

# Land Use Control Mechanism in the Context of Rajshahi Metropolitan Development Plan (RMDP) 2004-2024

**Md. Shaukot Ali Khan**

Metropolitan Rajshahi does not appear to be the focus of urbanization in Rajshahi region. The population of this region had increased at the rate of 1.73 percent per year during the period 1991-2001. In the previous decade the rate was 7.94 percent (1981-91) and thus growth rate has decreased by 6.21 percent per year. The urbanization rate (17.3) in the region has remained unchanged in the last decade (1991-2001). The annual growth rate of population in the decade 1991 to 2001 was the lowest in Rajshahi SMA (1.87) and fastest in Dhaka SMA (4.26). Every year Dhaka absorbs a size of population almost equal to that of Rajshahi City Corporation (RCC). The growth of RCC does not reflect the current trend of population growth and movement in Bangladesh. It is unlikely that Rajshahi Metropolitan Development Planning (RMDP) area will reach the one million population mark based on natural growth rate of the resident population alone. RMDP area population density is relatively high (40 persons per hectare) in the central urban belt (RCC area) and relatively low (13 pph) in adjacent rural areas.

Thus, urban growth in Rajshahi City has been due primarily to natural growth of the population. The absence of rural migration, a major growth factor, signifies absence of its socio-economic pull factor. This is primarily due to the lack of economic investment at a significant scale. And it has critical implications for future growth and development of RMDP area. Lack of investment and consequent lack of economic opportunities is also indicated by its declining contribution to the district GDP (current price: urban Tk. 44.1 1995-96 to Tk. 40.0 1999-2000; rural Tk. 55.9 to Tk. 60 during the same period respectively) compared to the rural areas in recent years. The only option for a balanced distribution of population with employment and housing at strategic locations in RMDP area is to accelerate policy-induced migration from outside. It requires, among others, strategic long term planning setting directions for the development process to accelerate growth and promote structural changes in the level and composition of employment of the people resulting in a changed standard and pattern of living.

The RMDP area covers about 177 km<sup>2</sup> (excluding *char* land on the other side of the river Padma). The developed portion is only 60 km<sup>2</sup> (33.70 percent). It displays a highly mixed pattern of land use extending east-west and north-south (recent trend) linearly along the main roads. Sprawled urban expansion has created extensive areas of unmanageable settlements giving rise to a multitude of physical, environmental and socio-economic problems, serious financial strain and problems of co-ordination among

agencies due to unplanned growth. Supply of potable water, sewerage disposal, solid waste disposal, drainage and water logging appear to be major concerns. In this backdrop there is a need for a legal instrument in order to regulate land use in a manner that will encourage orderly growth of rural and urban areas in accordance with the strategic policies of the structure plan and urban area plan. This is in order to promote and protect public safety and welfare by (i) minimizing adverse effects resulting from the inappropriate location or use of sites and structures; (ii) conserving limited land resources and encouraging their efficient use. To carry out the purposes and provisions of RMDP as they apply within the context of the Structure Plan and Urban Area Plan, the following land use zoning categories have been established (DDC, 2001; DDC, 2002; DDC, 2003).

**Fig. 1. Land Use Zoning Categories**

<b>ZONE CATEGORY</b>	<b>CODE</b>	<b>ZONE CATEGORY</b>	<b>CODE</b>
Main Flood Flow Zone	MFF	Restricted Airport Overlay	RAO
Sub Flood Flow Zone	SFF	Restricted Flood Protection Reserves	RZF
Water Supply Protection Zone	WSP	Restricted Military/Public Safety	RZM
Mixed Use Planned Zone	MXP	Restricted Road/Rail/Utility Reserves	RZR
Mixed Use Spontaneous Zone	MXS	Restricted Special	RZS
Industrial (Low Hazard)	1-1		

