



### Government of the People's Republic of Bangladesh Ministry of Housing and Public Works

স্বল্লোন্নত দেশ থেকে উন্নয়নশীল দেশে উত্তরণের যোগ্যতা অর্জন করা উপলক্ষ্যে নগর উন্নয়ন অধিদপ্তরের পরিকল্পনায় SDG এর অর্জন শীর্ষক সেমিনার

# How 14 Upazilas Project can Contribute to Achieve SDGs and help in Maintaining Graduation Status from LDCs???

উদয় শংকর দাস সিনিয়র প্ল্যানার নগর উন্নয়ন অধিদপ্তর www.14upazilaudd.gov.bd

তারিখ: ২৪-০৩-২০১৮

### Presentation Outline

- 1. Project Brief
- 2. Objectives of the Project
- 3. Location of Project Area
- 4. Conceptualization & Methodology
- 5. Major Surveys Conducted
- 6. Outputs of 14 Upazila and SDGs (Examples from Shibpur Development Plan)
- 7. Graduation form LDCs
- 8. Concluding Remarks

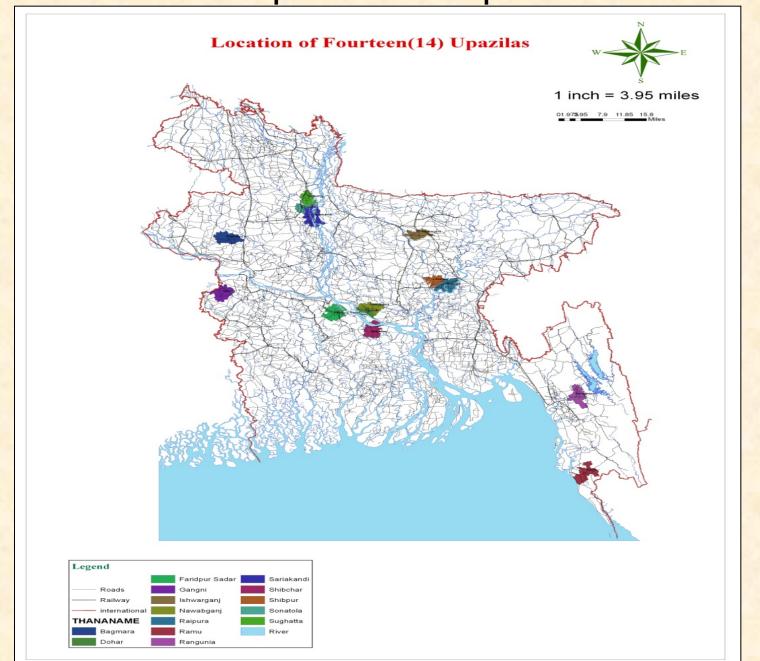
#### **Project Brief**

- Name: Preparation of Development Plan for Fourteen Upazilas
- Organization: Urban Development Directorate (UDD)
- Funding: Government of Bangladesh
- Upazilas: 14
- Planning Area: 4335.83 Sq.Km.
   [Urban: 218.82 Sq.Km. (5.05%), Rural: 4117.01 Sq.Km. (94.95%)]
- Targeted Beneficiary: 38,64,195
   [Urban: 5,04,525 (13%), Rural: 33,59,670 (87%)]
- Project Period: June 2013 to June 2018
- Project Budget: 2054.44 Lakh (GoB)

#### Objective of the Project:

- To guide the land use transformation in an integrated and harmonic manner with a view to accelerate the economic and socio- political development of the project area.
- > To protect the most valuable agricultural land from any other unplanned transformation
- To allow the towns to play their active socio-economic role within the Physical Planning, agriculture, transportation, drainage, water Supply, housing and other important relevant sectors
- To reduce disaster risk and vulnerability of the people of the project area through structure and non-structural interventions
- > To improve awareness of natural hazard mitigation among the people of project area.
- To formulate sub-regional plan, Structure plan, Urban area plan, Rural area Plan and action area plan of the project area

#### Map: Location of 14 Upazilas



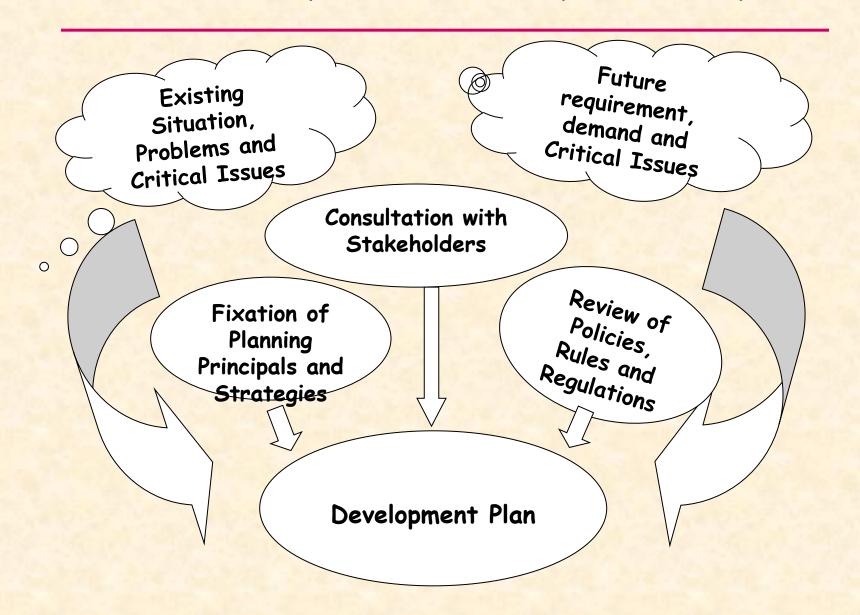
#### Number of Planning Packages under this Project:

Sl. No.	Packages	Name of upazilas	Consulting Firms assigned
1.	Package-1	Nawabganj, Dohar, Shibchar	Desh-Upodesh in Association with AAima Int. BD & Texsus Ltd.
2.	Package-2	Ishwarganj, Raipura, Shibpur	JV of Sheltech (Pvt.) Ltd & Arc Bangladesh Ltd.
3.	Package-3	Bagmara, Faridpur sadar, Gangni	Engineers, Consultants and Associates Ltd. (ECAL)
4.	Package-4	Saghatta, Sonatota, Sariakandi	Modern Engineers, Planners & Consutants Ltd.
5.	Package-5	Ramu, Rangunia	JV of House of Consultants and Dm-Watch

