

# CITY DEVELOPMENT PLAN

Shamgarh, District Mandasaur

Madhya Pradesh

## City Development Plan

2013

Submitted To:



Urban Administration & Development Department  
Government of Madhya Pradesh

Project Coordination:



City Managers' Association Madhya Pradesh  
(CMAMP)

Submitted By:

Urban Management Centre (UMC)



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कार्यालय नगर परिषद शामगढ जिला मन्दसौर म0प्र0

क्रमांक 546/2013

दिनांक 2/2/13

प्रति,

आयुक्त महोदय,  
नगरीय प्रशासन एवं विकास विभाग  
म0प्र0 भोपाल

विषय :- आपके नगर के सिटी डेव्हलपमेंट प्लान (सीडीपी) के अंतिम अनुमोदन के संबंध में ।

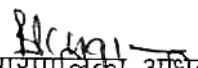
सन्दर्भ :- श्रीमान का पत्र क्र0 सीडीपी/यां.प्र./7/2013/6300 दिनांक 16.7.2013

—:—

महोदय,

उपरोक्त विषयान्तर्गत निवेदन है सन्दर्भित पत्र के पालन में निवेदन है कि नगर परिषद शामगढ की सिटी डेव्हलपमेंट प्लान (सीडीपी) अर्बन मेनेजमेंट सेन्टर अहमदाबाद द्वारा तैयार की गई है । उक्त योजना प्रेसीडेन्ट इन कौंसिल में अनुमोदन हेतु प्रस्तुत की गई थी । प्रेसीडेन्ट इन कौंसिल द्वारा प्रस्ताव क्र0 64 दिनांक 9.9.2013 से नगर की सिटी डेव्हलपमेंट प्लान (सीडीपी) योजना को अंगीकृत किया जाकर अनुमोदन किया गया है । प्रस्ताव की प्रति पत्र के संलग्न सादर प्रेषित है ।

संलग्न :- उपरोक्तानुसार

  
मुख्य नगरपालिका अधिकारी  
नगर परिषद शामगढ



## Shamgarh

Shamgarh is located on Delhi-Mumbai broad gauge railway line with connectivity of all but a couple of trains. The city houses a railway track sleeper factory. The city is looking



# City Profile

Company Name		Urban Management Centre		
ULB Name		Shamgarh Nagar Parishad		
Whether the Sectoral Analysis report is as per UADD requisites		Yes		
<b>Town Brief</b>	Geographical location (Town)	<b>Latitude</b>	24 <sup>0</sup> 11	
		<b>Longitude</b>	75 <sup>0</sup> 38	
	Average rainfall (annual)	<b>MM</b>	796	
	Height above mean sea level	<b>Mts</b>	459	
	Municipal area (1991)	<b>Sq kms</b>	3.02	
	Municipal area (2001)	<b>Sq kms</b>	3.02	
	Municipal area (2011)	<b>Sq kms</b>	3.02	
	Date of Constitution of ULB	<b>Date</b>		
Historic importance	<b>In one or two sentences</b>	Named after the famous king xyz of Bukara region. Got status of Nagar Parishad in the year 1965		
<b>Population</b>	Population Year 1981 (under Municipal boundary only)	<b>Town level</b>	14017	
	Population Year 1991 (under Municipal boundary only)		17556	
	Population Year 2001 (under Municipal boundary only)		21507	
	Population Year 2011 (under Municipal boundary only)		24632	
	Name of Population projection Method		Geometric Progression Method	
	Projected population adopted Year 2016		27533	
	Projected population adopted Year 2026		34399	
	Projected population adopted Year 2036		42978	
<b>Land Use</b>	<b>Land Use</b>	<b>% Standard (as per UDPFI)</b>	<b>Land use (Tentative in Sq kms )</b>	<b>Land use (Tentative in percentage)</b>
	<b>Residential</b>		1.08	35.79
	<b>Commercial</b>		0.07	2.35
	<b>Mixed Use</b>		0.02	0.57
	<b>Public - semi public</b>		0.15	4.98
	<b>Agriculture</b>		0.88	29.03
	<b>Industrial</b>		0.07	2.35
	<b>Roads</b>		0.33	10.77
	<b>Green area</b>		0.24	8.02
	<b>Vacant Land</b>		0.14	4.71
	<b>Water bodies</b>		0.04	1.43
	<b>Total</b>		3.02	100.00

