18.0 PLAN REVIEW AND MONITORING

Plan Monitoring is essential to evaluate the changes required to improve the quality of life in the city. Properly phased monitoring makes the plan responsive to the emerging socioeconomic forces. Implementation of the plan can be effective only when monitored and reviewed at appropriate periods.

No long-range plan can be implemented as it is. The process of implementation has to be divided into various time frames depending on the projects & schemes. To study the effect of implementation of these projects, monitoring is required from time to time for each of the various aspects of the master plan. A scientific monitoring framework is essential for:

- 1) Effective implementation of plan within the plan period, thereby achieving the intended targets.
- 2) Respond to the changing socioeconomic needs of the people of the city.
- 3) To check unintended growth within the city.
- 4) Time lags between various implementation schemes and emerging needs of the people.
- 5) Review the appropriateness of the plan policies.

Monitoring framework can be prepared for targets of various aspects in the master plan. This helps in judging the performance of various sector and sectors, which need priority. Critical aspects and their targets need shorter monitoring period so that they can be constantly reviewed from time to time.

MPD-2021 has projected population of 230 lakhs for the provisions of infrastructure facilities. To achieve and provide these facilities the entire plan period is proposed to

be developed in four phases taking 2001 as the base year. However the targets, which are not achieved within the defined period, shall be taken care in the next phase.

monitoring. This table is however, not a programme of development but it provides a scale to assess the achievements in different sectors for the city development

The following table lists the different sectors, their targets to be achieved and the period of

Table 18.1 Monitoring Framework for Development

COMPONENTS	Unit	Period of Monitoring	Phase I 2001-2006		Phase III 2011- 2016	Phase IV 2016- 2021	Target Upto 2021
POPULATION(For Infrastructure Provision)	Lakhs		150-176	176-198	198-216	216-230	230 Lakhs
I. SHELTER/ HOUSING*							
a. Housing for Urban poor through Slum & JJ approaches	No. in lakhs	2 years	18.4	15.5	13.2	10.4	57.5
b. Houses as Independent Plots & Redevelopment	No. in lakhs	2 years	5.9	5.0	4.2	3.3	18.4
c. Group Housing (35% of total DU's not to exceed 2 room sets)	No. in lakhs	2 years	30.9	26.1	22.2	17.4	96.6
d. Employer Housing	No. in lakhs	1 year	2.9	2.5	2.1	1.7	9.2
e. Unauthorised Regularised colonies	No. in lakhs	1 year	11.0	9.3	7.9	6.2	34.5
f. Other Housing areas Upgradation of Old areas Traditional / Villages * Includes backlog housing stock &	No. in lakhs	4 years	4.4	3.7	3.2	2.5	13.8
replacement II.PHYSICAL							
INFRASTRUCTURE							
a. Augmentation of water distribution	Mgd	5 years	381	321	274	214	1190
b.Construction of new treatment plants	Mgd	5 years	294	248	211	166	919
c. Augmentation of sewerage network	Mgd	15 years	307	259	221	173	960
d.Construction of new sewerage treatment plants	Mgd	5 years	258	217	185	145	805
e. Augmentation of power distribution system	MW	2 years	2063	1741	1483	1161	6448
f. Development of sanitary landfill sites	Ha	5 years	85	72	61	47	265
g. Construction/ development of compost/ incineration plants	На	5 years	6.2	5.2	4.4	3.5	19.3
h. Municipal Solid Waste	Tons	1 year	3266	2756	2348	1837	10207

