yrs): Directly involved in shrimp farming and Shrimp Business. (mobile: 01739776673)
5. Khokon Mondal(52 yrs): Fisherman and Water Supplier.
6. Abdullah Al Mamun: Shrimp farming in a huge area of land, and a shrimp Exporter.
(mobile: 01739776673)

There are lots of changes in this area which occur due to shrimp farming. These are:

Before Shrimp Farming:

- ✚ A serene life, with no scarcity of food or the basic needs of livelihoods. Earlier trees, cattle and their associated foods were available. Now we have money, but no peace.
- ✚ There were lots of fruit trees around this area. However, in childhood, we were very afraid of going to these jungle streets.
- ✚ We had a mutual respect to each other. We were very afraid of polices. We never did go in front of them. Local conflicts were mitigated by the matbar.

After Shrimp Farming:

Societal Issues:

- ✚ Shrimp Farming causes more economic harm than benefits.
- ✚ The people have no food security. People only depend on shrimp. People and other businesses would terminate after shutting the shrimp business down.
- ✚ The amount of dowry has increased after shrimp farming which caused many wealthy people to become derelict and not be able to marry their daughters. Furthermore, the divorce rates have also risen.
- ✚ The family conflicts have increased and family ties have broken as the social structure has changed. Mutual trust and cordiality have gone away resulting the young generations to become spoiled. Cash money could be blamed to make them evil.
- ✚ Social ills like, addictions, robbery, rape and women oppression have increased. We are very much afraid of coming home at night after ten at night. Another decadence of the society is women employment in the ghers. The poor women are oppressed and abused which is a severe crime. Nevertheless, a sinner can never be gone unpunished. In this situation, nature comes in action.
- ✚ People of this area are suffering from various diseases because of some poisonous fertilizers being used in the field. These poisons directly or indirectly enter into the body causing various types of unknown diseases to emerge. Some people say shrimp virus affects the people too. There are no pure foods or milk therefore; increasing the growth of malnutrition among the children and making them lose their health vigor. For instance, when we were of their ages, we could walk up to Paikgacha (it is about 25 km far), but now it is impossible for them.

Environmental issues:

- ✚ Temperature has increased and seasons have changed. There is no environmental balance. There is no cool breeze or no shadow (big trees) to take rest during day time. The rivers have died. The fertility of soil has decreased and saline water have mixed with soil eroding our trees And walls made of bricks and soils. Pesticides are applied to the shrimp ponds killing other fishes, snails and ecosystem family.

Economical issues:

- ✚ Livelihood has changed as the traditional livelihood has broken down. Also because there is an inflation.

- ✚ Some NGOs are responsible for our destructions. They pretend of helping but they are actually ruining our society. The help receiver never can stand straightforwardly after giving the loan installments.
- ✚ Water quality is not good. We have no drinking water. We are depending on bottled water, rain water or pond water.
- ✚ Acidity of the soil has increased. Other products, fruits or vegetables are not growing. Living conditions are very poor.
- ✚ Food and Rice are poisonous. Rice has no taste; fishes have no original taste because these are fed with artificial formulated feed. Limes are being used in the fields which are not good for health.
- ✚ Increase in the rural unemployment as well as in the poverty.
- ✚ Transferring the land and wealth to the local and national elites. Some people become landless and migrate to other districts. About 30 % landless are leaving this area with baggage and people are bound to leave because there is no support for living in this area as there is a proverb, ***“Porshir mone jodi thake khal, desh chari onno deshe chal.”*** In 1970-71, many people migrated to India. Nobody wants to migrate willingly but they were forced to because they were weak. Nowadays, people in this area are also very weak and vulnerable. So they might migrate to some other suitable place.
- ✚ We all are in the custody of some capitalists. They are very powerful, having linkage with politics. If we want to do something, they would take revenge in different ways. By heart, every person wants to stop this leasing system. We are very much deprived but there is a scotch tape fixed on to our mouth for which we cannot speak out. The law is only for the weakest person; these laws can be bought and sold. However, people are giving curse and complaining to Allah as Allah is the international court of justice for the poor. We do not know about the future but if the government or some elite people want to stop this leasing system, it could be stopped. Otherwise, our hard talk will go in vain or it will be an emotional crying.

There is no government monitoring system. As a result, there is an advanced research farm for which we may have to see a severe famine in the near future or a natural disaster soon.

Narratives 6: FGD with women

Location: Betbunia Village, besides Kuchia River

Date: 11. 08. 2014

Time: 10.30 AM

Participating Women:

1. Monowara, Day Laborer
2. Mafuza, HSC, housewife
3. Nazma Begum, Day Laborer
4. Sharifa Katun, Housewife
5. Anowara Begum, Widow, having no child, Day Laborer
6. Nabi Mosammat
7. Umme Kulshum, age 70, house wife
8. Feni Begum, (Catching small fish from the river)
9. Sabiron Begum,
10. Nabiron Begum,
11. Jarina Begum
12. Sabita Mondal
13. Basanti, Day Laborer, Hikhali Village

Our environment is the worst. People are not good in character; they have no honesty and there is no work or little income. The women from this area are engaged in several work/activities as shown in figure A.



Figure A: Women’s engagement in several types of work/activities

- Now in this area, there is no work. Everybody passes their time being idle. Working rates have gone down. Two months before, a woman would get 100 or 90 taka per day, but presently gets only 70 taka. Prices of the everyday goods increase but our working rate decreases. If I do not go for work, another woman will go for the same payment. Then I have no work at all.
- If we are not in a group, we will not get any work. So we have a group. Monowara is our leader. We have to give 10 taka everyday to our leader. It is the leader’s duty to manage a job and collect the money from job provider.
- We are in severe hardship right now. We work whole day but if we go to buy at least one kilogram rice, a little oil and firewood then we have nothing remaining! Earlier, when we used to work in a land owner’s house, they would have fed us freely and “pet vore khete partam (can eat satisfying our appetite)!” Now there no rich and generous land owner. The rich also have become poor like us. Maybe we all have made a crime to Allah, so are in

curse. We do not know when we will get redeemed from this. If the leasing system goes away, maybe we could become happy.

- The name of this river is Kuchia. Earlier we get lots of fish from this river. Now there are no fish in the river. Working whole day, yet it is very hard to earn 60 or 70 taka.
- We could do other work, but we do not have enough money for that as well. Sewing Machine is very costly. If we want to learn tailoring work, we need to have to 3 to 4 thousand taka. If you give us a cow, it is very difficult to maintain because we have no food to eat. Therefore, where we will get the food to feed the cows?
- All of us at least have a duck or chicken. Some people have goats or sheep. BRAC gives sheep to the poor women but many women do not want to take sheep. Some women refuse to take the sheep and request them to take the sheep back because if a woman gets five sheep, her other livelihood activities stop. She can't go to work. Also there is nothing to feed the sheep.
- I am Basmati. Last month I have got five sheep from BRAC. Last week one has been killed by dog. I always need to keep an eye on them. Innocent sheep cannot say anything. I also must need to give them food. It is very difficult to bear my livelihood let alone the sheep. One day in a week I get a job, whereas the other days have to sit idle. BRAC bank officer insists me to take the sheep. It is their job to give sheep to the poor but they never give any food to them nor us. If I have work, I have to put the sheep in my sister's house. Sometimes sister also has work. So I provide them some tree leaves and tie them in my room which is in a bad condition. In this situation I cannot even work properly as tension remains thinking if they are stolen or eaten by the dogs.
- If an NGO tries to help a family, it is not sufficient enough to give some goats or some sheep or ewes. They should give food for the cattle and an alternative work for the poor men or women. We live in the government (khash) lands. This means, if we die, we do not even have any place or graveyard to bury.
- We are poor and always will be poor. As we were poor earlier and even our parents were poor. My mother's own cousin is M. P at present. If you do not have money and your brother has multi-storied buildings, it will not be beneficiary for you! If you have taka, then you have something or else you have nothing.
- I am Mafuza. I have passed intermediate last year. My husband is not literate. He does not give any value to my education. I have keen interest on studying in a university but my husband does not allow. They think if I study, I may not obey them. I am searching a primary school job. I do not know whether I will get it or not. I advise the other women

about family planning as we have lots of problems. If I start telling our problems you cannot finish writing about it even in the whole day!