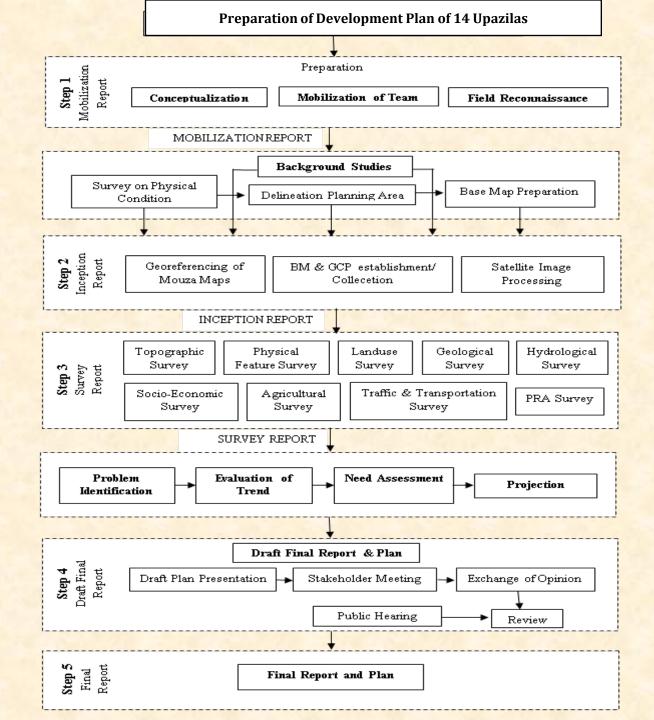
#### Planning Area and Number of Beneficiary:

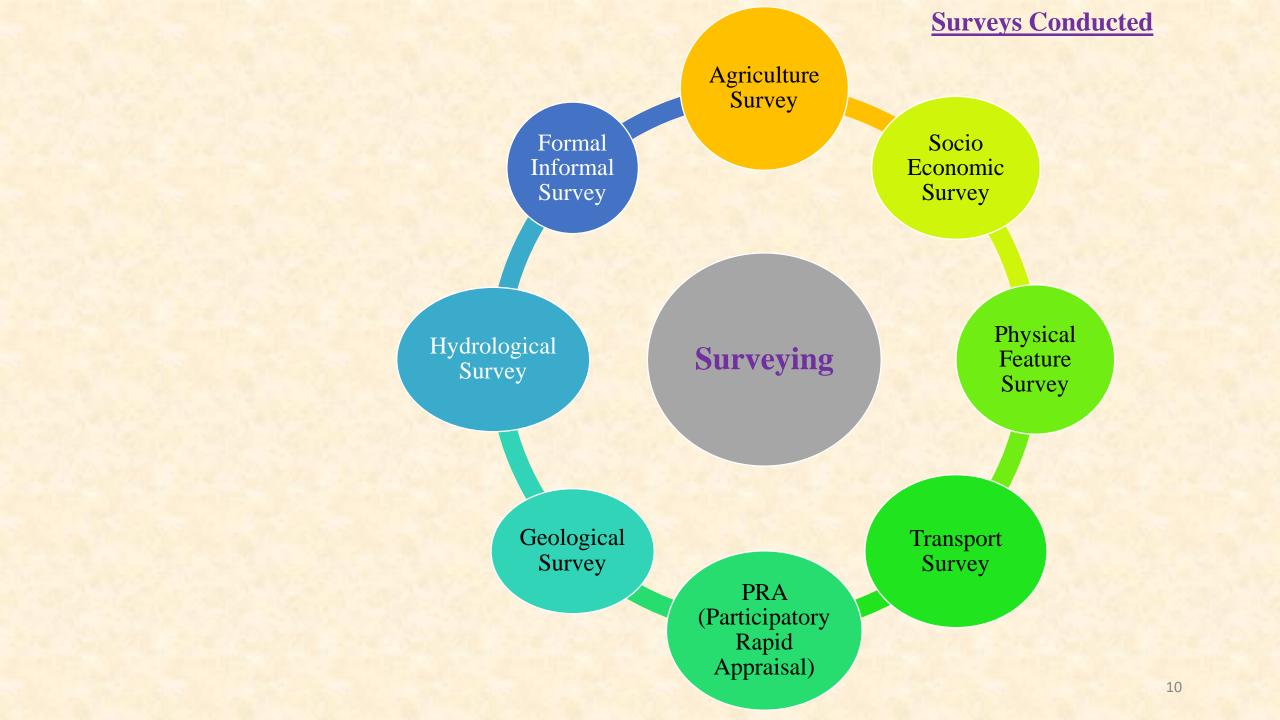
	Name of District		Planning					
Sl. No.		Name of upazila	Area (sq.km)	Urban area	Rural ar <mark>e</mark> a	Urban Population	Rural Population	Total Beneficiary
	Dhaka	Nawabganj	244.8	1.76	243.04	77590	410438	488028
1		Dohar	161.49	20.31	141.18	61793	129630	191423
2	Chittagong	Rangunia	361.54	37.08	324.46	53035	245335	298370
3	Cox bazar	Ramu	391.71	22.03	369.68	33334	169349	202683
4	Rajshahi	Bagmara	363.3	26.58	336.72	34632	285336	319968
5	Faridpur	Faridpur	407.02	23.45	383.57	101084	312401	413485
6	Mymensingh	Ishwarganj	286.19	15.82	270.37	30948	307132	338080
7	Madaripur	Shibchar	321.88	17.02	304.86	27877	296561	324438
100	Narsingdi	Shibpur	232.47	3.52	228.95	10426	303394	313820
8		Raipura	408.45	13.49	394.96	34411	420135	454546
	Bogra	Sariakandi	432.6	3.58	429.02	17320	222763	240083
9		Sonatala	156.73	4.94	151.79	11405	156142	167547
10	Gaibanda	Saghata	225.67	6.38	219.29	15549	234720	250269
Meherpur 11		Gangni	341.98	22.86	319.12	23846	245239	269085
	Total	The state of	4335.83	218.82	4117.01	504525	3359670	38,64,195

#### Conceptualization of Development Plan Preparation



### Methodology





## Background of SDGs

- IN 2000, 189 COUNTRIES OF THE WORLD CAME TOGETHER TO FACE THE FUTURE.
- Leaders from these countries created a plan called the Millennium Development Goals (MDGs).
   This set of 8 goals imagined a future just 15 years off that would be rid of poverty and hunger.
- The United Nations Development Programme (UNDP) has been one of the leading organizations working to achieve the MDGs. And the progress in those 15 years has been tremendous. Hunger has been cut in half. Extreme poverty is down nearly by half. More kids are going to school and fewer are dying.
- Now these countries want to build on the many successes of the past 15 years, and go further. The new set of goals, the Sustainable Development Goals (SDGs), aims to end poverty and hunger by 2030.
- The world is also better connected now than it was in 2000, and is building a consensus about the future we want.
- That future is one where everybody has enough food, and can work, and where living on less than \$1.25 a day is a thing of the past.
- UNDP acts as a leader in this global movement. Introducing 17 (Seven-teen) new Goals which they call "Sustainable Development Goals" or SDGs.