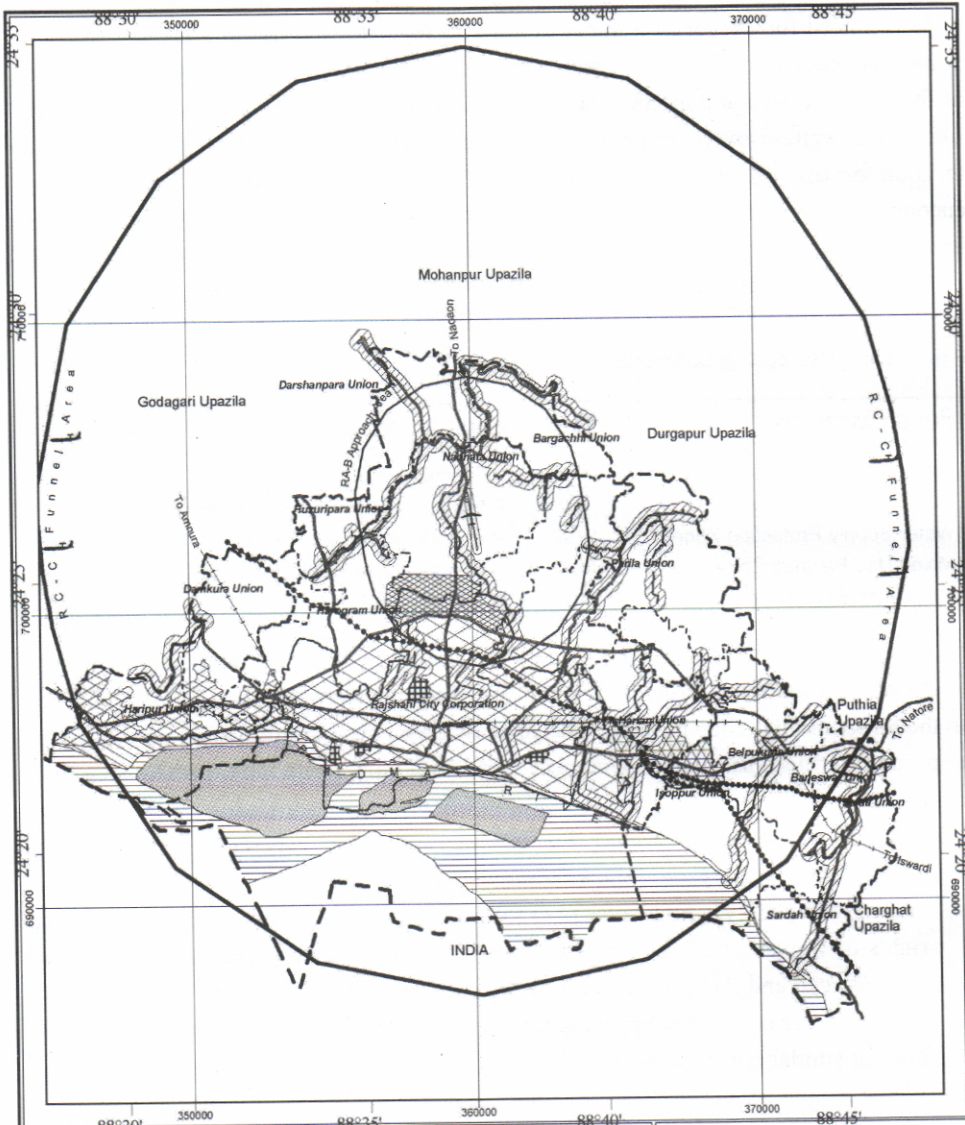
Upon adoption of the Structure Plan, these zoning categories as shown and designated on the Structure Plan Map have become general zoning classification of all parcels on the map, and termed as planning zones, and shall supersede any previous zoning classifications.

*Interpretation of Interim Zoning Boundaries* : Wherever uncertainty exists about a zoning category boundary, the following provisions shall apply:

- (a) A zoning boundary, which appears to follow centre lines of streets, road and railroad rights-of-way, rivers, *khals* and other waterways, and similar physical features, shall be construed and interpreted as following such centrelines.
- (b) Where zoning boundaries appear to follow street, road, lot/property boundary or other lines of similar nature, they shall be construed as following those lines.
- (c) Where zoning boundaries appear parallel or perpendicular to, or appear as extensions of centre lines, lot boundary or other features, they shall be so construed.
- (d) Where zoning boundaries do not appear to follow centre lines the location of these boundaries shall be determined by a measurement of distances shown on the adopted zoning map according to its scale. The same rule will be applied in case of street, road, lot/property boundary or other lines of similar nature or do not appear to be extensions of such lines or are not described within any rules.

Where the street layout on the ground varies from the street layout on the adopted zoning map, or other circumstances not covered by any of the above situations, the Town Planner shall determine the location of the boundary in question in accordance with the intent of these planning provisions.