- Do you know the story of the widow? The widow had a golden past but painful present and uncertain future. One guest came to the widow's house. She had nothing to feed the guest. She expressed her compunctions: if I had the betel leaf, then I could have managed the betel nut from the neighboring house but entering the room I would have seen that there is no betel eating limes in my house! Do you understand what she really had? Our condition is like that.
- At first the women has become unveiled (beporda) which is very bad in a religious point of view or socially. They go out only for money. Poor are bound to obey the master's order. I do not like to tell everything. You are a learned person, you can realize everything.
- However, everything is bad is not true either. There are some developments too, like roads and communications have radically improved, social institutions such as school, college, Madrashes have increased, quality of education and medical system has increased, social awareness has increased, recreation like, football, cricket, ludu has increased. Earlier, people did not want to go to the doctors and child birth was done at home. Now everything has changed.
- The problem I have faced after coming to my husband's house is that there is only one toilet for about 50 people. To make a toilet, it will cost about 10 thousand taka. The children face in many problems too.
- There is a lot of population. It is unmanageable for the family. They will not face any problem if they maintain the family planning process. I alone in this area get training and advise them but they do not always listen to my words.
- There is no land. No land for plantations or growing vegetables. Maximum women are suffering from malnutrition. They eat their rice everyday with salt only. If they have no salt, then they have to eat it without salt. In the training I have learned that, every woman needs at least 65 grams of nutrition. They really have no idea and no opportunity as there is no situation for farming chicken, ducks or other pets.
- There are no trees and no fruits. Some trees grow in this soil but no one cares.
- Leaving conditions are very poor. Houses and accommodations are under developed.
- We cook in soil made Chula (cooker/stove). We need to buy fire woods. Demand of fire woods and price for them is always increasing. To set a bio gas plan, it needs five cows. People are not able to buy a cow. If anyone has a cow, he has no grass to feed the cow. Also saline water destroys everything.

- I do not see any tube-well in this area. In the rainy season they reserve water. But amazing, they do not have tank for the reservation of this water. In our home we have a water tank containing only 15 pitchers of water. The people who are comparatively sound have pacca rain water harvesting house or tank.
- We have shrimp farming. Lots of shrimps are being exported but our fishing demand is not fulfilled. We always eat with kachu shak, kalmi shak, ghat korol, dhal vat and mash potatoes. Meat is rich-man item.
- Girls stop their studying after SSC. There are a few girls who go outside to study. In this whole area you may get only 2 or 3 such girls.
- The difference between rich and poor is very high. Social structure is not good. The administrations are run through the telephones by the rich.
- Government lands (khash) are given to the people who have land. Actual landless poor do not get the lands. Once very poor Sobiron Begum went to the member for monetary assistance or allowance, the member asked her to go and kill her husband and then get back to him so that he will manage widow allowance for her.
- The whole area is under the control of the rich or influential people.
- We do know what will happen after ten years. If the ghers are stopped, then we would have a peaceful life. My home is in Dakup thana, Kalinagar Village, there people get government allowances, farm white fishes tilapia, mono-sex and prawn (galda) fishes, grow fruits and vegetables and can harvest cows, goats and other animals. They society is growing up.

Narratives 7: FGD with mixed group

Date: July 02. 2014

Time: 10 A M to 1 PM.

Location: Village Paikgacha (home of Nasima Member)

Participation of:

1. Nasima Begum (U P Member, Village Paikhgacha) (Mobile: 01925967054)
 2. Moyna Akter, Hons Student
 3. Momin Sarder, Fisherman
 4. Amena Begum, Housewife
 5. Salma Khatun, NGO worker
 6. Shefali Akhter, Laborer
 7. Honufa Begum, Houswife
 8. Hira, Honors Student
 9. Mukta, School girl
- The man and women, due to the differences in the gender, have some identical jobs as well as some different jobs. Whatever the family profession is, the women mainly do the household works while the men mostly do occasional and money oriented work. Women's work is not necessarily money oriented. Also apart from that, in the people oriented activities like, political or economical activities, only men are involved.
 - There is no household work for the men. Household works are specified only for women.
 - At present, governments are aware regarding this mater, therefore, nowadays, besides the men, women also has engaged in different social, political and economical activities.

The women are engaged in:

- Taking care of the babies
- Arranging and cooking food for the whole family
- Doing all household work like, cooking, washing the clothes,
- Caring the cattle and like, goats, sheep or other creatures like chicken, ducks and geese.
- Home decorations like booming and polishing are done by the women
- After crops cutting, all of the processing is done by the women
- Collecting cow-dung from other villages
- Collecting fire woods, tree leaves and branches from different non-saline areas or jungles.
- Some women sell essential commodities or woods from door to door

- Some women work as house servants in the rich families
- Some women teach the students
- Collecting pollen of shrimps and crabs from the rivers or sea
- Men and women both work in the gheras, factories, small industries and sell milk.

Problems of the women:

- ✚ Women have been born with lots of problems. Sometimes men cannot realize that, only women can realize these. Suppose there is no rice to cook, kids want foods!
- ✚ The women oppressions are very high in this area. As they are poor their fundamental crisis or demand and causes of quarrelling are different. Their love is also different. There are always some sorts of family quarrel. Every day I have to go in different houses to mitigate the family problems. It is not my duty to solve the family problems but people come to me. Sometime they are relatives and acquaintances to me. This is not a social problem, you should not write these. When they come, I advise them not to quarrel.
- ✚ India is near to this location. Therefore, women trafficking are an everyday occurrence in our areas. Areas mean, all ten unions of Paikgacha or Koira [Haridhali, Kafilmuni, Godaipur, Lata, Diluta, Baruli, Soladana, Lasker, Chadkhali and Goraikhali] are in the same conditions. There are also rape, sexual abuse and acid throwing cases. Women are always tortured by their husbands and other family members. Often young girls cannot go to school or go out for the fear of *mastans* and eve teasers. For this reason most of the girls cannot go to the college or even finish their educations.
- ✚ Most problems are faced by the widows in the villages because they have no men to support or protect them. Family or land properties are a huge problem for them. They always face the problems or violence if they do not agree to get marriages, ill- proposals, political reverences, or not fulfilling the dowry demands.
- ✚ What can we do? Sometimes we do not know the killers. Social system has destroyed. They do not obey the Allah or *Khoda*. Even we are afraid of *mastans*. The world is captured by the *mastans*. Nothing to say.
- ✚ The mothers live with malnutrition.
- ✚ There is a prominent job for them but they get half the rate of the men.
- ✚ As a member I get allowance only 950 taka per month but a garment worker gets minimum 5400 taka per month.
- ✚ The man takes the advantage from the women. The woman is not a decision maker.