## City Profile (Ward Wise)

Ward #	Ward 1	Ward 2	Ward 3	Ward 4	Ward 5	Ward 6	Ward 7	Ward 8	Ward 9	Ward 10	Ward 11	Ward 12	Ward 13	Ward 14	Ward 15	Total
Name of ward	Durga Mata Ward	Ambedkar Ward	Sardar Patel Ward	Dr. Rajendra Prasad Ward	Guru Nanak Ward	Indira Gandhi Ward	Mahatma Gandhi Ward	Lal Bahadur Shastri Ward	Subhash Ward	Jawaharlal Nehru Ward	Sardar Bhagat Singh Ward	Shitla Mata Ward	Rafi Ahmed Kidwai Ward	Shivaji Ward	Maulana Azad Ward	
<b>Ward Population (2011)</b>	2076	1409	1545	2774	1103	1244	1139	1926	1369	968	1249	1093	1520	2663	2553	24632
<b>Area (sq kms)</b>	0.26	0.04	0.08	0.19	0.06	0.06	0.56	0.33	0.07	0.02	0.10	0.08	0.41	0.36	0.24	2.86
<b>Density (PPSqkm)</b>	7,972	31,856	19,153	14,332	19,991	21,412	2,042	5,752	18,559	60,063	13,130	13,547	3,721	7,355	10,658	8,611
<b>Male</b>	Release of Census 2011 data awaited for ward wise information															12727
<b>Female</b>	Release of Census 2011 data awaited for ward wise information															11910
<b>SC</b>	Release of Census 2011 data awaited for ward wise information															3547
<b>ST</b>	Release of Census 2011 data awaited for ward wise information															330
<b>BPL</b>	Release of Census 2011 data awaited for ward wise information															DNA
<b>Sex ratio</b>	Release of Census 2011 data awaited for ward wise information															936
<b>Literacy rate (%)</b>	Release of Census 2011 data awaited for ward wise information															73%
<b>No. of Primary schools</b>	Release of Census 2011 data awaited for ward wise information															7
<b>No. of Primary Health Centre</b>	-	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1
<b>No. of Households</b>	414	281	308	553	220	248	227	384	273	193	249	218	303	531	509	4911
<b>Primary occupation (Majority)</b>	Agrarian	Agrarian	Agrarian	Services	Services	Services	Agrarian	Agrarian	Agrarian	Trade	Trade	Trade	Agrarian	Agrarian	Agrarian	Agrarian
<b>Secondary occupation</b>	Trade	Trade	Trade	Trade	Trade	Trade	Trade	Trade	Trade	Services	Services	Trade	Trade	Trade	Trade	Trade
<b>Tertiary occupation</b>	Services	Services	Services	Agrarian	Agrarian	Agrarian	Services	Services	Services	Agrarian	Agrarian	Agrarian	Services	Services	Services	Services
<b>No. of SS/LS industrial units</b>	Release of Census 2011 data awaited for ward wise information															0
<b>No. of Commercial establishments</b>	Release of Census 2011 data awaited for ward wise information															1430
<b>No. of Slum pockets</b>	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1
<b>Slum population</b>	0	0	0	0	0	0	0	0	0	0	0	0	0	0	120	120
<b>No. of Slum Households</b>	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1
<b>No. of Individual water connections in the ward</b>	228	121	199	446	128	124	136	252	125	132	105	107	87	55	160	2405
<b>No. of Community water connections</b>	Release of Census 2011 data awaited for ward wise information															167
<b>No. of Commercial water connections</b>	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
<b>No. of Tubewells</b>	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
<b>No. of Handpumps</b>	Release of Census 2011 data awaited for ward wise information															25
<b>No. of OHTs</b>	0	1	0	0	0	0	0	1	0	0	0	0	0	0	1	3
<b>% Coverage of piped water supply</b>	55.1%	43.1%	64.6%	80.7%	58.2%	50.0%	59.9%	65.6%	45.8%	68.4%	42.2%	49.1%	28.7%	10.4%	31.4%	49.0%
<b>No. of Individual Toilets</b>	Release of Census 2011 data awaited for ward wise information															2721
<b>No. of Individual Septic tanks</b>	Release of Census 2011 data awaited															-
<b>No. of Community Septic tanks</b>	Release of Census 2011 data awaited															0
<b>No. of Community toilets</b>	2	0	3	1	0	0	1	2	0	0	0	0	0	1	0	10
<b>% of population - Open defecation</b>	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	30%
<b>No. of Dust bins</b>	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	DNA	20
<b>Wardwise Waste generated (Kgs)</b>	467	317	348	624	248	280	256	433	308	218	281	246	342	599	574	5542.2
<b>Road sweeping (1 time or 2 times)</b>	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
<b>Total no. of sanitary workers in the ward</b>	Ward wise information is not available with the ULB															32