RMDP Zoning Category Map

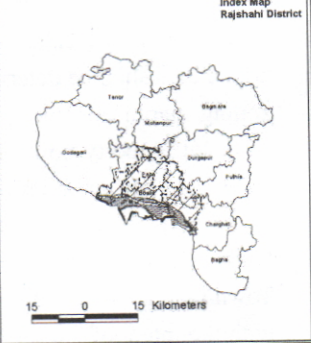


**Data source:**  
 This map was prepared on the basis of physical feature survey conducted directly in digital format with BTM projection with the help of RTK-GPS and Total Station.  
 For physical feature survey 21 BMs were installed with the help of RTK-GPS, on reference to available JICA point (JICA-1369, JICA-333, JICA-1433).  
 Available SSB BMs (SoB-729 & SoB-8232) were used as reference for Vertical adjustment.

**Projection Parameters:**  
 Projection: Bangladesh Transverse Mercator (BTM)  
 Units: Meters  
 Spheroid: Everest  
 Scale factor: 0.9996  
 Central meridian: 90° E  
 Latitude of origin: 0° (equator)  
 False easting: 500000  
 False northing: -2000000



- LEGEND**
- International Boundary
  - Study Area
  - Thana Boundary
  - RDA Boundary
  - Union Boundary
  - RCC Boundary
  - Road
  - Rail Line
  - Electric Line HKV
  - Flood flow zone
  - Sub flood flow zone
  - Water supply protection zone
  - Mixed use planned zone
  - Industrial Low hazard zone
  - Industrial moderate hazard zone
  - Open Space
  - Airport Overlay Zone
  - RA-A Runway Area
  - RA-B Approach Area
  - RC-C Funnel Area
  - Restricted military (Public Safety)
  - Restricted flood protection reserves
  - Canal
  - Char
  - River



Prepared by RMDP/CIU, Rajshahi Metropolitan Development Planning Board, Rajshahi, on behalf of the Government of Bangladesh, July 2011

(e) All land areas outside of the above zoning categories, and for which none of the provisions of interpretation are specifically applicable, shall be interpreted in the context of the relevant policy(s) of the Structure Plan.

*Measurements:* The intent of these planning provisions is to adhere to the metric system of measurement wherever possible, but for reference, measurements are stated in both metric and imperial units. Where specific measurements are stated, the first stated unit of measurement is the requirement and its approximate conversion, shown in parenthesis, is for reference.

**Table 1.** Summary of the Permitted and Conditional Uses.

SUMMARY OF PERMITTED & CONDITIONAL USES												
<div style="border: 1px solid black; padding: 5px; width: fit-content;"> <p><b>LEGEND</b></p> <p>PERMITTED USE... P</p> <p>CONDITIONAL... C</p> <p>REVIEW REQUIRED R</p> <p>NOT PERMITTED... N</p> </div>	PLANNING ZONES											
	M A I N F L O O D F L O W	S U B F L O O D F L O W	W A T E R S U P P L Y	M I X E D U S E P L A N	M I X E D U S E S P O N	I N D U S T R I A L	I N D U S T R I A L	O P E N S P A C E	RESTRICTED OVERLAYS			
									A I R P O R T	F L O O D P R O N	M I L I T A R Y P U B	R O A D / U T I L
<b>LAND OCCUPANCY</b>												
Agriculture, Forestry & GRAZING	P	P	P	N	N	N	N	P				
Agriculture & Fisheries	P	P	P	N	N	N	N	P				
Brick fields	P	P	P	N	N	N	N	N				
Cause ways: Road, Rail	C	P	P	P	P	P	P	C				
Cemeteries/Graveyard	N	N	N	C	C	C	C	C				
Cinemas	N	N	N	C	C	N	N	N				
Clinics, Medical	N	N	N	P	P	P	C	N				
Clubs, Private	N	N	N	P	P	C	N	P				
College & University	N	N	N	R	R	N	N	N				
Dwellings, Farm	N	P	P	P	P	N	N	P				
Dwellings, Minimal Housing	N	C	N	P	P	C	N	N				
Dwellings, Single/ Multi Family	N	C	N	P	P	N	N	N				



**Occupancy Type and Use Classes**

Occupancy type and use classes (Table 2) permitted and conditional uses (Table 1) shall apply.