✚ To me, the biggest social problem is that the girls are not getting married and lots of women are becoming widow in their early age. About 20% girls are unmarried or widows. There are some girls who have passed Degree but got married to a simple illiterate boy. There are some reasons I have found:

- ✓ Needs dowry. The people have no shame. They want everything from the wife's house. Everything means everything, even Chunga (a bamboo made wind blower to make fire to cook), furniture, TV, fridge, cows, goats, chicken, ducks etc. Many rich men are now fakir; they have no ability to marry their daughter.
- ✓ Poor. Nobody wants to marry a poor girl.
- ✓ Dark complexion. Our society always wants fair skin.
- ✓ Education. Now girls want to get married later or after education.
- ✓ Divorce, girls are being tortured for dowry. Skip away.

I have studied my religion Islam. I have gotten family planning training, midwifery training and dead body bathing etc trainings. Midnight, mid-day or evening I always run for the help of the mankind. All of the activities I have done willingly without any payment. So people make me member without any cost.

- I know midwifery in this modern age, which cannot be supported. But I have got training with the doctors. If there is sign of abnormality, I directly support them to go to hospital. Whatever you say, the maximum people are very poor and illiterate have no ability to bear the hospital cost. On the other hand, we have not enough medical facilities!

I was not interested to be a member. I hide myself in Dhaka to escape from vote, but my relatives and well wishers arrange all the money. I have come to my area five days before the election. There was full of competitions. I was elected. I have saved some money too. I cried then. It is not a child's play! It is a big responsibly.

I have two daughters Hira and Muka, one studying honors and class nine respectively. I have this hunt from before. I have engaged in politics for serving people, not for making money. I hope I can be the Vice Chairman without spending any money. People are not so hypocrite that I will work for them without benefit and they will not give me a vote. I have nothing but hard work. Please pray for me.

Conditions of our area are very bad. Richman has rich loan. They are suffering more than us. There is no shame bigger than the shame of a Badsha becoming a Fakir. We are poor; we have no shame or prestige but a rich has shame as well as prestige.

The poor has a lot of job. They can do whatever they can. They have savings in the bank. They get donations and relief but a rich can never get anything when he becomes poor.

- Without gher system it was very nice. After gher, there is no growing of paddy. There are no cows, goats, cow ducks or chickens. Now we are suffering by dry woods, straws and hays (khor kuto), grasses and wings, cow-dung etc.
- Drinking water is another big problem. Ponds have dried up. Water supplying and collecting is fully dependent on women solders. In this whole village there is no tube-well. There might be almost more than 200 people depending on a single tub-well. The women normally tell the men to collect water but if women are sick only then some men help their wives. Where there is no means, men go to the pond and collect the water by vans. Every day on an average a woman spends two hours for collecting dry woods and two hours collecting sweet waters.
- After ten years what will happen I do not know. Who will stop the ghers? I am small and what boots to my wipes. A cobber always sticks the last. If the rich or government wants to stop the ghers, they can easily stop it. We can never do it.

Narratives 8: FGD with large gher owners

Date: August 13, 2014

Location: Horikhali Bill, Paikgacha, Kulna

Name of the Gher: South Katamari Gher

Area of the Gher: 260 bighas (86.66 acres)

Participants:

1. Belal Hossain, Partner
2. Alhaz Abdul Mojid Sana, Partner (Absent)
3. S M Jahidul Kabir, Partner (01816914904)
4. Dhidichi Kumar Sarder (Manager) (0183241155)
5. Basanti Rani, Worker
6. Kakoli Rani
7. Pobir Basat, Permanent worker
8. Proddut Kumar Ray, Worker (01933854297), Village – Kharia, 6 Lasker Union, Paikgacha, Kulna.
9. Shahjahan Ali Gazi, Village Paikgacha, Age 70 years
10. Jabber Ali Gazi, Village Paikgacha, Age 75 years.

This is Polder 23. The WAPDA embankment was constructed in 1962. Before the Poldering System there was one crop system and the whole area was occupied by jungles. After polder it became 2 times paddy and we could grow different kinds of vegetables too. At that time we had 50 cows.

People were very happy during that time. Plenty of paddies were grown. People worked only 3 months a year and rest of other 9 months having no work.

People were engaged in:

- Paddy Cutting
- Land Ploughing
- Fishing (by net, by Anta, and by Koach etc.)
- Boating (Boatman)
- Wood Cutting
- Playing, different types of village games,
- Studying (Some people)

People were very honest, kind and generous. If anybody would make Pitha (cakes), at first they would give it to guests, neighbors and then they would eat. There were lots of social events. The price of rice was only 1 taka or less than that per kilogram. The social events were very wonderful. They provided huge amount of rice, fish, dal, meats etc. and we could not finish them. One score was counted by 26 numbers. I have sold 26 numbers of big Koi Fishes for only 2 taka. I am telling the story of 1963 to 1965.

Farakka Barrage has destroyed everything. Expect this, Tepai Barrage and Surma Barrage have ransacked our environment. If currents prevail in the river then alluvial soil can go to the sea.

Shrimp was farming outside the WAPDA Barrage but after 1985, at the tenure of Hussain Muhammad Ershad it was started inside the polders. It was very profitable. A handsome amount of foreign remittance was added to our national economy.

It was first introduced by the people of Satkhira. You can tell them British. They have taken millions of dollars benefits and gone away. At that time some middlemen took the advantages too. They have got 51% profit as middle men. People were very good in nature. Nobody took anything from others without permission. Now most of the people are engaged in theft. They are taking others people's properties by hijacking, robbing, or by kidnapping.

At present we have many problems:

- 90% people are unemployed.
- People are serving by driving Nosimon or those who do not have Nosimon they drive van or work in the garment factories.
- As people are unemployed they are engaged in quarrels and conflicts.
- We have not a good College in Paikgacha.
- Police are the biggest terrorists in Bangladesh. They are terrorists with government license. There was a family conflict in our village. They go for filing a case and became penniless as police was mostly benefited.

- Administrations are corrupted. Maximum students do not get a government job. 5 to 10 lac taka is needed to have a small job.
- Water crisis is incomprehensible. People are coming from 15 to 20 kilometers far to carry water.
- The women are mostly unemployed. They have work for 2 days per month or hardly one month per year. Some women have finished working 6 months earlier but have not received their wages yet.
- Most people are in a hardship right now. If I give my own example, my daughter is studying honors and stay in a hostel in Satkhira. She has informed me that she will face problem if she could not pay 500 taka for meal. For three days I am in tension but I can't manage this small amount of money. But every person knows me because I was a rich man before.
- Women are going outside. Women should be kept in home. After going out they become undisciplined.
- NGOs are taking their benefits. Only women get the loan. Good and bad both have happened.
- Earlier Murubbis have their respect. But money has destroyed everything.
- If saline water is stopped, every crisis will stop.