#### Introduction

- The SDG's were adopted by 193 member states at the historic Un General Assembly Summit in September 2015 and came into effect on January 1,2016.
- The SDG's have been developed through a consultative process that bought national governments and millions of citizens from across the globe

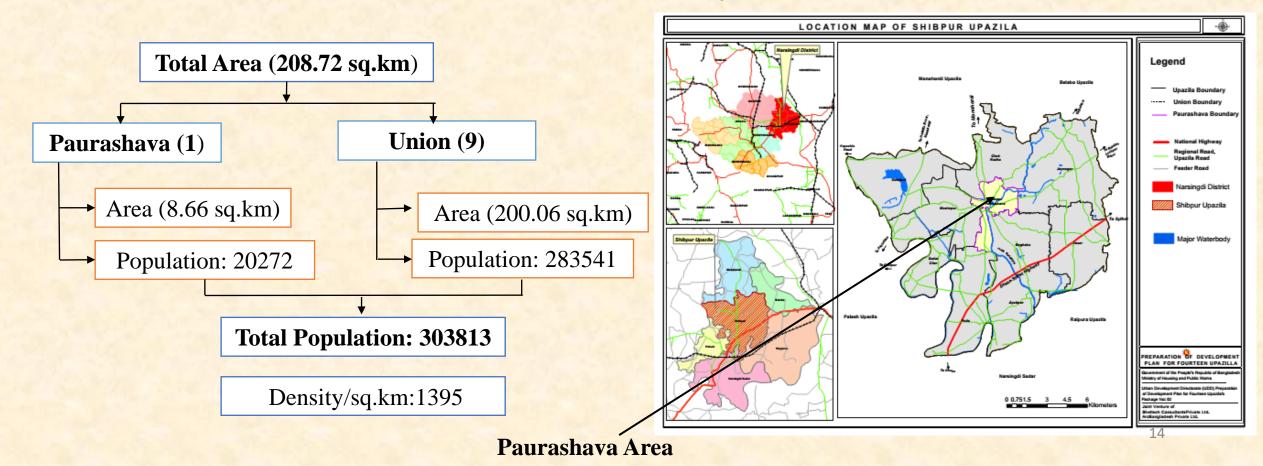




# Outputs of 14 Upazila Project (For example: Shibpur Upazila) Illustrates some Contribution to SDG 11

### Shibpur Upazila at a Glance

- Shibpur Upazila having an area of 208.72 sq. km. established in 1918.
- Shibpur Upazila (Narsingdi district) is located in between 23°56' and 24°07' North Latitudes and in between 90°38' and 90°50' East Longitudes.
- It has 9 Wards, 9 Unions, 132 Mouzas and Mahallas, and 194 villages (BBS, 2011).

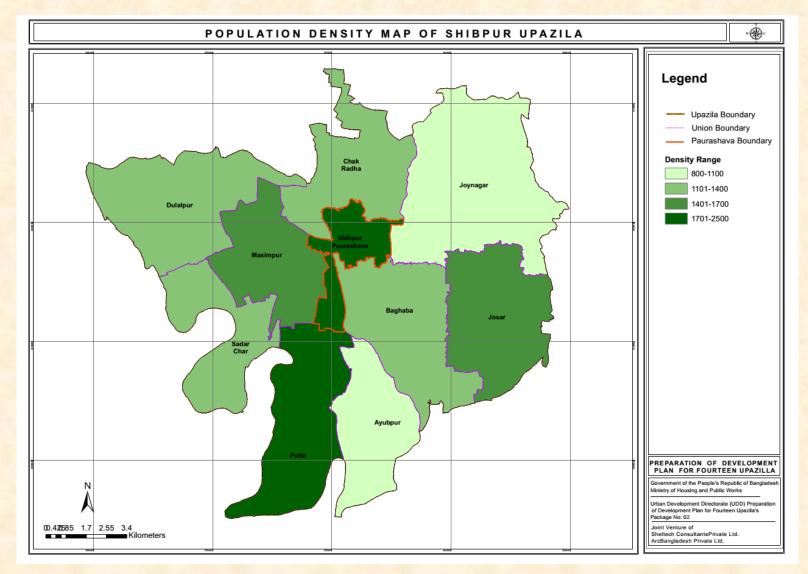


#### **Area and Population**

The Structure Plan covers an area of 51590.54 acres (208.72 sq.km.) including existing Paurashava area and its total Union area which comprises 9 unions.

Name of Area	Area (as per	GIS database)	Population		
Ivallie of Area	Sq.km.	Acre	2011	2035	
Paurashava	8.66	2153.71	20272	34905	
Ayubpur Union	16.4	4053.47	30243	37055	
Baghaba Union	23.3	5758.24	29023	35560	
Chak Radha Union	19.08	4716.12	24663	30218	
Dulalpur Union	25.86	6389.15	33220	40703	
Josar Union	22.32	5515.33	30427	37280	
Joynagar Union	37.15	9180.6	30540	37419	
Masimpur Union	17.8	4399.62	28143	34482	
Putia Union	22.46	5551.11	54503	66779	
Sadhar Char Union	15.67	3873.32	22779	27910	
Total	208.72	5,15,90.54	3,03,813	3,82,311	

### **Population Projection**



	Y-	-2011	Y-2035			
Area	Popula tion			Density/sq .km		
Urban Area	20272	2327	34905	4007		
Rural Area	283541	1417	347406	1736		
Total	303813	1455	382311	1813		

## SDG 11.1: By 2030 ensure access for all to adequate safe and affordable housing and basic services and upgrade slums

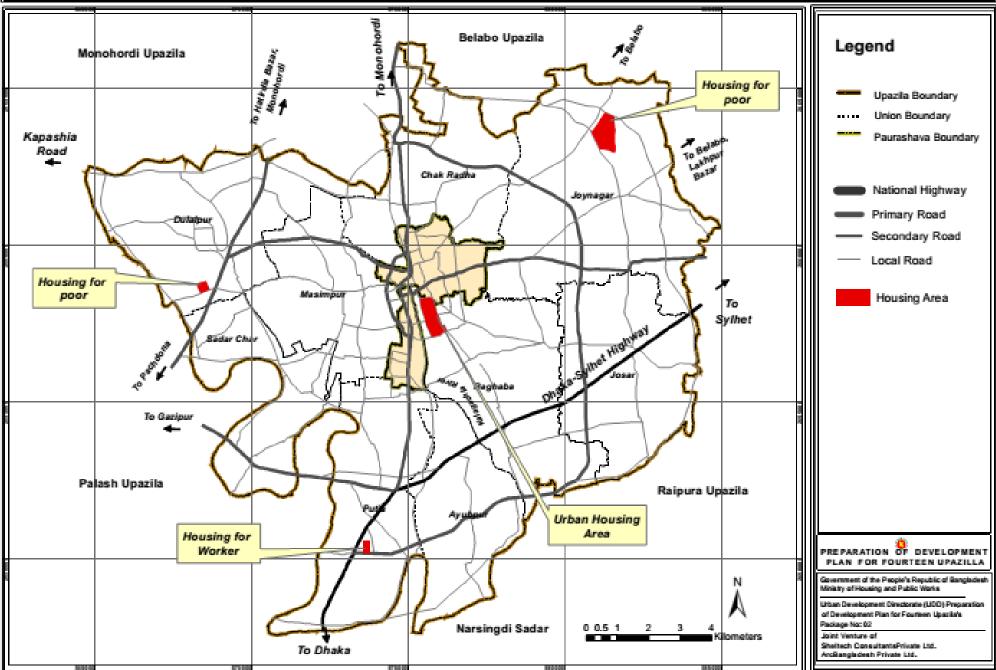


According to population projection, population of Shibpur Paurashava will be 34905 in the year 2035 and Rural Area population will be 347407. To ensure access for all to adequate housing new housing area has been proposed.