COMPONENTS	Unit	Period of Monitoring		Phase II 2006-2011	Phase II 2011- 2016	I Phase I 2016- 2021	V Target Upto 2021
III. SOCIAL INFRASTRUCTURE							
a. Health							
i) Hospital A (501 beds & above)	No.	2 years	6	5	4	3	18
ii) Hospital B (201 beds to 500 beds)	No.	1 year	12	10	8	6	36
iii) Hospital C (101 beds to 200 beds)	No.	1 year	29	24	21	16	90
iv) Hospital D (Upto 100 beds)	No.	1 year	29	24	21	16	90
v) Maternity Home/Nursing Home/ Polyclinic/	No.	1 year	120	100	80	60	180
vi)Family Welfare Centre/ Pediatric Centre/ Geriatric Centre/ Diagnostic Centre.		1 year	120	100	80	60	180
vii) Veterinary hospitals	No.	1 year	6	5	4	3	18
viii) Dispensary for pet animals	No.	1 year	29	24	21	16	90
b. Education							
i) Primary School / Middle school	No.	2 years	576	486	414	324	1800
ii) Sr. secondary school	No.	1 year	288	243	207	162	900
iii) School for physically and mentally handicapped	No.	1 year	29	24	21	16	90
iv) Vocational Training Centre	No.	1 year	6	5	4	3	18
v) General college	No.	5 year	6	5	4	3	18
vi) Professional College	No.	10 years	6	5	4	3	18
vii) Medical college	No.	10 year	3	2	2	2	9
viii) University Campus Including International Education Centre (IEC) c. Communication	No.	10 years			4 sites in U	E	
i) Head post office-administrative office	No.	5 year	3	2	2	2	9
ii) Telephone Exchange	No.	5 year	3	2	2	2	9
d. Security- Police							
i) Police Post	No.	1 year	29	24	21	16	90
ii) Police station	No.	1 year	12	8	8	8	36
iii) District office and battalion	No.	1 year		1 for eac	h administr	rative zone	
, 	110.	- you		1 101 040	46		

COMPONENTS	Unit	Period of Monitoring	Phase I 2001-2000	Phase II 5 2006-2011	Phase III 2011- 2016	Phase IV 2016- 2021	Target Upto 2021
iv) Police line	No.	1 year		1 for each	n administra		
v) District jail	No.	5 years	1	1	1	1	4
vi) Police training institute/ college	City level	5 years	1	As per deman	nds from cor	ncerned Dep	ot.
vii) Police firing range	City level	5 years	I	As per deman	nds from con	ncerned Dep	ot.
viii) Traffic and police control room	City level	5 years	I	As per deman	nds from con	ncerned Dep	ot.
e. Safety- Fire							
) Fire station	No.	1 year	1	As per deman	nds from con	ncerned Dep	ot.
i) Disaster Management Centre	No.	1 year		1 in each	administrat	tive Zone	
ii) Fire Training Institute	No.	1 year		City lev	el (One site	in UE)	
f. Distributive facilities a) Milk booths / milk and fruit wegetable booth etc.	No.	1 year	600	500	400	300	1800
i) LPG godown including booking office	No.	2 years	86	73	62	49	270
g. Socio-cultural facilities							
) Multipurpose community hall	No.	5 years	290	240	210	160	900
i) Community Recreational Club	No.	5 years	29	24	21	16	90
ii) Recreational Club	No.	5 years	6	5	4	3	18
v) Socio Cultural Activities Centre	No.	5 years	29	24	21	16	90
V) Exhibition sites	No.	5 years		2	2 sites in UI	Ξ	
n. Other community facilities							
) Old Age Home	No.	5 years	6	5	4	3	18
i) Working women hostels	No.	5 years	6	5	4	3	18
ii) Night Shelters	No.	5 years	6	5	4	3	18
v) Care centre for mentally and physically challenged	No.	5 years	6	5	4	3	18
v) Adult Educational centres	No.	5 years	6	5	4	3	18
vi) Orphanage	No.	5 years	6	5	4	3	18
vii) Religious Premises							
At neighbourhood level	No.	1 year	600	500	400	300	1800