Narratives 9: Interviewing a policeman

Md. Shakhawat Hossain

Sub Inspector, Tala Thana

Mobile: 01718032414

I am from the Shatkhira District. I have been living in this area (Paikgacha) because I have been posted here for about ten years. This region is famously known as the 'White Gold' area because of shrimp farming and exporting and earning foreign remittances. I have read and seen that many people of these areas became millionaires by shrimp farming. It may be true. But my point is, if a person's economic condition has changed, it can be seen by his attitudes or living conditions. If you visit the villages, you can observe the extreme poor conditions of many people. Their conditions have not developed.

I have observed that there are three inside vicious cycles that have eaten up all of the incomes generated from shrimp farming. These cycles are

- Circle of Middlemen
- Circle of Terrorists, and
- Circle of NGOs.

These are related to each other cycles and generated only for shrimp farming. You can see that in these circles will not work in poor or famine (monga) areas. NGOs have never worked in the poor areas where people are not capable of repaying loans. Let's have a look inside the circles:

- Vicious Cycle of Middlemen:** I have put this cycle first because they are the biggest criminals. They are a group of people who are less educated, cleavers, and hypocrites. They create conflicts in the society. If anyone does a good deed, they fit enemies against him. At the same time they do double- deal with the enemies. After conflicts, at first the middlemen become the friend of the weakest group. The weakest group may be a poor farmer. The friend may advice the farmer to sue a case. He tells the farmer to go to the police with money with whatever he has. The farmer can manage at best 500 or 1000 taka. They both go to the Police Station. The middleman goes to the police and they talk amongst themselves. Make a General Diary (GD) with 200 or 300 taka. After getting out from the Police Station, he tells that it takes 5000 taka, and he paid it from his pocket. The next day the farmer may get a call from the Police Stations. The poor farmers are always fearful of the police. The farmer goes to the middleman. The middleman inspires the farmer and tells him not to be worried. He also tells the farmer to keep the money ready. The farmer may sell his goats, geese or chickens and manage 5000 taka. They go to the Police Station again and the farmer gives the money to the middleman and the middleman gives some portion of money to the policeman and files a case. At this stage, the farmer needs money every day. The middleman also comes to the farmer and insists him to pay the money that he spent on the first day from his own pocket??! The Police also help the middleman groups. There are some polices in every Police station/thana who acts like a criminal. With the middleman they become gainers. The middleman and the police both ask the money for different new reasons. The middleman deals with the enemies in the dark/secretly. He tells them everything to him. Sometimes to suggest him to sue another case or come under solutions. He earns money from enemy groups also. The farmer and the enemy lose everything day by day. At last both groups go to the court spend some extra money and pray for withdrawing the case. In every village lots of middlemen are availed. They work not only for the case, they work for land mutation, land selling or buying, rate of leasing (hari) increasing, shrimps buying or selling even labors hiring and employing. They are most privileged group. If you look around you will see some rich houses, they are from this middleman group.
- Vicious Cycle of Terrorists:** They are powerful and have linked with the party politicians. They are also used by the middlemen and NGOs. They collect subscriptions directly. Even the police cannot escape from them. They also need to give subscriptions like the gher owners. The big gher owners are very much fearful of keeping money in their homes; even they have fear of taking the money to the banks. Therefore sometimes they have to sell their fishes at the lump sum prices to the buyers who directly pay their prices through bank. It is a very open secret, so nobody is dares to open their mouths. They go to the ghers and tell them there is a ‘ meeting ‘or ‘conventions’ or ‘party leaders coming’, ‘helping the victims’, ‘making Charities’ etc., you have to give subscriptions. The amounts

sometimes go up to one lac (100000), sometime more. This is a very open secret and nobody tries to open their mouth. Because, they are backed by the local powerful group, UP Chairman, MPs. They are terrorists, they have arms, but they are friends of police! If anybody goes against them, or denies giving subscriptions, they face a life risk problem. They may take the positions of the gher, ransack the gher or office, take away the fishes gathered for selling, sometimes family members (especially the female) may torture or kidnap. Most of the time they drive away the outsiders (Coming from other distance districts and do gher business) by totally ruining them and taking away the positions of the gher.

There are another group of terrorists, and are so called journalists. They are a group of journalists who are doing yellow journalism. Nobody will buy their newspaper with money, but they publish some wrong or bad things and push them to people to read. To stop this crime, the victims or gher owners have to give subscriptions. The police always fear these groups; therefore they also have to give subscriptions to them.

Another trend of subscription is group feeding. They go to the gher owners and tell them that their boss or big brother or MP will come to see them; they will get some benefits from him. We also came to know that they were earning very good, therefore they had to feed them on that day. Group feeding means, arrangement of big fest with shrimps, mutttons and with other expensive items.

If somebody runs a gher well, then the terrorists groups go to the villagers and make them unite not to give him lease (hari) for the next year. The gher owners face a corrupted situation. His investments, advance lease and everything under threats. Then the gher owners are bound to give money to the terrorists groups.

- **The Vicious Cycle of NGOs:** As the economic condition of this area is sound, so hundreds of NGOs are grown in this area. I have put this group in the third positions, and call them 'the First Destructors'. Their philosophy is very bad. They come to the helpless by spreading their helping hands, later on those hands become a terrorists or dangerous. The NGOs are dependent on the Middlemen groups to give loans and Terrorists groups to receive the returns of the loans.

The NGOs are very much interested to give loan to the gher owners. They have their representatives and middlemen groups to form a bridge with the gher owners. They have a tendency to give loans which are less than the requirements of the loan takers. If a loan taker needs a loan of taka five lacs then the NGO will give only taka 1.5 lacs. The loan take cannot mitigate his thirst of need. The interest rate is about 60%, 80% or 100%. There are some private NGOs or Loan providers also. Their interest rate is 100 taka per week for per thousand, and ten thousand taka per week for one lac taka. You can't imagine it is 40,000

thousand taka per month for one lac taka! If anyone once accepts a loan, he must have to return it with the interest otherwise, he will lose his lands.

If an NGO gives a loan, its installments start from end of the week. There are 20 Installments, and they come every week and per week the charge is 10,000 taka for 1.5 lacs. The loan taker can't invest his full loan, because of installments. A miss of installment, makes compound interest.

Shrimps need at least 1.5 to 2 months to grown up. You will remember, those who take loans must become a defaulter. His investment is in the gher so from where does he get the money to give interest? The representatives and middlemen are legging beside the loan taker. At that time he is in trap of 80 to 1 lac taka. Then NGOs come with terrorists groups and threatened to give loans and interests instantaneously. If the gher owner sells his shrimps after one month, he may get 3 lacs taka, but at that moment it may 2 lacs taka. At that time the middlemen and terrorists and gher owners come to a solution that after one month one middleman will buy the gher for 2.5 lacs. The gher owner sells his fishes and clears up his dues and remains nothing after that. Their lucks remain the same as they were. It is very unfortunate that, sometimes the gher owners take another loan to get rid of the loan.

In these ways the gher owners become losers, and the middlemen and the terrorists groups become gainers. You will not get anyone who is not suffering from these groups. These are the fundamental problems. These cannot be seen but you can see the virus. If there is stealing, killing or hijacking everybody can seen them, and can take prevention against them. As these circles cannot be seen, nobody can escape from these. They ruin everybody like cancer.