**Table 2.** Occupancy Type & Use Classes.

Occupancy Type		Code	Nature of Use or Occupancy	Occupancy Type		Code	Nature of Use Occupancy
A:	Residential	A1	Detached single family dwelling	F:	Business Mercantile	F1	Offices
		A2	Flats or apartments			F2	Small shops & markets
		A3	Mess, boarding house dorms, hostels			F3	Large shops & markets
		A4	Minimum standard housing			F4	Garages & petrol stations
		A5	Hotels & lodging hours			F5	Essential services
B:	Educational	B1	Educational facilities			G:	Industrial
		B2	Pre-school facilities	G1	Low hazard Industries		
C:	Institutional	C1	Child care institutions	H:	Storage	G2	Moderate hazard industries
		C2	Custodial institutions for physically handicapped			H1	Less fire risk storage
		G3	Custodial institutions for physically capable	J:	Hazardous	H2	Moderate fire risk storage
		C4	Penal mental institutions			J1	Explosion hazard buildings
D:	Health care	D1	Normal medical facilities	K:	Misc.	J2	Chemical hazard buildings
		D2	Emergency medical facilities			K1	Private garages & special structures
E:	Assembly	E1	Large assembly with fixed seat	L:	Open Space	K2	Fences, tanks & towers
		E2	Small assembly with fixed seat			L1	Cropping including forestry
		E3	Large assembly without fixed seat			L2	Fishing
		E4	Small assembly without fixed seat			L3	Livestock
		E5	Sports facilities			L4	Recreational
				M:	Mixed use	M1	As applicable

## Permitted and Conditional Uses in Planning Zones

### *Main Flood Flow Zone (MFF)*

1) Relevant Structure Plan Policy:

Policy RS/3-Flood Flow Zones: Land development, within the designated flood flow plain areas of the RMDP Structure Plan will be controlled in order to avoid obstructions to flood flow. This might otherwise result in adverse hydraulic effects, such as the rise of flood water levels and changes in flow direction.

2) Purpose and Intent: The purpose of the main Flood Flow Zone is to generally define areas either permanently (rivers) or seasonally flooded (flood lands). This zone consists of the area of the main floodway as delineated on the RMDP Zoning Category Map. The intent is (i) to protect the safety, health and welfare of the general public; (ii) to reduce negative environmental impacts within waterways; and (iii) to protect and preserve natural drainage systems to ensure their continued and proper functioning.

3) Permitted and Conditional Uses: As shown in Table 1.

4) BNBC Occupancy Type: K2: fence, tanks & towers; L1: cropping including forestry; L2: fishing; L3: livestock; L4: recreational; L5: reserved (As shown in Table 2).

### *Sub Flood Flow Zone (SFF)*

1) Relevant Structure Plan Policy:

Policy RS/3-Flood-Flow Zones: Refer to Policy RS/3 preceding.

2) Purpose and Intent: The purpose of the Sub-Flood Flow Zone is to generally define areas either temporarily or seasonally flooded (flood lands). The intent is to protect the health, safety and welfare of the general public; to reduce negative environmental impacts within natural waterways; and to protect and preserve natural drainage systems to ensure their proper and continued functioning. Areas designated on the RMDP Zoning Map as Sub-Flood Flow Zone (SFF) are also designated as Flood Prone Areas (FPA) for purposes of Part 3, Section 1.24(a) of the BNBC.

3) Permitted and Conditional Uses: As shown in Table 1.

4) Part 3, Chapter 1 Section 1.24(a) of the BNBC. "The planning and development control authority of the city, township, municipality or region where this code is intended to be applied shall delineate any area having a potential for being flooded under at least 1 meter deep water due to flooding as Flood Prone Area (FPA). The provisions of Sec 1.24.1 shall be applicable to areas designated as FPA. There shall be a design flood level in the FPA's which shall be recommended by the Authority to be used in interpreting the provisions of this section."

5) BNBC Occupancy Type : L1: cropping including forestry; L2: fishing; L3: livestock; L4: recreational; L5: reserved; E4: small assembly without fixed seats; A1: detached single-family dwellings (farm dwellings) as shown in Table 2.

6) Disclaimer of Liability: The degree of flood protection required by the Main Flood Flow Zone and the Sub-Flood Flow Zone is considered reasonable for regulatory purposes and is based on standard engineering methods of study. Larger floods that

inundate areas not designated on the RMDP Zoning Map as being in the MFF or SFF zones may occur on occasions or flood elevations may be increased by man made or natural causes. This section does not imply that areas outside the MFF and SFF designated areas will be free from flooding or damage. This section shall not create liability on the part of the Authority or any officer, official or employee for any flood damages that result from reliance on this part or any administrative decision lawfully made thereunder.

#### *Water Supply Protection Zone (WSP)*

##### 1) Relevant Structure Plan Policy:

Policy RS/4-River Pollution Control: Environmental protection measures will be taken to prevent pollution of the Padma river in order to ensure that it remains a viable, long-term source of potable water for Metro Rajshahi.