# Sectoral Analysis

		Existing Source					
		Source	Tubewell	Well	River/Lake		
Physical Infrastructure	Water Supply	<b>No. of Tubewell / River / Well</b>	0	3	0		
		<b>Water Supplied by Tubewell / River / Well in MLD</b>	0	1.207	0		
		<b>Total water supply in the town (MLD)</b>	1.207				
		<b>Existing Supply rate (LPCD) considering distribution losses</b>	49				
		<b>Water Charges per household per month (Rs.) Flat/Metered</b>	40 (Flat)				
		<b>% Coverage under paid water supply</b>	49%				
		<b>Whether any treatment plant exists (Y/N),If yes mention capacity (MLD)</b>	N				
		<b>Proposed source (Surface)</b>	Gandhi Sagar Dam (R. Chambal)				
		Sewerage	Sewerage	<b>Total sewage generation (MLD)</b>	0.9656		
				<b>Whether any treatment plant exists (Y/N),If yes mention capacity</b>	No		
<b>Total no. of individual septic tanks</b>	-						
<b>Total no. of community septic tanks</b>	0						
<b>Total no. of Sewage/Mud pumps available with the ULB</b>	DNA						
<b>Frequency of Cleaning Individual Septic tanks</b>	As required (Once in 3 years)						
Drainage	Drainage	<b>Frequency of Cleaning Community Septic tanks</b>	NA				
		<b>Name of natural nallah (Storm water drain)</b>	Khaal (Bada Nala)				
		<b>Length of natural nallah (Storm water drain) Kms</b>	5.5				
		<b>Ultimate disposal point of nallah</b>	Jambukuiya Khaal				
		<b>Length of road side drain (Kms)</b>	15				
		<b>Coverage of road side drainage w.r.t roads (%)</b>	58%				
		<b>Ultimate disposal point of Road side drains</b>	Khaal (Bada Nala)				
SWM	SWM	<b>Any treatment plant/procedure adopted</b>	No				
		<b>Per capita Solid waste generation (Considering Standards) (in gms)</b>	225				
		<b>Total SW generation (in Tons)</b>	5.54				
		<b>Frequency of SW collection by the ULB (1 time per day/2 times per day)</b>	1				
		<b>Collection efficiency of the ULB (%)</b>	65%				
		<b>Any initiative for DTDC (Yes /No)</b>	No				
		<b>Any initiative for scientific disposal of waste</b>	Site for Processing Plant available; boundary fencing complete, 1 platform of 20 feet by 10 feet construction on site				
		<b>Name of dumping/ landfill site</b>	Juna Pani Road Dumping Site				
		<b>Is the existing site Dumping site or allotted site for Scientific disposal</b>	Dumping Site				
		<b>Area of allotted landfill site for Scientific disposal</b>	5 hectares				
		<b>Distance of the Dumping site/landfill site from main settlement area (Kms)</b>	3				
		<b>No. of Tractor trolleys/vehicles available with the ULB for carrying Solid waste to the LF site</b>	2 Tractors + 2 Trolleys				
		<b>If site for Scientific disposal is not allotted then whether formally requested by the ULB</b>	-				



# Sectoral Analysis

Physical Infrastructure	Roads	Name of National Highway passing from or nearby from the town (NH-XYZ)		NH-79 (Nearest Point - Mandsaur)
		Distance of National Highway if nearby from the town (NH-XYZ) in Kms		75 Kms
		Name of State Highway passing from or nearby from the town (SH-XYZ)		SH-31A
		Distance of State Highway if nearby from the town (SH-XYZ) in Kms		0 Kms
		Total length of Pucca roads (Kms)	CC + Tar	23.5
			WBM	2.5
			Total (kms)	26
		Total length of Kuccha roads (kms)	(kms)	2
	Gap w.r.t Standards	(kms)	30	
	Traffic & transportation	Total no. of vehicles in the town		DNA
		Bus stand (yes/No)		No
		Any intracity mass transport mode (yes/no)	No	NA
		Name of locations facing major traffic issues	1	Mandir Chowk, Suwasra Road
			2	Station Road
		Name of the street beautified as per the instructions of UADD	Suwasra Road	1.5 Kms
	Street lighting	Total no. of street lights		732
		No. of Streetlights under working condition		732
		No. of Streetlights having Tubes		442
		No. of Streetlights having CFL		250
		No. of Streetlights having Incandescent bulbs		40
		No. of Streetlights having LED		0
		No. of Streetlights having LPS		0
	Power	Location of Substation <a href="http://www.mptransco.nic.in">http://www.mptransco.nic.in</a>	400 KV	-
			220KV	-
			132KV	-
		Total no. of residential connections		-
		Total no. of Commercial connections		-
		Any subsidy for BPL (Y/N)		-
	Duration of Electricity supply per day (in Hrs)		-	