Narratives 10: Interview with a Village Police

Wajed Ali Sarder

Age: 76 years

Mobile: 01913327309

Profession: Ex Dofader (Officer in Charge of Chaukidars)/ Supervisors

Village: Betbunia, Paikgacha

I do nothing presently. I am 76 years. I Have no energy to do hard work. I had 9 bighas (3 acre) of land but moneylenders (mohajon/ gherowner) had taken away my land. I also had a chicken farm but it is closed off now, because the chickens were affected by diseases and died. I have a son, who runs the family. He is doing business of pollen shrimp.

- In my whole life, I have seen and observed that the world is very strange! The poor are always victimized and sinking into the poverty, on the other hand, the rich are always authorized rulers and becoming richer!
- There was no importance of shrimp farming before 30 to 32 years from now. Shrimps with other fishes were grown naturally. Then people got knowledge of how to do business. There is a river beside us, there reserving the water becomes easy. One after one, everybody started shrimp farming
- We did not get so much rice as before that we can grow now. We get 8 to 9 maunds of rice every year per bigha. Family members are also less. What we got, we could easily maintain our family. At that time we had other fish almost free, we had at least more than one cow, and we had chickens and ducks. We were very happy at that time.
- I am poor; this is the main reason of my destitution! Suppose, I have 10 bighas of land inside a gher. I have no interest to give it lease to the gher owners, because it is my only paddy growing land. But he or his representatives were coming to my home, and insisting, and offering me money to give land lease (hari) to him. Finally I have given my ten bigha lands lease to the gher owner's. I made a contract for five years and received 2 lac 50 thousand taka (Tk.250000). I have given marriage of one of my daughters and within one year I have finished all of my money. After two years I have fallen into problems, I have become ill. I have gone to the gher owner and he eagerly paid me and extended the contract for ten years. In this way, I have taken more lease money than my land value. At last, I have sold my land and became landless. I have given you a simple example. This is a normal process but there are some abnormal situations also.
- There is a very high connection between gher and politics. I think, gher owners are the fathers of politics. Politicians come to the gher owners to take *du'a* (blessings), because, without their donations they can't run their elections. You see, there are some big gher, within this 4 or 5 months two times the Parliament Member has come and we see big arrangements of feast. Always MPs (Member of Parliament) are their big brothers, Police are their friends, and terrorists are their servants. You can't do anything against them. Sometimes gher owners become the politicians. In our locality you can observe, no important roads, culverts or bridges are made or repaired by the government initiatives. Only unimportant roads, culverts or bridges where gher owners' interests are involved, are made by the governments.
- The long term side effects, I can't finish saying. We have individual problems, societal problems, and environmental problems. You can see all of them practically. One jar of water is 20 taka; one kg of *kura* (rice husk) for chicken food is ten taka. *Akal* (severe crises) of cooking wood/fire wood. No natural fish in the river and beel, what we have are

poisonous and have no taste. The lands have become unfertile. There are no trees around us. We can't have fresh fruits. We don't have vegetables. We have no cows or cow calves. There is animal diversification. The weather has changed. There are no six seasons in our environment (Bangladesh is a country of six seasons). Only the termination/stop of gher can save us.

- People are changing their businesses. My son had a chicken business but now pollen shrimp business. He makes profit only 50 taka per thousand pollens. At present small gher owners can't give the pollen money. He has about 4 to 5 lac taka investments in the field. Some gher owners have nothing to return. The Virus ruins their business. Return is very low, you can see, this my home! Once it was a chicken farm. Bottom half fence is almost open. There is no thief you can't say, but you can say I have nothing to be stolen.
- Unemployment problem has risen to the climax. People have no work. In the paddy field lots of people were employed in different works. Suppose, for cutting paddy 5 or 6 persons were needed per bigha but in shrimp farming one or two women are doing the same work. For this reasons 80% people are workless. The people are changing their jobs frequently, changing their livelihood activities frequently. Some people are migrated from this area. They go to Dhaka or Khulna, Rangpur or Comilla city. They live in the slums. They don't say that their land has taken away by the gher owners but they say, their lands have taken away by rivers.
- The conditions of the women are worsening. The women work at their own lands as labors. The gher owners have taken all of their lands, no work to do, therefore they work at their land as labors. I have lost my land. Earlier, my gher owner gives me something as relief, but now they do not. Now I get something sometimes from the NGOs. I get sugar and *dal*. It will also stop. How many days will they continue to give? My wife is in the field now. Only women have work now. She is about seventy years old. She works but gets only 60 to 70 taka per day. Not whole day, from 8 am to 1 pm. If she works for whole day then she gets 100 taka or some more. This is called women oppression! Pressure of work nudges the women. You can be owners of hundreds of gher, you can build thousands of buildings, earn billions of dollars but you can't see mothers laugh, and there happiness.
- My mind is not sound. Our people were very simple and soft minded. They were not greedy /ambitious. Family ties were very strong. I remember when I was going to Khulna for the first time by steamer, my entire family members had gone to the bank of the river to see me off. They cried for me as I was going to a foreign country. Our aim was to get food to fill our stomachs. We had strong principles of not harming others by any means. But the trap of shrimp farming destroyed everything.

Narratives 11: Interviewing a Crab Businessman

Mr. Panna Sarker

Mobile: 01753359961

Profession: Crab Business

Shibsah Kakra Center

Paikgacha Matso Arot

I am doing this business for last 10 years. I have completed my SSC (High school) only. I am from Ashashuni upazilla of Shatkhira district. I have started this crab business with five thousand taka. Rent of the shop was 8 thousand taka, the worth of which is now 25 thousand taka. If we invest 6 to 7 thousand taka for 5 to 10 kg of crabs then we get about (income) 1500 to 2000 taka per day. I have to pay the Depot owner 15 taka per Kg.

- Normally crabs were coming from the sea automatically to the rivers and floodplains. Earlier crabs were not cultivated. Some Hindu Groups first started crab farming in small gher. It needs bamboo fence so that the crabs cannot cross the boundary of the gher. Crab cultivation needs special care. Sometimes they are farming in the Round Trays inside a pond or river. One tray contains at best 15 crabs. Pollen or baby crabs are found in the rivers. Pollen or baby crabs are called Pieces. Pieces can be bought by 600 to 1000 taka per thousand.
- One can farm crabs in both sweet and saline water. Both are good. In one bigha (.33 acre) it needs 20 kg baby crabs, which may stand at 1000 to 2000 pieces. Crabs eat Telapia, Carps or other monosex (asexual) fishes. They need 2 and half months to grow matured.
- Crabs are fully exported item. Normally we eat small crabs and sell the larger crabs. These are mainly exported to Europe, America, China, Hong Kong and Italy. No dead crabs can be sold. They are sold alive. They are even exported or transported alive.
- The prices of female crabs are higher than the prices of male crabs, because female crabs are bigger in size and contain eggs. At present normally one kg female crabs are sold for 1200 taka and one kg of male crabs are sold for 1000 taka (100 taka = one euro). Sometimes the weight of one crab could be of 1 kg too. The price of which could be around 1100 to 1200 taka. The lowest price of crab (small size) is 200 taka per kg (1 kg contains 10 pieces), highest price is now 1100 taka per kg (1 kg contains 2 pieces of crabs).
- Farming crabs are very costly. For 5 bighas (about 2 acres) of land for one year it costs: For Deep Tube water cost (@tk.14000 per bigha x 5 bigha) 70 thousand taka, hari (land lease)

cost (Tk.8000 per bigha x 5 bigha) 40 thousand, baby crabs Tk.100 per kg x 500 kg per bigha x 5 bigha) 80 thousand taka, feed cost 10 to 12 thousand taka. A farmer can earn at least 3 times higher than his investments.