- ☐ Though there is no slum in Shibpur Upazila, Core Housing Area has proposed considering economic activities for low income group in peripheral area where land price is comparatively low. Core Housing areas have proposed at Joynagar with an area of 170 acres and at Sadherchar union with an area of 25 acres.
- ☐ With special consideration of workers of industrial zone a Housing for Workers has been recommended at Putia union with an area of 15.81 acres.
- ☐ To ensure access to housing a Planned Housing Area has been proposed at Paurashava with an area of 137.45 acres.

#### PROPOSED HOUSING AREA OF SHIBPUR UPAZILA





## SDG 11.2: By 2030 provide access to safe affordable accessible and sustainable transport systems for all



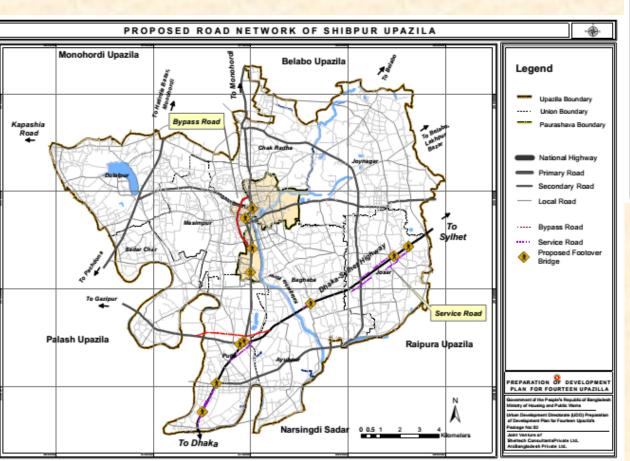
To create easy traffic movement within the Paurashava and Upazila, the roads has suggest to be widened. The main artery of both the Paurashava and unions has kept free from any development. All missing linkages on roads to be linked for easy, convenient, and safe traffic movement along with over pass, foot over bridge, service roads at Bazar area, walkway for pedestrian safe movement are recommended. In Paurashava area 77.79 acres road and rural area 1118.53 acres roads proposed for improving and frequent transport system. For Example:

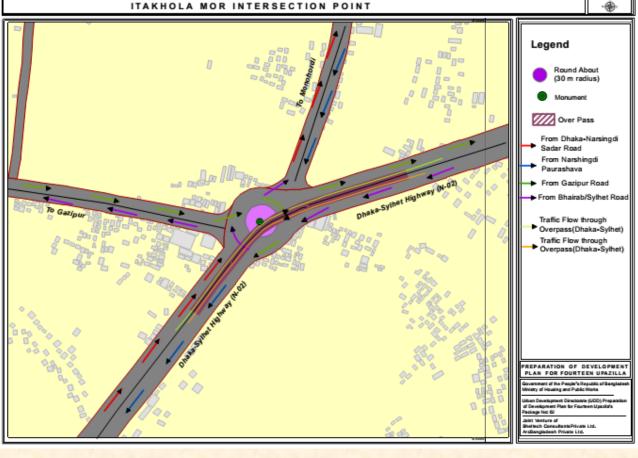
- ☐ To reduce traffic congestion over pass, grade separation has proposed at Itakhola Mohr.
- ☐ To avoid traffic congestion at Itakhola Mohr service road has proposed Dhaka to Sylhet Highway.
- ☐ In Shibpur Upazila Kundarpara Bazar is located at Baghaba union, Sristygar and Chaitannya Bazar are located at Josar union create messy condition, congestion and frequent accidents in the area. To avoid such situation Kamartek Bazar to Chaitannya Bazar and Chaitannya Bazar to Sristygar Bazar new service roads has proposed.
- □ New service road has recommended in both side of Kamarchar road to Char Shujapur road at Putia union which is suggested as Industrial zone.

## SDG11.2: By 2030 provide access to safe affordable accessible and sustainable transport systems for all,



- ☐ By Pass Proposed (03 No.s)
  - Paurashava By Pass
  - > To create direct linkage with National Highway a By Pass has proposed at Itakhola to Gazipur road
  - Considering future development a By Pass connecting Putia, Ayubpur, Josar, Joynagar, and Chakradha has recommended to create direct linkage with Monohardi
- ☐ Foot Over Bridge (11 No.s)
- ➤ At present Bus Stand Mohr
- Mannan Bhuiyan Chattar
- Proposed By Pass Mohr
- Bajnaba Mohr
- > Kararchar Mohr
- Guptopara Mohr focusing Industrial zone
- ➤ Itakhola to Gazipur road
- > Itakhola to Paurashava
- Kundarpara Bazar
- Srystigar Bazar
- Chaittannya Bazar





# SDG 11.3: By 2030 enhance inclusive and sustainable urbanization and capacity for participatory, integrated and sustainable human settlement planning and management in all countries

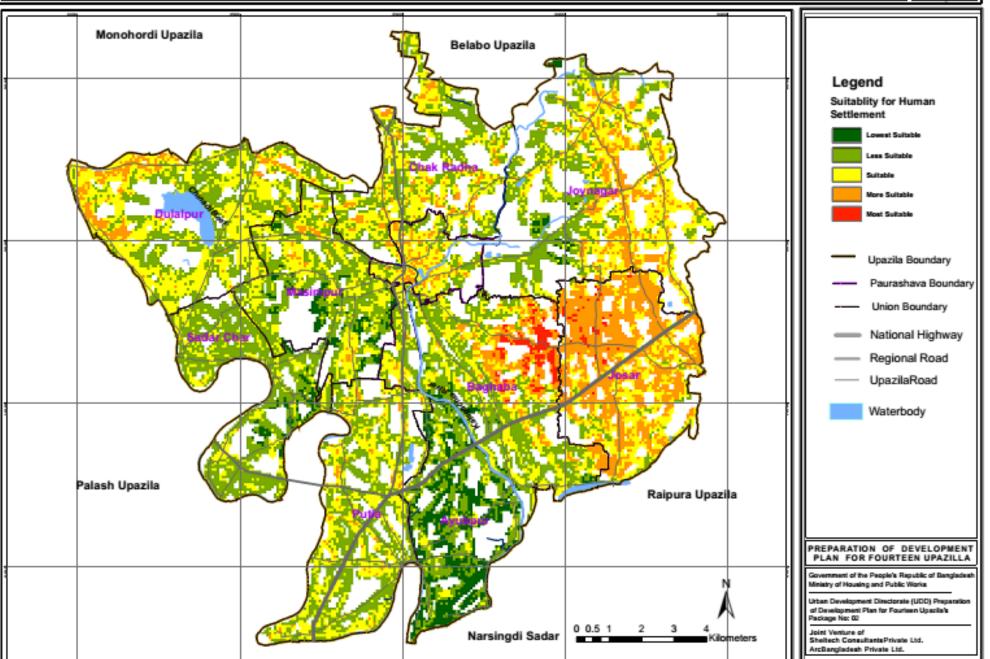


For sustainable urbanization service facility has proposed to the whole upazila in a decentralized way. All kinds of facility has been proposed so that people of this Upazila would not depend on another upazila for service facilities. Future extension of urban area has proposed for future development.