COMPONENTS	Unit	Period of Monitoring	Phase I 2001-2006		Phase III 2011- 2016	Phase IV 2016- 2021	Target Upto 2021
At sub city level in urban extension	No	10 years	1	1	1	1	4
i. Cremation grounds	No.	10 years	6	5	4	3	18
• Cemetery / burial grounds	No.	10 years	3	2	2	2	9
IV. TRANSPORT							
a. Fully/Partially segregated cycle tracks.	No.	1 year		As p	er requiren	nents	
b. MRTS	Length in Km	5 years	80	68	58	45	250
c. Construction of grade separators	No.	2 years	Since thes	e are long t	erm projec	ets	-
d. Development of urban relief roads	No.	2 years	phasing sh	ould be do	ne to coinc	ide with	11
e. Construction of interstate bus terminals	No.	1 year	5 year plan	n period an	d monitore	d on	4
f. Construction of Metropolitan Passenger Terminals	No.	5 years	regular ba	sis.			5
g. Integrated Freight Complexes	No.	1 year					5
h Petrol pumps & CNG stations	No.	1 year			As per nor	ms	
V. TRADE AND COMMERCE							
a. Metropolitan city Centre							
i) Preparation of integrated schemes & specific projectsb. District Centre/ Sub CBD	No.	5 years	1	-	-	1	2
i) Upgradation of existing areas	No.	5 years	3	3	2	2	10
ii) Under implementation	No.	5 years	7	2	2	2	13
iii) New locations in urban extension			To be locat	ed along ma	jor arterial	roads as pe	r norms
c. Community Centre							
i) Upgradation of existing areas	No.	5 years	10	10	10	10	40
ii)Under implementation in DUA-81	No.	5 years	11	11	10	10	42
iii) New locations in urban extension /Projects			To be loo	cated along	major arteri	al roads as	per norms
d. Local Shopping Centre	No.	1 year	A	As per reside	ential develo	opment pha	se
e. Convenience Shopping Centre	No.	1 year	A	As per reside	ential develo	opment pha	se

COMPONENTS	Unit	Period of Monitoring	Phase I 2001-2006		Phase III 2011- 2016	Phase IV 2016- 2021	Target Upto 2021		
f. Local level commercial (L.S.C. + C.S.C.) in Urban Extension		1 year	To be locat	ted along sub	o-arterial ro	ads as per n	orms		
g. Organized Informal Sector Places/service markets/Informal Bazar h. City level wholesale markets	No.	1 year	2	2	2	2	8		
i) Upgradation of existing areas	No.	5 years	1	-	-	-	1		
ii) Developed / Under implementation	No.	5 years	2	1	1	-	4		
ii) New locations in urban extension	No.	5 years	-	-	-	1	1		
i. Sub-city level markets									
i) Upgradation of existing areas	No.	1 year	2	2	2	1	7		
ii) Developed / Under implementation	No.	1 year	1	1	1	1	4		
iii) New locations in urban extension	No.	1 year	2	1	1	1	5		
VI. RESTRUCTURING ALONG MRTS NETWORK									
i) Upgradation of existing areas	No.	2 years	As per phasing of MRTS network						
ii) New locations in urban extension	No.	2 years	At planning stage						
VII. INDUSTRIES									
i) Redeveloped / Upgradation	No.	3 years	Areas loca	ted in MRTS	S influence	zone.			
ii) New locations in urban extension	No.	3 years							
VIII. GOVT. OFFICES DISTRICT COURT	/								
i) Redeveloped / Upgradation	No.	3 years	Areas loca	ted in MRTS	S influence	zone.			
ii) New locations in urban extension	No.	3 years					4		
IX. MIXED LAND USE									
a. Mixed Land use streets (MPD - 2001)	- No.	1 year	As Per Zonal Development Plans						
X. ENVIRONMENT									
New landscape/Recreational area.									
i) City park	No.	10 years	3	2	2	2	9		
ii) District Park	No.	5 years	3	2	2	2	18		
iii) Community Park	No.	1 year	29	24	21	16	90		