- 2) Purpose and Intent: The purpose of the Water Supply Protection Zone is to generally define the area lying to the west of Rajshahi City Corporation (RCC) area where development restrictions and environmental controls are necessary. The intent of this zone is to minimize potentially negative environmental impacts, which could damage or compromise the quality and viability of Rajshahi's long-term surface water supply source within the special designated zones proposed in the RMDP Zoning Category Map. This is in order (i) to protect the safety, health and welfare of the general public; (ii) to reduce negative environmental impacts within waterways; and (iii) to protect and preserve natural drainage systems to ensure their continued and proper functioning.
- 3) Permitted and Conditional Uses: As shown in Table 1.
- 4) Occupancy Type: L1: cropping including forestry; L2: fishing; L3: livestock; L4: recreational; L5: reserved; A1 (farm dwellings); A1: detached single-family dwellings (farm dwellings) as shown in Table 2.

#### *Mixed Use Planned Zone (MXP)*

##### 1) Relevant Structure Plan Policies:

- a) Policy UA/1-Land Resource Optimization: RMDP will seek to optimize land resources within the defined established urban area to mitigate the impact of the densification (RDA, 2003). This will be done by encouraging the in filling of vacant, under utilized land by allowing vertical development or re-subdivision of land within lower density communities. The optimization needs support with a strong effort to rehabilitate and upgrade the infrastructure facilities and services. Such efforts also include predominantly motorized and/or non-motorized roads to appropriate and affordable levels and to consolidate these levels in accordance with the density levels that may be expected in the coming years.
- b) Policy UA/2-Infrastructure Consolidation: RMDP will ensure that densification targets at the community level accompanied by infrastructure consolidation programmes are both feasible, affordable and adhere to acceptable minimum



standards of provision. This is required at the level of the RMDP Urban Area Plan, and particularly in the course of RMDP Detailed Area Plan (DAP) preparation. The community, through their active participation in the decision making process, community based organizations (CBOs) and NGOs, will all be consulted to determine priorities, standards and what role they might play in the implementation of these programmes.

- c) Policy UA/5-Urban Fringe Development Acceleration: The RMDP will initiate and coordinate a range of measures aimed at stimulating reorganization and re-subdivision of the urban fringe area.
  - d) Policy SE/6-Institutions and Public Administrative: The RMDP will support and actively encourage the dispersal of development administration and Government institutions to the growth areas proposed in the RMDP Structure Plan.
  - e) Policy SE/8-Improved Access to and Within The CBD: In the Central Business District, including Old Rajshahi, the RMDP will seek to improve overall accessibility via the promotion of those measures deemed necessary to upgrade transport services to and within the area as a whole.  
Further, the RMDP will not, at least in the short-term period of the RMDP Structure Plan to 2010, impose constraints on the private commercial sector operations in excess of those already in force.
- 2) Purpose and Intent: The purpose and intent of the Mixed Use Planned Zone is to allow a variety of residential densities and some commercial uses including pedestrian motorized and/or non-motorized road facilities in residential neighbourhoods. The allowed commercial uses are intended to support the daily and weekly commercial service needs of the neighborhood, conserve energy by lessening automobile dependency, and enable more diverse neighborhoods that optimize the use of both land and available urban services and facilities. Mixed uses may occur both horizontally and vertically, but controls are established to maintain the character of these neighbourhoods primarily as residential areas.
  - 3) Permitted and Conditional Uses: As shown in Table 1.
  - 4) RMDP refers to a metropolitan Planning Authority which the Rajshahi Structure Plan has proposed as the overall umbrella planning agency responsible for monitoring and coordinating the planning and development activities of all infrastructure agencies acting within the Rajshahi metropolitan area (currently the 177 square kilometer RDA control area)
  - 5) BNBC Occupancy Type : All class A, B, C, D, E, F, H, K and L2: fishing; L4: recreational; L5: reserved; and M1: mixed use as applicable (As shown in Table 2).

#### *Mixed Use Spontaneous Zone (MXS)*

- 1) Relevant Structure Plan Policies:
  - a) Policy UA/1-Land Resource Optimization: Refer to policy UA/1 (preceding).
  - b) Policy UA/3-Community-Based Development Initiatives: RMDP recognizes the increasing importance of community-led initiatives and participation in the land development process. It commits itself to the application of community-based