# Sectoral Analysis

<b>Heritage &amp; tourism</b>	<b>Heritage &amp; tourism</b>	<b>Name of Heritage site/s</b>		Primary survey needs to be conducted
		<b>Ownership/agency</b>		
		<b>Prevailing Heritage Act/s</b>		AMASR Act, 2010
		<b>Name of Tourist site/s</b>		Primary survey needs to be conducted
		<b>Ownership/agency</b>		
	<b>Total no. of Pilgrims/ Tourists visiting town per day</b>		-	
	<b>Environment</b>	<b>Name of River/Lake/Forest range/Any specific species</b>		Lake - Krishna Talaiyya
<b>Prevailing Environmental Act/s</b>		Environment Protection Act, 1986		
<b>Areas facing threats</b>		None		
<b>Social Infrastructure</b>	<b>Health</b>	<b>No. of Primary Health centres/Dispensary</b>		0
		<b>No. of Hospitals</b>	Government	2
			Beds	45
			Private	1
			Beds	5
		<b>Multispeciality hospital if any (Y/N)</b>		No
	<b>Name of Nearby town referred for Treatment</b>	Name of town	Mandsaur/ Indore/ Kota	
		Distance (Kms)	75 Kms/ 210 Kms/ 150 Kms	
	<b>Education</b>	<b>No. of Primary schools</b>		7
		<b>No. of Secondary/High schools</b>		15
		<b>No. of Colleges</b>		2
		<b>No. of ITI</b>		1
	<b>Social security schemes</b>	<b>No. of Beneficiaries under SJSRY (Street Vendor)</b>		-
		<b>No. of Beneficiaries under Haath thela/Rickshaw chalak yojna</b>		-
<b>No. of Rain Basera/Night Shelter</b>		0		
<b>Ownership of Rain Basera (with ULB/Rental)</b>		-		
<b>No. of Beneficiaries under Gharelu Kamkaji Mahila Yojana</b>		-		
<b>Name of other Social security schemes</b>		Antyoday Anna Yojana Card (Wheat - INR 2/-)	287	

# Sectoral Analysis

## Slums & Urban Poor

Ward No	Name of Slum pocket/ reference name	Notified/ Un-notified	Ward population	Slum population	Individual water connections	No. of Community taps	No. of Handpumps	No. of Individual toilets	No. of Community toilets	No. of Pucca houses	No. of Semi pucca houses	No. of Kuccha houses	No. of Permanent pattas distributed	No. of Temporary pattas distributed	No. of Primary school in the slum pocket	No. of Primary Health centres in the slum pocket	Beneficiaries under social security schemes	Any interventions under IHSDP (Y/N)		
1	-	-	2076	0	0	Release of Census 2011 data awaited	Release of Census 2011 data awaited	Release of Census 2011 data awaited	Release of Census 2011 data awaited	Release of Census 2011 data awaited	Release of Census 2011 data awaited	Release of Census 2011 data awaited	Release of Census 2011 data awaited	Release of Census 2011 data awaited	Release of Census 2011 data awaited	Release of Census 2011 data awaited	Release of Census 2011 data awaited	Release of Census 2011 data awaited	0	-
2	-	-	1409	0	0														0	-
3	-	-	1545	0	0														0	-
4	-	-	2774	0	0														0	-
5	-	-	1103	0	0														0	-
6	-	-	1244	0	0														0	-
7	-	-	1139	0	0														0	-
8	-	-	1926	0	0														0	-
9	-	-	1369	0	0														0	-
10	-	-	968	0	0														0	-
11	-	-	1249	0	0														0	-
12	-	-	1093	0	0														0	-
13	-	-	1520	0	0														0	-
14	-	-	2663	0	0														0	-
15	Alamgarh Slum	Un-Notified	2553	120	160	1	N													
Total	0	0	24632	120	160	0	0	0	0	0	0	0	0	0	1	0	0			

# Municipal Finance (Should be filled carefully and it should be checked whether the capital income is factual or based on