- ☐ Human settlement area has proposed based on land suitability analysis so that this area would not be at Flood prone area.
- ☐ These areas have been suggested after considering Hydrological suitability, Geological suitability, Road network etc.
- ☐ Urban Core area is suggested in best suitable land at Paurashava and in Rural area there are some suitable land for human settlement at Josar and Joynagar union.
- Ayubpur and Shaderchar union has less suitable land for human settlement so these lands have recommended for agricultural use.

#### LAND SUITABILITY FOR HUMAN SETTLEMENTS OF SHIBPUR UPAZILA





## SDG 11.4: By 2030 Strengthen efforts to protect and safeguard the worlds cultural and natural heritage



1. Ecologically Sensitive Area (ESA) has been identified for preserve and future development and bringing up the ecologically and culturally valuable sights into prominence and making them functional such as Shonamuri Pahar at Baghaba union and Chinardi Beel at Dulalpur Union.

- ➤ Three Domed Mosque (Ashrafpur, 1524),
- Single Domed Mosque (Kumardi),

2. Heritage Site (05 No.s)

- > Tomb of Shah Mansur,
- > a gold coin (Gupta period) discovered at village Baghaba,
- raveyard of Shaheed Asad, (the Hero of 1969) at Dhanua

Note: All these heritage site are recommended as Restricted zone.

3. Tourist Sides (02 No.s): One tourist spot proposed at Baghaba union which is 7.82 acres area. Different service facility has proposed for attract tourist. New road has proposed for improving road network in those area. For improving heritage site consultant suggest public participation through central and local conservation committees at Shonamuri Pahar.

### Heritage Site of Shibpur Upazila

Graveyard of Shaheed Asad

# Domed Mosque (Ashrafpur)

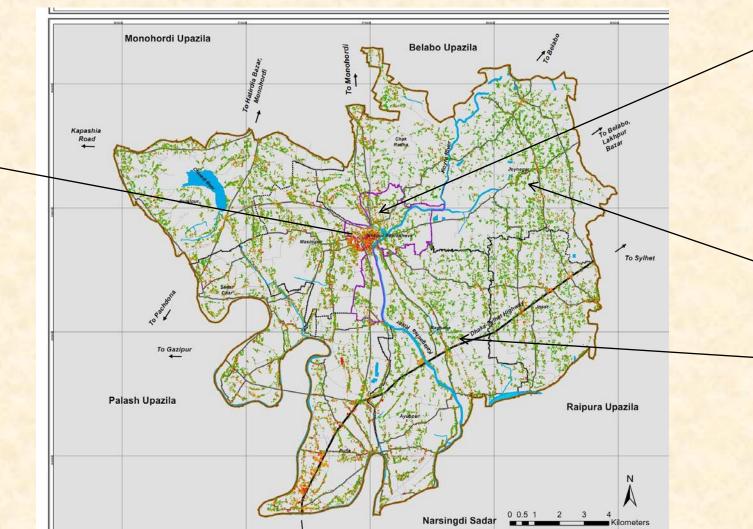


Boudha Padha Mandir Bita, Dhpirtek, Kamrabo



### Shonamuri Pahar at Baghaba

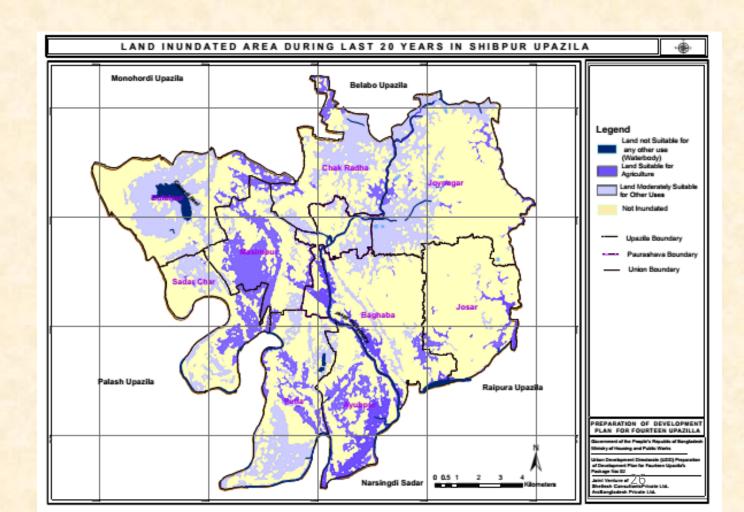




SDG 11.5: By 2030 Significantly reduce the number of deaths and the number of people affected and substantially decrease the direct economic losses relative to global gross domestic product caused by disasters including water related disasters with a focus on protecting the poor and people in vulnerable situation.



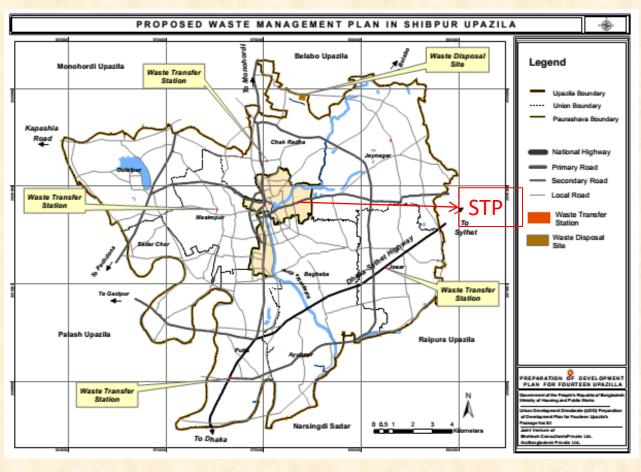
- In Shibpur Upazila there are only some sub flood flow zone has identified after analyzing previous 20 years flood flow data. Main Flood flow zone are not found in Shibpur. Human settlement on sub flood flow zone are discouraged.
- ☐ To find future inundated area previous flood flow data of 20 years using 5 years interval has analyzed so that settlements would not be on such areas,



# SDG 11. 6: By 2030 reduce the adverse per capita environmental impact of cities including by paying quality and municipal and other waste management.