- land delivery mechanisms, which give priority to meeting the basic needs of the poor urban, and in mobilizing the efforts and resources of the informal private sector.
- c) Policy UA/4-Urban Neighbourhood Action Programmes: RMDP also recognizes the increasing importance of community-led initiatives and participation in the rehabilitation and upgrading of infrastructure services provision in existing informal and unplanned areas including densely populated inner urban areas. This will facilitate and support indigenous processes and actions in the rehabilitation of these areas.
  - d) Policy UA/5-Urban Fringe Development Acceleration: Refer to policy UA/5 (preceding).
  - e) Policy UA/6-New Urban Land Growth Acceleration: RMDP will initiate and coordinate a range of measures aimed at stimulating and accelerating areas of the urban fringe.
  - f) Policy SE/5-Informal Sector Activities: RMDP will actively seek to encourage informal private sector economic activities by means of relaxing those regulations which tend to stifle these initiatives, and providing opportunities to enhance conditions and productivity.
  - g) Policy SE/7-Dispersal of Commercial Activity: In recognition of the prevailing low mobility levels of the majority of Rajshahi's workforce the RMDP will seek to promote the gradual dispersal of commercial activity to the existing suburbs and new growth areas proposed in the Structure Plan.
- 2) Purpose and Intent: The purpose of the Mixed Use Spontaneous Zone is to recognize that certain areas of Rajshahi have matured over time with a range of uses and densities. The intent is to delineate areas where such a development has resulted in a positive environment and to identify areas for community-based development where a similar positive development may take place and which will largely occur in response to physical features and existing parcel ownership patterns. The primary use shall be residential, but non-residential use which support and complement residential neighbourhood activities shall also be permitted.
  - 3) Permitted and Conditional Uses: As shown in Table 1.
  - 4) BNBC Occupancy Type: All class A and B occupancies; C1: childcare institutions; C2: custodial institutions for physically capable; C3: custodial institutions for physically incapable; all class D, E, F, H, and K uses; L2: fishing; L4: recreational; L5: reserved; and M1: mixed use as applicable (As shown in Table 2).

#### *Industrial Low Hazard Zone (I-1)*

- 1) Relevant Structure Plan Policies:
  - a) Policy SE/2-Sopura Industrial Estate, Katakhalī and Nauhata Paurashava area: RMDP has reviewed areas, in particular their management, with a view to improving their operational procedures and cost effectiveness. Further, the RMDP will not designate any new general industrial areas for development in the

RMDP Structure Plan period to 2020, or until the Sopura Industrial Estate and Katakali are operating at full and optimum capacity, whichever is the sooner. However, Katakali is the best location for a minimum of 30-megawatt power station and for gas supply station to cater to the immediate needs of the metro region. Naohata offers potential sites for agro based processing including cold storage and warehousing.

- b) Policy SE/3-Foot-Loose Industries: RMDP will encourage foot-loose industries and/or business to establish them in metropolitan Rajshahi within the special designated zones proposed in the structure plan.
  - c) Policy SE/5- Informal Sector Activities: Refer to policy SE/5 (preceding).
- 2) Purpose and Intent: The purpose of the Industrial Low Hazard Zone is to recognize the importance of industrial activities to the welfare of Rajshahi residents, and its risks, by providing areas for industrial uses without undue competition from other uses and ensuring compatibility with non-industrial areas. This zone also recognizes that existing planned industrial areas have a mixture of land uses which are predominantly light and medium industry, warehouse, garment factories, etc., and which also possibly contain some residential. The intent of the Industrial Low Hazard Zone is to provide areas for some of the industrial employment and service needs of rural and sub-urban communities, as well as for export oriented industries. It is intended to accommodate light and general manufacturing activities. Industrial activities in this zone are limited to those which have few or minimal environmental impacts or hazards and those which complement the development scale of the communities they would serve.
- 3) Permitted and Conditional Uses: As shown in Table 1.
- 4) BNBC Occupancy Type : A4: minimum standard housing; D2: emergency medical facilities; F1: offices; F2: small shops & markets; F4: garages & petrol stations; F5: essential services; G1: low hazard industries; all class Houses; L4: recreational; L5: reserved (As shown in Table 2).

#### *Industrial Moderate Hazard Zone (1-2)*

- 1) Relevant Structure Plan Policies:
  - a) Policy SE/2– Sopura Industrial Estate, Katakali and Naohata: Refer to Policy SE/2 (Preceding).
  - b) Policy SE/3–Foot-Loose Industries: Refer to Policy SE/3 (preceding).
  - c) Policy SE/5–Informal Sector Activities: Refer to Policy SE/5 (preceding).
- 2) Purpose and Intent: The purpose of the Industrial Moderate Hazard Zone (1-2) is to recognize the need to set aside areas for industries which are liable to cause environmental damage and/or are a risk to public health. This may also include industrial uses, which have particular infrastructure requirements. The intent of the Industrial Moderate Hazard Zone (1-2) is to set aside areas for the full range of industrial uses necessary to support the urban and national economy.
- 3) Permitted and Conditional Uses: As shown in Table 1.