- However, crabs are very sensitive. They attract by many diseases and virus. They suffer from virus more than the shrimps. They die just after having the bad smelling.
- Crab farming is alternative of shrimp. The international market price is higher now. In 2005, price of crab was 350 to 450 taka per kg. Now we get 1200 taka per kg. There is no adulteration in crab business. There are no pushing corruptions like shrimps. Nobody says no or negative comments to this business. You can say this is a gentleman's business.

Narratives 12: Interviewing a shrimp businessman

Dated: May 08, 2014

Ansar Ali Gazi , Age: 55 yrs

Mobile: 01739134492, Katakhalı Bazar (about 12 km SW from Paikgacha)

- I am doing Shrimp Business from 1988. At present I have 60 bighas (20 acre) Shrimp gher of which 20 bighas is my own, and the rest by lease (locally called hari). I also have a deep tube-well. I grow paddy in 2 bighas of land.
- During that time, we used to plant paddy only once in a year, with any additional care or by using fertilizers. We would just have the usual routine of planting and cutting them. Generally we used to get 5-7 maund of paddy, which is a very less amount and I can't maintain my family with that. Also because, I was in a lower position.
- Now I am in good position. I am earning about 10 thousand taka per bigha land, which means 5 to 6 lac taka per year. I sell the shrimp in the market myself. I have a nice home. My elder sister is a Primary School Teacher, my Son is in BA, and youngest daughter is in I A. Also, my wife takes care of cows, cocks and ducks. She is also an expert in fish farming..
- I had land but did not start shrimp farming. I saw many outsiders coming to our areas and doing this business. They earned a lot; I saw it practically and started my business. It was a very pleasant time.
- Maximum people did not have any idea about this. As land was free and water was easily available, little investment gave huge return, meaning 30 to 40 times more in return. At present, hari is at least 5000 thousand taka, which was once only 2500 take per bigha.
- Katakhalı was alive. It was 30 to 40 feet deep. Boats and ships were running in this way. I also borrowed (taking lease from government) Tk. 2.5 lac (BDT 250000) for a year. There were lots of fishes, which came from sea by this river and we would catch lots of fish including Horiana (prawn). However, now the river has died up and became a plain field as saline water brought lots of sand and filled it up. Now, people are building houses on it.
- In rainy season we can farm white fish, like Rui, Grass carp (locally class carp), tablet fish and other fishes. As the water is not fully saline (locally Dudhlona means milk-saline), it is good for white fish farming. Last year I had invested 28 kgs of pollen fish and received 6 maund fishes.
- People who did not have any land also did business by taking hari (lease). They are also benefited. If they sold 5 kg shrimp, they could earn Tk. 4000 – 6000. You will not get anyone who does not do such business. Whoever has, invests them earns money.
- Women are also benefited. If the husband is benefited, the wife is also benefited. Normally women do all the household work. Those who have gher, they catch fish. Others cut paddy, cleaning moss (locally called shila/ sheola). A woman works more than a man but they are

paid less than a man worker. While a male worker gets 170 tk per day, a female worker gets only 120 tk. However, I give same amount to the male and female.

- Some people displace in winter. They have less work then. They go to Gopalganj and work in paddy field. Some people also go to Dhaka or Khulna for other works and get back in rainy season.
- Powerful people always have a power on the society. They earn in different ways. Normally poor are always the victims. They always have problem and are not benefited. They do other works. Whoever has vast land by inheritance, they are rich. If my parents gave me vast land, I would also have become rich. In our area as there is no saline water so powerful people (who do Awami Leage) take lease (dak) from government and everyone has to pay 5000 taka per bigha for saline water.
- There are lots of problems now. River has been filling up; weather becomes hot; trees have been lost. Potato's and other vegetables' prices are high. In flood season, we do not get any way to go elsewhere as is no way to pass water. We have no drinking water. In Paikgacha they have supplied water but we do not have. In the morning we have to wait for drinking water to buy from the market. One pot (ten liters) water is 10 taka. Some people, who are capable, dig tube well but it is costly and water is full of iron. Those who are not capable do not dig tube well, they drink iron water.
- These people are very active. Everyone does some work and his own work.

Narratives 13: Interviewing shrimp gher female labour

Ms. Champa

Age: 20 years

Profession: Labor

BetbuniaVillage

- I do all the work. I work as a labor. Like, I work in the shrimp gher, I work in brick fields, I do earth works, I run ashop and so many other work.
- In the shrimp fields, I make them clean and cut the masses (in her word shila), plant masses, make barricades outside the gher, catch fishes. In the paddy growing season, I plant paddy, caring for the paddy plants, give fertilizers if it is needed, molding rice etc.
- Inearth works, we get more than 120 taka perday, and in other work, we get slightly less100 taka per day. I work for 5 hours; from 8 a m to 1 p m. Male workers get 150 taka per day for earth work. We, the females can't work like the male workers. They have more energy. In the brick fields we work on contracts. We get money in advance. A Person gets 20 thousand in advance for three months. We go there all together, as in the full family.

The brick field owners give us room for living and woods for cooking. We have to buy rice and other materials. They give us in advance because they do not get labors in proper/season time and labors want more/higher wage at that time. We are benefited; we give a loan of half of the money (advance) to gher owners who need money and the other half we spend on living. Gher owners take loans from us; they are in high debts. The Virus makes them losers.

- We give it without any documentation. Sometimes we put in a witness; sometime we keep their gold ornaments against this loan. For 20 thousand taka we take an ornament of 30 thousand taka. Normally we get 50 to 100 taka per week interest against 1000 taka. If I have 10 thousand taka then I get at least 500 taka per week and in one month 2000 taka. Gher owners take it when they are in a crisis. When they have to give feed for the shrimps, when the virus affects their ghers.
- I got married and I have four daughters. I got married while I was fifteen. My guardian had wished for that. My husband has abandoned (give up) me. We did not know him properly. He was from the Barisal district. His village home is unknown to us. He got married to me and put me up with a child and went away. I have filed a case against him and also have a warrant, but the police can't do anything because we cannot give any address. It is happening in our locality often. There is nothing to do. What is looted cannot be blotted (in her word, '*vagher likhon jay na khondon*'....proverb).
- I have this shop. I have poor investment. If I had more money, I could make more of a profit. . My father is old. Sometimes he seats in the shop. We get 3 to 4 hundred taka per week. I have no brother.
- Earlier we grew paddy. In one bigha (.33 acre) we got at 15 maunds (570 kg) of rice. Now we cannot grow rice, as saline water enters into it. We do shrimp but it is affected by the virus. This year have invested 6000 taka and got a return of 4000 taka. I did not know that we would get such a loss. We did what everybody else did.

Narratives 14: Interview with rickshaw van puller

Abul Hossain

Mobile: 0193681468,

Village: Betbunia

Previous Business: Big Gher owner

Present Occupation: Rickshaw Van Driver

Family Background:

- I am a simple rickshaw puller working the whole day till evening. I have a daughter who goes to college, studying in Intermediate Second Year (12th level) in Khulna City College (in

Khulna city) and a son in grade three. I work 6 months in our local area and the other six months in Jessore district.