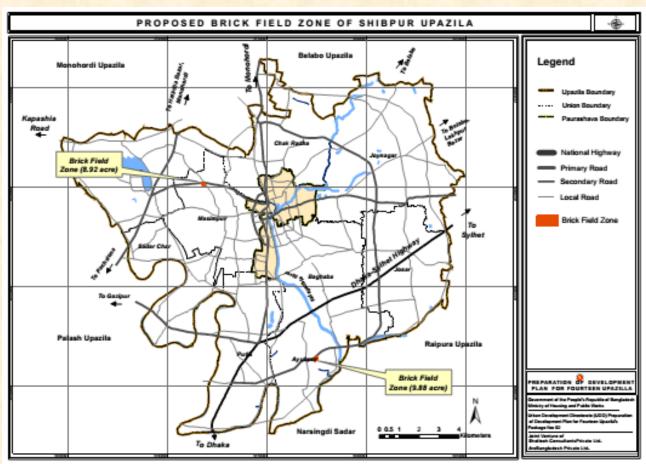
- In Shibpur Paurashava area solid wastes are dumped in a scattered way. Its create environment pollution in the area. Also the sanitation condition of Shibpur is not so much satisfactory. 01 (one) waste transfer station has proposed at each union. 01 (one) Sludge Treatment Plant (STP- 1.5 Acres) has been proposed at ward no. 2 of Municipality.
- Industrial zone has proposed at Putia Union which is outside of the city area. To evade direct mix of industrial waste with water, a Water Treatment Plant has proposed.
- In the structural plan different policy and strategy suggest for waste management and pollution control.



## SDG 11.7: By 2030 reduce the adverse per capita environment impact of cities including by paying special attention to air quality and municipal and other waste management



- In Shibpur Upazila brick field developed haphazardly all over the area causing air pollution. There are 4 (four) brick fields in this Upazila. One is located at Ayubpur and Chakradha. Rest of two brick fields are located at Putia which pollutes air and environment surrounding the area.
- In Urban, and peri-urban area, brick field is restricted within 3 (three) km. buffer zone from centre of the Paurashava. Considering this 2 (two) Brick field zone has been proposed at Ayubpur union (9.88 acres) and Masimpur union (8.92 acres) for control environment pollution.

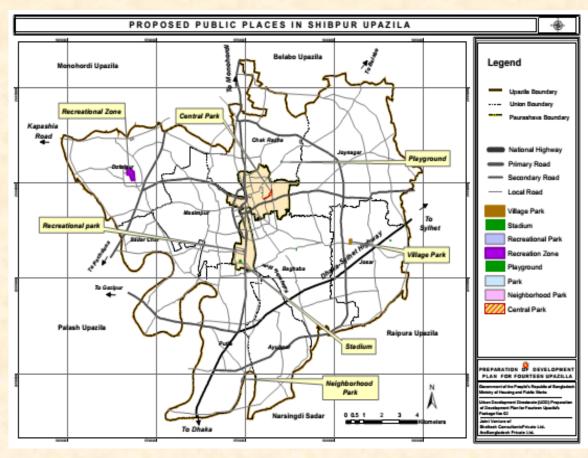


# SDG 11.8: By 2030 provide universal access to safe inclusive and accessible green and public spaces in particular for women and children, older persons and persons with disabilities.



To ensure access to safe inclusive and accessible green and public spaces some urban parks, village parks, play grounds etc. have proposed.

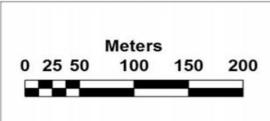
- Public gathering space have been proposed at College road Chattar for all classes of people to celebrate different festivals of our country.
- Recreational zone has proposed beside Chinardi Beel considering special feature of this Beel
- 2(two) New park and one Mini-Stadium has been proposed in Paurashava area where access for all classes of people
- In Paurashava area 1 (one) central park (11.13 acres) has been proposed where children and older person would use it as their recreational place
- Neighbourhood park at Putia, village park at Josar and playground at Baghaba has been proposed



#### ACTION AREA PLAN (CHINADI BEEL, SHIBPUR)









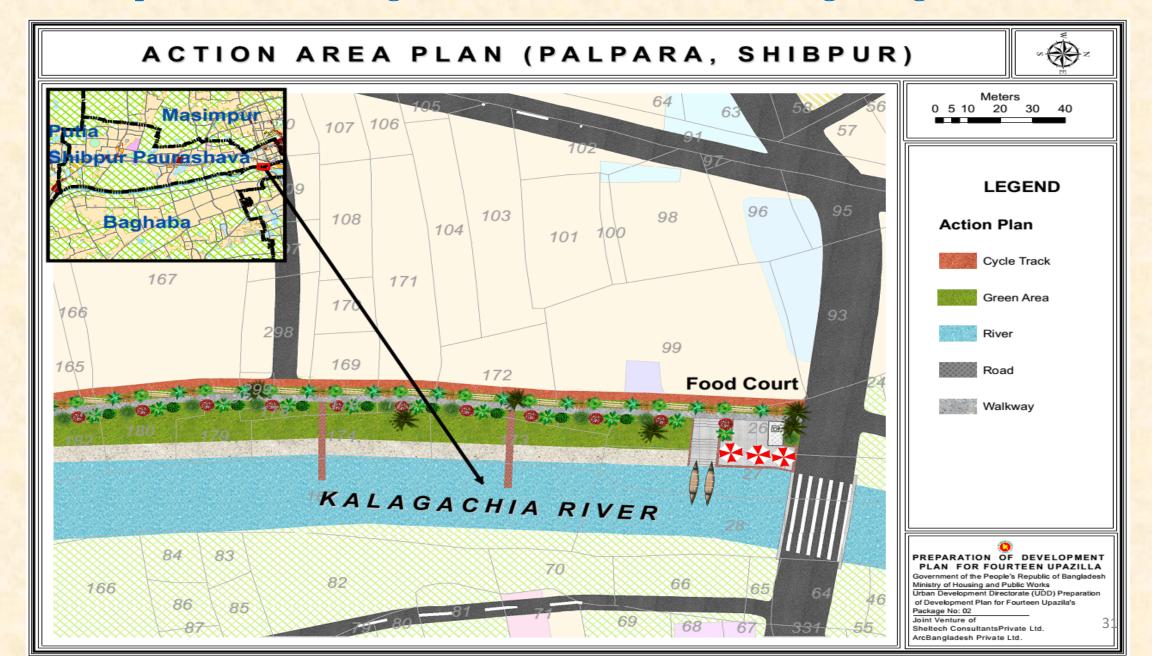
#### PREPARATION OF DEVELOPMENT PLAN FOR FOURTEEN UPAZILLA

Government of the People's Republic of Bangladesh Ministry of Housing and Public Works Urban Development Directorate (UDD) Preparation of Development Plan for Fourteen Upazila's