- 4) BNBC Occupancy Type : F2: small shops & markets; F4: garages & petrol stations; F5: essential services; all class G, H, J and K uses as shown in Table 2.

*Open Space Zone (OS)*

1) Relevant Structure Plan Policies:

- a) Policy RS/6–Special Areas: RMDP Structure Plan will respect the integrity of the functions of the special area designations and maintain the land areas of their respective domain free from urban incursions.
- b) Policy SE/10–Augmenting City Open Space: RMDP will seek to augment the City's existing stock of major recreational facilities by means of exploiting the resource of vacant and/or under utilized Government land within the established urban area.
- c) Policy SE/11–Securing Future Open Space: It is the RMDP's intention to identify and secure sites for major recreational use in the RMDP Structure Plan's all priority new development areas, but especially the char land of other side of the river Padma.

- 2) Purpose and Intent: The purpose of the Open Space Zone is to recognize the need for major open spaces and outdoor recreation opportunities within the urban environment. The intent is to maintain, preserve and manage major open spaces and parks within the urban area, which have recognized uses for recreation, public gatherings, and similar outdoor activities, and identify new areas that would be developed into major open space/recreation areas for the expanding metropolitan area.

3) Permitted and Conditional Uses: As shown in Table 1.

- 4) BNBC Occupancy Type : L2: fishing; L3: livestock; L4: recreational; L5: reserved (as shown in Table 2).

*Airport Restriction Overlay Zone (RA)*

1) Relevant Structure Plan Policy:

Policy RS/6–Special Areas: RMDP Structure Plan will respect the integrity of the functions of the Special Area designations and maintain the land areas of their respective domain free from urban incursions.

- 2) Purpose and Intent: The purpose of the Airports Restriction Overlay Zone (Ref: RMDP Zoning Category Map: Airport Restricted Zones) is to define those areas in proximity to Rajshahi Domestic Airport where restrictions on building heights are required by the landing and take-off of aircraft. The intent is to protect the safety, efficiency and functionality of Rajshahi's aviation facility and the safety of persons and property in aircraft flight paths.

3) Permitted and Conditional Uses:

All uses are allowed as specified for the various zones in which they occur, providing that no structures exceed the height restrictions specified in subsection 9(4) below:

- 4) Height restrictions within the Airports Overlay Zone (Ref: RMDP-ZC Map):
  - a) RA-A-Runway Area: No Construction within 152 meters (500 feet) in any direction from the center of the runway.
  - b) RA-B-Approach Area: Between 152 meters (500 feet) and 3,960 meters (13,000 feet) from the end of the runway, structures are permitted in a height/distance ratio of 1:50 up to a maximum height of 55 meters (182 feet).
  - c) RA-C-Funnel Area : Between 3,960 meters (13,000 feet) and 15,240 meters (50,000 feet) from the end of the runway, structures are permitted rising in a height/distance ratio of 1:40 up to a height of 152 meters (500 feet).
  - d) RA-D/E-Transitional Surface and Inner Horizontal Surface: Between 152 meters (500 feet) and 3,962 meters (13,000 feet) from the centre of the runway, structures are permitted rising in a height/distance ratio of 1:7 up to a height of 46 meters (150 feet).
  - e) RA-F-Inner Conical Surface: Between 3,962 meters (13,000 feet) and 6,096 meters (20,000 feet) from the centre of the runway, structures are permitted rising in a height/distance ratio of 1:20 up to a height of 152 meters (500 feet).
  - f) RA-G-Outer Horizontal Surface: Between 6,096 meters (20,000 feet) and 15,240 meters (50,000 feet) from the centre of the runway, development up to 152 meters (500 feet) is permitted.
  - g) Special Conditions: Blinking red lights are required on all structures having a height of 46 meters (150 feet) within 3,960 meters (13,000 feet) of the runway. The Civil Aviation Authority must also approve applications for all structures of seven storeys or more that lie within any portion of the Airport Overlay Zone. Such lights will meet specifications of the CAA.
- 5) BNBC Occupancy Type: All types A, B, C, D, E, F, G, H, J, K and L; except that types E1, E3 or J1 structures are not allowed within the RA-B-Approach area (as defined in Table 1).