Agriculture and Shrimp Farming:

- In our region, Shrimp farming is devastating. Almost everyone is in crisis, even the man who owns 50 bighas of land (16.66 acre) faces crisis. Thus, resulting in the disparity between the rich and poor to be high.
- Apart from having gher (pond where you cultivate fish), people are completely satisfied basically with the agricultural sector. In Solada (one area that has no shrimp gher), a person becomes *lakhopoti* (millionaire) by selling *Kochu* (arum vegetables). If there were no gher, we could easily milk the cows and drink milk or catch fish from the rivers. We also had no food problems, as there were a lot of fruit trees such as - banana, papaya, guava etc., till *pujibadira* (Capitalists) destroyed this area.

Land leasing:

- I work in brick field and make *Kancha* bricks. We have a Sarder (leader) who gives us commission - 50 taka for 1000 *bricks*. Thus, I can earn 2/3 hundred *taka* per day but it is very difficult as I have to start my work at 3 a. m. Nothing to do, since I have a daughter and a son and got only 2 shatak (.02 acre) land from my father, which is also in partnership with my two brothers.
- My condition once was very good and I had a golden life back in 1988. I had spent 1 lac taka (Tk.100000) for flood victims. You would find a few people whose son's or daughter's marriage ceremony was held without my donations. I had sixty bighas (20 acre land) gher. I also had an abundant paddy along with other products such as vegetables, fruits and cows.

Conflict:

- The chairman, Babul Sarder (Union Parishad Chairman) was very envious of me. He thought I would become the chairman; therefore he had a pre-plan to get deprived of me. Once, he took the river on lease from the government and wanted to take control over this river (Kuchia River). However, we, the dwellers of this area did not agree with him because, since childhood we have used this river for various purposes like taking baths, catching fishes, carrying/transporting our products and so on. Therefore, there was a meeting where I had a quarrel with him and hence, became an enemy of him and his group. I had 27 bighas of hari lands for my shrimp gher which I had taken for 30 lacs (Tk 3 million) taka paying in advance. The chairman grabbed my last scoop of land illegally since we had a quarrel with the landowners from whom I had bought the land through a gentlemen's agreement; hence I was deprived of my right within 6 months.

- *Pujibadira manushna* (The capitalists are not humans). They can be notorious to such an extent that I am even afraid of talking about this case. No one can do anything against them. If someone has, say for example, 2 bighas of land inside the gher, the *Puibadiras* would force him to either sell it to them or make an agreement for 10 years. If refused, then there is a risk of losing everything as even the police are helpless. Not only that, our mouths also has to be kept shut as they could harm our family members and ruin our lives completely. So in order to protect my daughter, I can never open my mouth in front of them.
- Therefore, we must have a massive awareness to stop Shrimp farming to create a normal living even if it may cost some lives.

Narratives 15: Interviewing small gher owner

Mehedi Hasan

Mobile: 0171011003

Yasir Arafat

Mobile: 01748947419

Small Gher owners, Village Paikgacha

We have eight small ghers of one to two bighas each (.33 to .66 acre). All are in the same beel and polder. Ten to fifteen years ago, when shrimp farming started in our area, we also had started our journey with shrimp farming during that time. At the beginning one or two hundreds bighas (33 - 66 acres) of land were accumulated to make a single gher. There was a single owner too. But at present big ghers are divided into hundreds of small ghers and hundreds of people are gher owners.

- One thing is to keep in mind that when everybody participates/join in a single/same business then honors and dignities could be hampered. Last year we had made a loss of ten lacs (one million). This year also the same. Virus destroys the shrimps. There is no prevention of virus. This is one kind of bad luck. When and how a gher is affected by the virus, is unknown to everyone.
- There are some conflicts here. Like, the person who had taken lease (hari) earlier is not interested to give it up and tries to exercise power against the land owners. It happened very often last three to five years back. Recently it does not occur. Some big gher owners want to flee away because there is a repetitive loss.

- For mitigating the conflicts we run after the police and Union Chariman or Upazila Chairman. But both are corrupted. The police take bribe from both the groups. The leader becomes the supporter of the group which gives more bribes. There is no role of justice in the country.
- The political leaders can earn millions of taka by utilizing their power. Suppose, the M.P declares that, from the next year, there will be no poldering system to protect the environment, the rich gher owners will go to the M P and will negotiate to not to imply this. After which, the M P will be a millionaire.
- The people of these regions are very good and straightforward. There is no cheating or stealing. Sometimes small gher owners or poor people try to steal fish from the neighboring gher. Therefore, we need to put a watchman. In some areas there are samities (association) to protect the stealing. Everyone is bound to obey the rules of the samities. If anybody or normally a gher owner is accused of stealing, his or her gher with all fishes will be forfeited and give to the victim.
- Shrimps are ready to sell after one and half months. At that time, 100 pieces of shrimps make one kg, and the price of one kg shrimps is 300 to 350 taka. After two and half months, they become 50 pieces to make one kg and the price of one kg then becomes 500 to 600 taka. After 3 or 4 months they become they become 20 to 30 pieces to make a kg and price at that time raises up to 1000 to 1200 taka per kg. Price of the fishes varies every day. Normally middleman makes more profit.
- The first stage of shrimp farming was a golden age. People could earn up to 35 to 50 times of their investments. At that time lease (hari) was very little. May be only 250 to 400 taka per bigha. Now people are very clever. They know that it is very profitable, so we have lots of competitions. Therefore, price of hari has hiked up, nearly about 12 thousand taka per bigha.
- Sometimes we get sea fish in our lands. These fishes are big and tasty and profitable. Some gher owners in our area also pet some Geese (rajhash). The Geese do not eat fish. They eat moss. One piece of goose is 800 to 1100 taka.

Narratives 16: Interview with a *Faria*

Shafikul Islam

Mobile: 01987752295

Katakhali Bazar, Paikgacha

Profession: Fish Business (Faria or middleman)

I was in Dhaka for five years. I was in a Company with a low salary. It was very difficult for me to run my family. We had some lands for shrimp farming. But there is no water to run a gher. There is work here. I have to survive, therefore; I have started a middleman (faria) business. I have other partners too.

- We have invested about 30 thousand taka. I had no cash capital. I had borrowed the money from one of the relatives of my wife. No interest but sometimes I give him fish.
- Every day morning we buy 10 to 15 maunds of fishes. We have to process them and put them in the ice box then carry them to Jessore or Khulna town and sell them. We carry them through a fish van. After deducting all costs we can earn 15 to 20 thousand taka per month.
- This is my home. I have two small houses made of mud wall and thatched roof. I have a little daughter of two years, her name is Jannatul.
- I think cash money and good health are necessary for doing good business. With the blessings of Allah, I am in a good position. Although we have some problems. There are no fruit trees. No trees can survive in saline zone. There were lots of trees around us earlier. It was like a jungle. The price of rice and other things were cheap. The prices of all necessary commodities have increased because of having money to everyone. There is no one who does not do a business. The people who have money they gives loan to others and becomes a partner with money. Eighty percent people are in good positions.
- There is no expenditure in shrimp farming. If one has land, he can make shrimp business with small investments. There is an automated crop grows in the land, shrimp farmers need not to give food also. If anybody wants to make the shrimp bigger, then they need fish feed which they can buy from the market. Doing shrimp's feed business is also a good business. There are lots of feed mills around us and making millions of taka per month.
- The biggest river named Kopotakha has been dried in our area therefore no saline water enters into our gher. So there is a saline water crisis everywhere.
- Saline water (tidal water) brings lots of sand which fills up the river every year and slowly the river dies.
- Rich people always have strong muscle and rights in their control. My father was rich and hard working. But he could not make this position to the top. We had a land that was

suppressed by a muscle man. Last year we took control over that with the help of the Anis Chairman (Chair of Union Parishad). His son is my best friend so there were no problems over that. But we can't give it hary (lease) or make gher on it because of water crisis.