Package No: 02 Joint Venture of

Sheltech ConsultantsPrivate Ltd. ArcBangladesh Private Ltd. 30

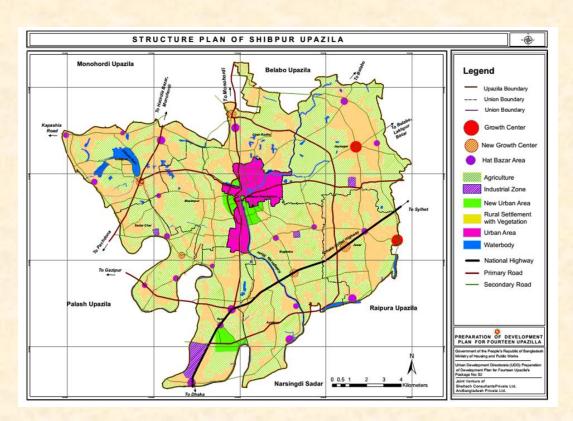
#### **Examples of Urban Design for Recreation Facilities along Kolagachia River**

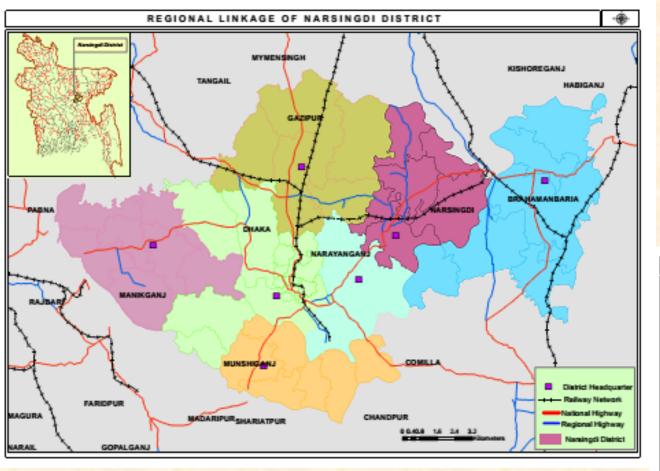


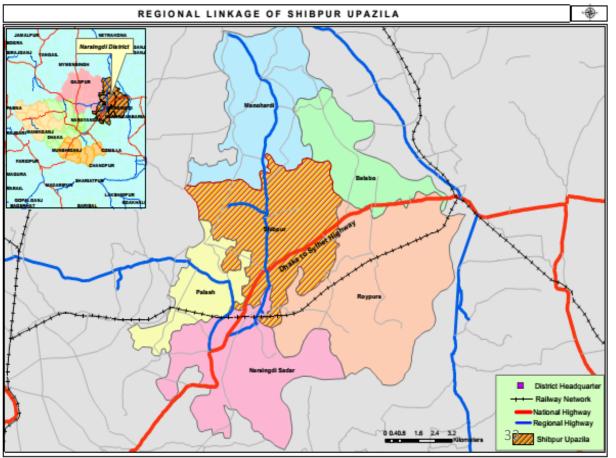
## SDG 11.9: By 2030 Support positive economic, social and environment links between urban, peri-urban and rural areas by strengthening national and regional development planning



- Road networks will play strategic role in opening up undeveloped areas of the future term and shape up its structure. There is an interrelation between road network and utility services which together play key role to guide physical development in the town and Upazila. Transportation is a non-separable part of any development.
- Shibpur upazila adjacent to the Dhaka-Sylhet highway about 45 km away of northern most east direction from capital city of Bangladesh, Dhaka. For future extension of Dhaka city regional policy has given as a Satellite city. For given better service facility shopping complex, Puro market, Residential zone, Recreational park, Government college, Mosjid complex, Hospital, Bus terminal and Central park etc has been proposed.







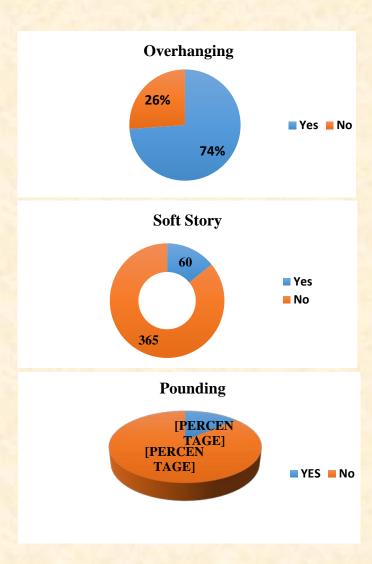
**SDG 11.10:** By 2020 substantially increase the number of cities and human settlements adopting and implementing integrated policies and plans towards inclusion, resource efficiency, mitigation and adaptation to climate change, resilience to disasters and develop and implement, in line with the Sendai framework for disaster risk reduction 2015-2030, holistic disaster risk management at all levels.



#### **Vulnerability and Risk Assessment Survey**

Risk Assessment survey was done to find out building condition of regarding Upazila. As per FEMA (Federal Emergency Management Agency) guideline 8 (eight) types of Vulnerability Assessment Criteria such as Overhanging, Soft Story, Pounding, Set Back, Short Column, Mobile Tower, tilting and Ground Set has been collected for those structure which has more than 1 floor and number of those building were 425.

- Overhanging: An overhang in architecture is a protruding structure which may provide protection for lower levels. 74% building has overhanging condition, a few overhanging building is bad but maximum building condition is good.
- □ **Soft Storied:** Number of soft storied building only 60. According to soft storied data building condition is not vulnerable in earthquake at Shibpur Upazila.
- □ **Pounding:** For pounding condition About 86% building has safe distance from another building.