COMPONENTS	Unit	Period of Monitoring	Phase I 2001-2006	Phase II 2006-2011	Phase III 2011- 2016	Phase IV 2016- 2021	Target Upto 2021
iv) Neighborhood Park	No.	1 year	290	240	210	160	900
v) Housing Area Park	No.	1 year	576	486	414	324	1800
vi) City Multipurpose park	No.	10 years	3	2	2	2	9
vii) District Multipurpose park	No.	5 years	3	2	2	2	18
viii) Community Multipurpose Park	No.	1 year	29	24	21	16	90
ix) Covering of Drains	Cov	ering of drains	to be done	as per appro	wed Plans a	nd Norms.	
x) Divisional Sports Centres	No.	5 years	3	2	2	2	9
xi) District Sports Centres	No.	1 year	3	2	2	2	18
xii) Community Sports Centres	No.	5 years	29	24	21	16	90
xiii) Neighborhood Play Area	No.	1 year	192	162	132	108	900
xiv) Housing Area Play ground	No.	1 year	576	486	414	324	1800

18.2 MAJOR ISSUES

- 1. The Planning process needs reforms and innovations as follow up of the Master Plan had always been a slow starter and could not meet projected targets adequately such as preparation of Sub-Regional Plan, Zonal Plans etc.
- 2. Others aspects like Environmental concerns, Integrated public transport, Infrastructure services, enforcement and monitoring upto date maps and basic information have been other problems.
- 3. Local level participation in the planning process its transparency and coordination, building approvals, slum rehabilitation, social housing and legal reforms also requires attention for implementation of provisions addressed in the Master Plans.
- 4. Plan Monitoring & Review of Master Plan through indicators of physical and socio-economic changes.

Taking into account the above constraints it is proposed to formulate a separate monitoring unit and a team of action groups which will function within the specified prescribed norms and social indicators as detailed out in Para 18.4 within the over all framework of the Master Plan.

18.3 MONITORING UNIT

A dedicated monitoring unit with modern data processing facilities, should be set up which would be responsible for collection and analysis of primary and secondary data, analysis & bringing the important changes to the notice of the authority comprehensively. This cell should also be in-charge of overall monitoring of implementation of the approved development plans and layout plans.

A suitable mechanism by way of high-level committee is also proposed to be set up for periodic review and monitoring of the plan. To enable this, apart from targets arising from various infrastructure plans etc. other action points emerging from the proposals made in the plan for various sectors would also to be listed out, to enable monitoring of timely implementation/ or identifying the need for any changes/ corrections.

18.4 MANAGEMENT ACTION GROUPS

It is proposed that for participatory planning, the following management action groups and initiatives are taken for addressing the major issues. These management action groups would work on following Planning indicators.

18.4.1 PLANNING INDICATORS

The following would be the indicators of physical and socio-economic changes to be monitored periodically.

- 1) **Demographic:** Population size, Population distribution in relation to holding capacity, Age sex structure, Household size, Rate of migration, Causes of migration etc.
- 2) **Landuse:** Landuse pattern, Development / Layout plans etc.
- 3) **Housing:** Slum and squatter settlements, Household with essential services

- 4) Social Infrastructure: Mortality Rate and Infant Mortality Rate, Access of population to safe drinking water, Access to low cost sanitation, removal of solid waste per capita, Distribution of police and fire services, Requirement of old age homes, working women's hostels, adult education centres etc.
- 5) **Transport** Percentage trips by public transport (modal split), Cost of using and operating different modes, Passenger capacity and distance traveled by public transport per year in relation to population, Facilities provided on railways/ metro stations/ I.S.B.T, Requirement of petrol pumps & CNG stations
- 6) Economic Aspects: Distribution of households by income, Distribution of households by consumption expenditure, Employment, Participation rate, Employment in different sectors, Shifting/ Relocation of industries, Growth of informal sector, Shifting of government offices etc.
- Environment: Air pollution, Water pollution, Noise, Quality of water of River Yamuna, Ridge area conservation etc
- 8) **Natural Disasters:** Floods intensity areas & effected population, any other natural disasters etc.