#### *Restricted Flood Protection Reserve (RZE)*

- 1) Relevant Structure Plan Policies:
  - a) Policy RS/5–Flood Retention Ponds: Control will be maintained over the areas designated in the RMDP Structure Plan for flood retention ponds in order to ensure that they remain capable of fulfilling their primary function of water storage at times of flooding.
  - b) Policy IN/5–Incremental Flood Protection: RMDP will seek to employ means of implementation of components of Drainage, which will spread costs over time and capture benefits for other development sectors.
- 2) Purpose and Intent: The purpose of the Flood Protection Reserves (Ref.: RMDP ZC Map) is to generally define those corridors, sites/areas/lots and/or plots of land that are required now and in the future, to be preserved against unwanted development encroachment by non-compatible land uses. The intention of these reserves is to ensure sufficient area (in the form of ponds and/or connected khals) is available to

meet requirements for storm water retention within embankments. These include areas designated or proposed for retention ponds, flood embankments and walls, flood proofing structures, and pump stations, sluice gates, and culverts.

- 3) Permitted and Conditional Uses: As shown in Table 1.
- 4) BNBC Occupancy Type: All class L uses as shown in Table 2.
- 5) Conditions: Raised development on posts is permitted provided that:
  - a) No landfilling takes place in any area designated as a retention pond area.
  - b) The posts do not obstruct the free flow of storm water to retention ponds or pumping stations.

#### *Restricted Military/Public Safety Zones (RZM)*

- 1) Relevant Structure Plan Policy:  
Policy RS/6-Special Areas—Refer to Policy RS/6 (preceding).
- 2) Purpose and Intent: The purpose of the Restricted Military/Public Safety Zones (Ref: RMDP ZC Map) is to recognize that certain areas of the city are used almost exclusively for military, security, public safety and related uses. These areas currently include: the Rajshahi Cantonment; Bangladesh Rifles at Naodapara; and the Police H.Q. at RCC area.
- 3) Permitted and Conditional Uses: Land use and development within the Cantonment, however, is regulated by the Cantonment Board.
- 4) BNBC Occupancy Type— All classes except class G (industrial) uses are allowed if approved by the Cantonment Board (as shown in Table 2).

#### *Restricted Amenity/Road/Utility Reserves (RZR)*

- 1) Relevant Structure Plan Policies:
  - a) Policy UA/2—Infrastructure Consolidation—Refer to Policy UA/2 (preceding).
  - b) Policy IN/1—Padma Embankment: RMDP will accord high priority to the improvement and maintenance of Padma Embankment and Groynes to become the city's principal recreation zone in addition to City protection scheme.
  - c) Policy IN/2: Incremental Network Development—In pursuance of the proposed long-term road transport network, the RMDP will seek to promote an incremental approach to its overall development, as a means of conserving resources and being responsive to proven demand for the service being offered.
- 2) Purpose and Intent: The purpose of the Restricted Amenity/Road/Utility Alignments is to generally define those corridors, which must be reserved and kept clear of development for the location of proposed roads, and primary utility/infrastructure networks amenities and/or relocation of affected persons as such. The intent of these reserves is to ensure adequate land areas are reserved so that an approach road hierarchy and utility network and/or amenity can be developed and maintained throughout the urban area. For these alignments, reservations will be inductively identified in the Urban Area Plan and specially identified in the respective Detailed Area Plans and/or development plans.

- 3) Permitted and Conditional Uses: As shown in Table 1.
- 4) BNBC Occupancy Type: All Class L uses are allowed within the Restricted Road and Utility reserves, but on a temporary basis only until such time as construction of a road, railway line or utility line commences as shown in Table 2.

*Restricted Special Areas (RZS)*

- 1) Relevant Structure Plan Policy and/or Policies:  
RS/6–Special Areas: RMDP Structure Plan will respect the integrity of the functions of the Special Area designations and maintain the land areas of their respective domain free from urban incursions.
- 2) Purpose and Intent: The purpose of the Restricted Special Areas Zone is to establish special zones which contain elements of the nation's and/or city's civic, aesthetic, cultural, historic, social, political and architectural heritage. The intent is to maintain, conserve and protect the integrity of these special areas and/or sites; and where they exist, to preserve and enhance their park-like settings.
- 3) Permitted and Conditional Uses: As shown in Table 1.
- 4) BNBC Occupancy Type–L4: recreational and L5: reserved.  
Mausoleum except those, which serve as an accessory use to the Mausoleum as shown in Table 2.

**References**

- DDC (2001), "Inception Report, Rajshahi Master Plan Project".
- DDC (2002), "WP-2: Working paper on Economy, Investment and Employment", Rajshahi Master Plan Project.
- DDC (2003), "Interim Report", Rajshahi Master Plan Project.