- If the government takes the initiative of dredging 3 to 5 killo meters of river, then our saline water crisis would be reduced. But there is no initiative. Sometimes NGOs take initiatives but political leader make it stop. Political leaders are benefited by this situation. Saline waters are leased here. Gher owners get saline water from the lease taker for 5000 taka per bigha land. Lease is taken by a powerful person, specially the Awami Leaguers (currently ruling party). If they dig the river, they will not get extra money from the gher owners. So they do not want to dig the river.
- The rich are becoming very rich. Suppose Anis Chairman, his father was chairman for 30 years and he also was a chairman. He has 100 bigha (33.33 acre) gher in Paikgacha, and 1.5 bigha gher in Kaira Upazila. He has two wonderful houses. His son is studying in a private medical college which is very expensive. He earns 2 to 3 lacs (2 to 3 hundred thousand taka) taka per month. From the Kaira gher, he gets 8 lacs taka hari per year.

Narratives 17: Interview with female small gher owner

Mrs. Rafida Begum

Mobile: 01743031187

Krishnanagar, Chandkhali, Paikgacha

Profession: Small gher owner, and day laborer.

- I am poor. I work as a day laborer. I have two small ghers. One is near my house, another is in the field. Both accumulated 1.5 bigha. For water crisis, I can't farm shrimp this year. The gher near my house has been dried up and been yearning for water. In the field, the land has insufficient water. Fishes are dieing for virus as well as for low water.
- For 8 to 10 years I am farming shrimp. We used to get profits in the past and more losses nowadays. I do it myself. My son is doing prawn business. He earns 50 to 100 taka per day. May be he earns more but he also has expenses, he tells us that. I have a husband, he has left this area. Now he has got married to another woman and lives in Khulna city. If I go to him, he fondles me, feeds me but never comes to my house.
- Normally I do all of my household works. As women, we have to do some more work. Also because, we are poor. Men also do hard work. Man is 'men' (can decide) and woman is 'women' (dependent). I work on gher fencing, soil basket caring, moss cutting and cleaning, shrimp catching and selling etc. My son also helps me.

- Earlier I got 50 to 60 taka for five hours duty, now I get for same work 100 to 120 taka. In rainy days, we have more work; gher's fences need to repair. Although employers do make delay to give payments, we get the payment on due time. Today I have no work. I work in this village. I do not go outside of my village for working. Some women go to the brick field with their whole family. They work in the brick fields and stay inside the brick field. Brick field owners make home and shelter for living. Three family members can earn 5 to 6 thousand taka per week.
- In earlier times, very nice paddy was grown. But now nothing. Also there are many troubles to face. I have four ducks but no geese. I have to protect them from entering into others' gher. Otherwise, gher owners will catch them and consume them. We can't plant any plant. There is no papaya tree; Puishakh (one kind of vegetables) does not grow. Saline water erodes everything, even mud walls of houses.
- I have a son and a daughter. Last year my daughter got married. My son-in-law is an auto van driver. Marriage ceremony means huge expenditures. Also there is a dowry system. Everybody rich and poor must have to pay dowries. Starting from 50 thousand to 1 lac (Tk.100000) and at least 20 thousand taka to the parents of boy. In addition to money, we have to give mattress, furniture, glass and more significantly plates. Plates must be needed otherwise bride groom will not give food to feed her. These also cause further problems, such as, girls' demand these things back from their husbands while quarreling, as they were given by their fathers.
- I have to manage drinking water from one kilometer distance. I bring water from the ponds of Dr. Razzak, put them through filtering for a day for purifying; after one day it becomes fit for drink.
- We need not think about the elimination of shrimp farming. These are for the survival of the fittest. Those who can't survive, they must be eliminated. If no water comes from the river, how will it run?

Narratives 18: Interviewing shrimp gher manager

Abdul Khaleque Sarder (Ex Manager of a large gher)

Mobile: Not using

Village: Lasker, Village Paikgacha

In Paikgacha, there were two or three big gher. We have seven hundred bighas (233.33 acres) of land in Lasker Beel. Hazi Shaheb, (Hazi Abdul Gani Sarder) took hari from all of us in 1999. I was appointed as the manager. In 2009 we have quit from shrimp farming.

- It was very profitable. Hazi Shaheb earned billions of taka. He has lots of lands, homes, hotels, markets, cars and so many things. His son is also a medical doctor. There were virus at that time, but it was not so severe. Our owner has quit it in 2009.
- Hazi Shabeb is intellectual and lucky. He entered into the business in a proper time and quit in a proper time. Therefore, he is not so much affected by loss. At present people are doing this business for emotions only. When Hazi Shaheb has felt that, people are very curious/interested in farming shrimp in their own lands, there were clashes everywhere, and led up to losses, after which he had quit the business.
- Living Conditions of this area were very poor. People were paid very low. People had no ability to manage two meals (rice). This area has then developed by shrimp farming.
- Earlier a gher owner could earn 8 to 9 times profit. 20 to 30 people always worked in the gher at that time. Labors were divided into some groups. There was a group leader (Matbar). The women are working here now also have groups and a leader too. When we were in need of labors, we informed it to the leader. Leader distributed the labors, works and wages. Sometimes there would be bargains for more wages. At the time of Goi (high tide), many small fishes enter into the gher. We could catch 20 to 30 maunds of small fishes then. Shrimp rate (price) was highest at 900 taka per Kg.
- At that time, shrimp farming was under a group of people. There were not so much bargaining or competition; there were no crisis or police harassments. The people of every party used to do their own work. Hindus and Muslims had no clashes. The gher owners could manage big loans from the banks. Last year, when we quit, Hazi Shaheb got the profit of 45 lacs taka (4.5 million taka) from our gher.
- Hari system is more profitable than rice cultivation. Half of the portion of rice would have been taken by the cultivators (in share cropping systems). Now rice is not produced. The people who live beside the river can grow rice.
- Now it is very difficult to run a gher. Bank loan is very difficult to achieve. Only big investors can do this and gain profits. It is also laborious. People have to work in the sun, always need to have a watcher, and at the time of rains or storms they might also have to stay at the gher site.
- By the grace of Allah, me Alhamdulillah, I earn more than 60 thousand taka per year from hari (leasing out my lands). I have some shops in the market from which I earn about 50 thousand taka per year as rent; my son also gives me some amount. I gave marriage to my daughter; my son in law is a police officer. We have three members in our family including our twelve years old son.

- Future is unknown. Situations are not in our favor. We are not happy now. If ghers had been eradicated then we might have felt happy.

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