It is proposed to organize the following groups for follow up planning and integrated implementation of the Plan:

18.4.2 DELHI SUB REGION PLANNING GROUP

As a follow up of Regional Plan-2021, under Section 17 of the NCRPB Act 1985, Delhi State Govt. is required to prepare a Sub-Regional Plan for Delhi. It is proposed that high powered a Delhi Sub-Regional Planning Group (DSPB) should be established to plan

and coordinate with the concerned states and agencies at the level of DMA.

18.4.3 ENVIRONMENT PLANNING AND COORDINATION GROUP

The Group will evolve strategies for sustainable development, with major issues as conservation of Yamuna River bed and flood plain (including defining the same), Ridge etc. It will evolve a mechanism to coordinate the interventions of the several organizations involved in this cross-cutting task.

18.4.4 DELHI UNIFIED METROPOLITAN TRANSPORT GROUP

This group shall be responsible to prepare an action programme to coordinate a sustainable and balanced public transport system and will prepare traffic management strategic action plans with emphasis on movement of people and goods. The group will also evolve a parking policy and identify a Parking Authority for Delhi.

18.4.5 INFRASTRUCTURE DEVELOPMENT GROUP

The Infrastructure Development Group (IDG) will comprise of experts and agencies namely the PWD, MCD, NDMC, NHAI, DMRC, I&F Deptt, DJB, Power Companies, DDA, etc. This group will streamline infrastructure planning strategies and practices and formulate projects with latest technological and management interventions.

18.4.6 ENFORCEMENT AND PLAN MONITORING GROUP

The Enforcement and Plan Monitoring Group (EG) may comprise of the professionals, concerned local bodies and residents and evolve strategic action plans to ensure enforcement of the Plan. It will work out the implementation strategy and Monitoring System to review the progress periodically.

18.4.7 SPATIAL DATA INFRASTRUCTURE (SDI) GROUP

The SDI Group will ensure that the documentation, information with respect to settlements, colonies, villages, buildings, utilities, transport network, land use etc. incorporating upto date Geographical Information System, land/ground surveys, layout plans and land use plans are systematically organized and disseminated. This will develop a common database and provide a platform for documentation, planning and timely implementation of the Plan.

18.4.8 LOCAL LEVEL PARTICIPATORY PLANNING GROUP

The Group will define local areas and work out systems and procedures so that the local governments could take up the preparation of local level plans by participatory process. The institutional capacity building for this purpose should be taken up as a priority.

18.4.9 COMMON PLATFORM FOR BUILDING APPROVALS

To streamline the process of building approvals and to bring together many agencies involved in planning permissions and approvals, the Group shall work out the establishment of a common platform. The aim will be to devolve the process of building approvals and to deregulate, wherever necessary, and to review the Building Bye-laws and procedures.

18.4.10 SLUM REHABILITATION AND SOCIAL HOUSING GROUP

The Group will work out policies, physical and financial strategies and organizational structure for slum & JJ rehabilitation with the objective to make Delhi Slum free within a time frame.

18.4.11 LEGAL FRAMEWORK REVIEW GROUP

It is time that the present legal framework is reviewed and the framing of the following Regulations are taken up:

- a) Land Assembly and Private Sector Participation in Housing and Land Development
- b) Regularisation & Up gradation of Unauthorised Colonies and areas of mixed land use.
- c) Local level Planning Regulations

18.5 REVIEW

Timely review of the plan with the help of above groups and monitoring unit shall mid-term ensure correction and modifications if needed in the Plan Policies as well as the implementation procedures, which will help to re-adjust the events in the plan that could not be foreseen or anticipated during the Plan Formulation. If the plan is timely monitored appropriately and reviewed, the policies can be moulded in the right direction according to the present needs of the people of the city.

The Draft Land Use Plan and Special Area Plan incorporating the proposed modifications will be available for inspection at the office of the Authority, Vikas Minar, Indraprastha Estate, New Delhi, on all working days except Saturdays within the period referred to above.

(F.20(4)2005-MP)

V.M. Bansal Pr.Commr.-cum-Secy. Delhi Development Authority