### Geo-database of Apparently Risky/Vulnerable Structure of Shibpur Upazila

Table









Locality	Landuse	Union	Strctr_use	Туре	Floor1	Floor2	Floor3	Floor4	Risk_Class	Floor5	L
Dhanua	Residential	Masimpur	House	Pucca	1 1				Most Risky Structures		
College Gate	Mixed Use	Masimpur	House and Shop	Pucca					Most Risky Structures		
Dhanua	Education and Research	Masimpur	College	Pucca					Most Risky Structures		
Karardi	Residential	Putia	House	Pucca					Most Risky Structures		
Purbo Munsefer Char	Industrial	Putia	Factory	Pucca					Most Risky Structures		
Purbo Munsefer Char	Industrial	Putia	Factory	Pucca					Most Risky Structures		
Purbo Munsefer Char	Residential	Putia	House	Pucca					Most Risky Structures		
Munsefer Char	Residential	Putia	House	Pucca					Most Risky Structures		
Karardi	Industrial	Putia	Factory	Pucca					Most Risky Structures		
Karardi	Industrial	Putia	Factory	Pucca					Most Risky Structures		
Baniadi Chottor	Residential	Shibpur Upazila	House	Pucca	Residentia	Residentia			Most Risky Structures		
Baniadi Chottor	Residential	Shibpur Upazila	House	Pucca	Residentia	Residentia	Residentia		Most Risky Structures		
Baniadi	Residential	Shibpur Upazila	House	Pucca	Residentia	Residentia			Most Risky Structures		
Baniadi	Residential	Shibpur Upazila	House	Pucca	Residentia	Residentia			Most Risky Structures		
Dak Banglo Road	Residential	Shibpur Upazila	House	Pucca	Residentia	Residentia			Most Risky Structures		
Dak Banglo Road	Residential	Shibpur Upazila	House	Pucca	Residentia	Residentia			Most Risky Structures		
Bahar Diya	Residential	Shibpur Upazila	House	Under Construction	Residentia	Residentia	Residentia	Residentia	Most Risky Structures		
	Residential	Shibpur Upazila	House	Under Construction	Residentia	Residentia			Most Risky Structures		
	Residential	Shibpur Upazila	House	Pucca	Residentia	Residentia			Most Risky Structures		
Sudar Gaon	Residential	Shibpur Upazila	House	Semi Pucca	Residentia	Residentia	Residentia		Most Risky Structures		
Sadar Road Shibpur	Mixed Use	Shibpur Upazila	House and Shop	Pucca	Shop	Residentia			Most Risky Structures		
Sadar Road Shibpur	Commercial	Shibpur Upazila	Bank+Shop	Pucca	Shop	Bank			Most Risky Structures		
Sadar Road Shibpur	Mixed Use	Shibpur Upazila	House and Shop	Pucca	Shop	Residentia			Most Risky Structures		
Karardi	Residential	Putia	Residential	Pucca					Most Risky Structures		
Shibpur Bazar	Residential	Shibpur Upazila	House	Semi Pucca					Most Risky Structures		
Sadar Road Shibpur	Residential	Shibpur Upazila	UC	Pucca	Market	Under Co	Under Co	Under Co	Most Risky Structures	Under Co	
Dhanua	Non-government	Masimpur	NGO Office	Pucca					Moderate Risky Structure		
Dhanua	Residential & Homestead	Masimpur	House	Pucca					Moderate Risky Structure		
Dhanua	Education and Research	Masimpur	School	Pucca					Moderate Risky Structure		
Dhanua	Residential & Homestead	Masimpur	House	Pucca					Moderate Risky Structure		
Dhanua	Residential & Homestead	Masimpur	House	Pucca					Moderate Risky Structure		
Dhanua	Residential & Homestead	Masimpur	House	Pucca					Moderate Risky Structure		1
Dhanua	Residential & Homestead	Masimpur	House	Pucca					Moderate Risky Structure		
Dhanua	Residential & Homestead	Masimpur	House	Pucca					Moderate Risky Structure		
Dhanua	Residential	Masimpur	House	Pucca					Moderate Risky Structure		
Dhanua	Residential	Masimpur	House	Under Construction					Moderate Risky Structure6		
Dhanua	Residential	Masimpur	House	Pucca					Moderate Risky Structure		
Karardi	Industrial	Putia	Factory	Pucca					Moderate Risky Structure		



Overhanging



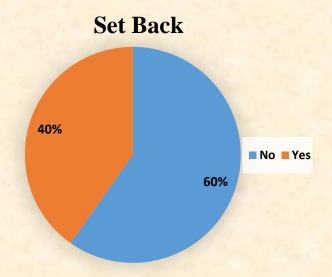


**Soft Story** 

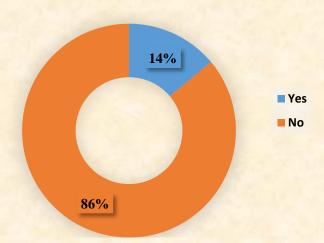


Set Back

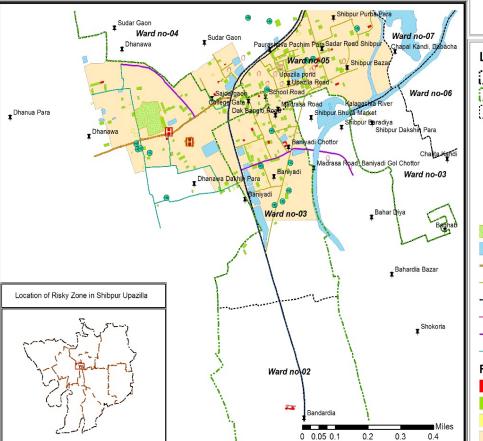
- □ **Set Back:** 60% buildings have enough space beside there boundary line. About 40% building break set back rules.
- ☐ Short Column: Only 14 % building has short column.
- ☐ Ground Set: All building has ground set.
- ☐ Mobile Tower: Only 10 building has mobile tower at their roof.







#### CONTINGENCY PLAN FOR SHIBPUR UPAZILA





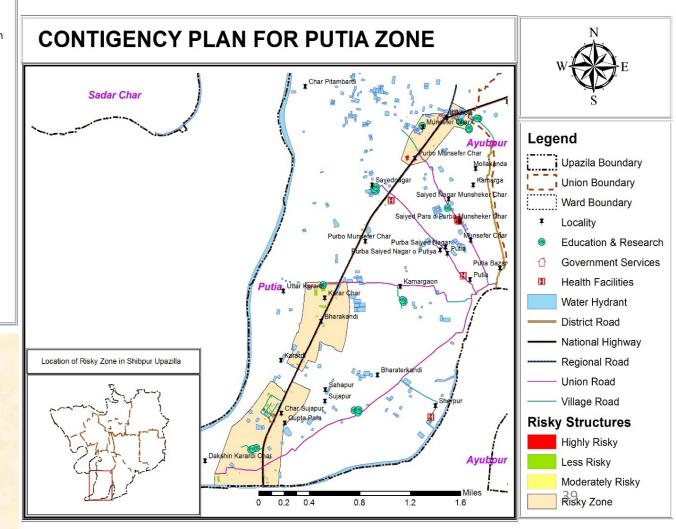
#### Legend

- Upazila Boundary
  Paurashava Boundary
  Ward Boundary
  - Locality
  - Adminstration
  - Education & Research
- Fire Service
- Government Services
- Health Facilities
- Open Space
- Water Hydrant
- District Road
- Paurashava Road
- --- Regional Road
- Union Road
- Upazila Road
- Village Road

#### **Risky Structures**

- Highly Risky
- Less Risky
  - Moderately Risky
  - Risky Zone

# Contingency Plan of Shibpur Upazila



### LDC Criteria

The Committee for Development Policy (CDP) is mandated by the General Assembly (GA) and the Economic and Social Council (ECOSOC) to review the list of LDCs every three years and to make recommendations on the inclusion and graduation of eligible countries using the following criteria:

Income

Human Assets

Economic Vulnerability

US\$ 1610 (min.1230)

72.9 (min. 66)

24.8 (< 32)

### **Concluding Remarks**

Development Plan each Upazila can Contribute Directly or Indirectly to SDGs and LDC Criteria. So hopefully Bangladesh can Maintain Graduation Status in next six years if all of us can contribute from our respective fields



# Thank You