Rs. In Lacs

Year		2006-07	2007-08	2008-09	2009-10	2010-11
<b>Revenue</b>	<b>Rates and Tax Revenue</b>	13.61	15.42	17.58	19.87	44.57
	<b>Assigned Revenues &amp; Compensation</b>	51.62	86.74	90.19	119.82	157.40
	<b>Rental Income from Municipal Properties</b>	1.93	2.06	2.36	2.89	3.72
	<b>Fees &amp; User Charges</b>	20.95	23.26	18.56	28.43	26.86
	<b>Sale &amp; Hire Charges</b>	0.25	0.76	20.93		
	<b>Revenue Grants, Contribution and Subsidies</b>	2.90	3.83	6.61	8.02	3.57
	<b>Income from Investments</b>					
	<b>Interest Earned</b>	0.83	1.61			1.14
	<b>Other Income</b>	85.12	135.83		25.68	
<b>Total - Revenue Income</b>		<b>177.20</b>	<b>269.51</b>	<b>156.24</b>	<b>204.71</b>	<b>237.25</b>
<b>Capital Receipts</b>	<b>Grants, Contribution for specific purposes</b>	13.45	52.22	128.49	127.38	193.89
	<b>Secured Loans</b>					
	<b>Unsecured Loans</b>					
	<b>Deposits</b>	16.73	6.65	8.80	8.58	46.11
	<b>Deposit works</b>					
<b>Total Capital Receipts</b>		<b>30.19</b>	<b>58.87</b>	<b>137.29</b>	<b>135.96</b>	<b>240.00</b>
<b>Revenue Expenditure</b>	<b>Establishment Expenses</b>	49.60	52.55	71.85	76.94	118.02
	<b>Administrative Expenses</b>					
	<b>Operations &amp; Maintenance</b>	142.43	214.10	166.44	195.40	114.00
	<b>Interest &amp; Finance Charges</b>					
	<b>Programme Expenses</b>					
	<b>Revenue Grants, Contribution and Subsidies</b>					
	<b>Miscellaneous Expenses</b>					
	<b>Transfer to Fund</b>					
<b>Total - Revenue Expenditure</b>		<b>192.03</b>	<b>266.65</b>	<b>238.29</b>	<b>272.33</b>	<b>232.02</b>
<b>Capital Expenditures</b>	<b>Fixed Assets</b>					
	<b>Capital Work-in-Progress</b>					
	<b>Investments -General Fund</b>					
	<b>Investments-Other Funds</b>					
	<b>Stocks/Inventory</b>					
	<b>Loans, Advances and Deposits</b>					
	<b>Other Assets</b>	26.44	55.93	50.92	62.40	242.33
	<b>Miscellaneous Expenditure</b>					
<b>Total Capital Expenditure</b>		<b>26.44</b>	<b>55.93</b>	<b>50.92</b>	<b>62.40</b>	<b>242.33</b>
<b>Total Income</b>		<b>207.39</b>	<b>328.38</b>	<b>293.53</b>	<b>340.68</b>	<b>477.25</b>
<b>Total Expenditure</b>		<b>218.47</b>	<b>322.58</b>	<b>289.20</b>	<b>334.73</b>	<b>474.34</b>

Note: Refer Madhya Pradesh Municipal Accounting Manual for further details. Can be downloaded from "Download" Section of [www.mpurban.gov.in](http://www.mpurban.gov.in).

- Note:**
- (The municipal finance data (Actual Income / Expenditure) has been taken from full year account, BUDGET document from 2006-07 to 2010-11.
  - Nagar Parishad has not migrated to accrual based double entry accounting system yet. Hence, the financial data is available in cash based accounting system.

## Reforms Action Plan

Reforms	Achieved (Y/N)	Timeline to achieve reforms till 2015				Any City specific Strategies adopted	Preliminary estimate (if any) for implementation	Implementing agency
		2012-13	2013-14	2014-15	2015-16			
Full migration of double accounting System	N	25%	50%	75%	100%	With rapid training and capacity building programmes throughout; taking assistance from Divisional Offices of UADD for improvements.	As per UADD's agenda for the same.	ULB
Property tax reforms, 85% coverage ratio and 90% collection ratio	N	75%	90%	100%	100%	Preparing data base for property tax collection on GIS; incentivising early payment of taxes; levying late fees; Setting up camps/ centres in various locations for tax collection	INR 5 lakhs	ULB
Levy of user charges : full recovery of O & M charges for sewerage, water supply and SWM	N	50%	60%	90%	100%	Water Supply - NRW/Water Audit study to help improve cost recovery; Sewerage - Minimal O&M expenditure for Decentralised Sewage Manangement, can be collected through decentralised system and integrated with single billing system with other ULB charges; SWM - same as sewerage.	Costs included in respective sectors.	ULB
Internal earmarking of basic services to urban poor	N	100%	100%	100%	100%	Immediate allocation of funds in annual budget for urban poor.	Nil	ULB
E-governance	N	25%	100%	100%	100%	Immediate setting up of helpline/ complaints phone number; Launching ULB's website enabling online payments for taxes and user charges; setting up civic centres in the city.		ULB
Provision of basic services to urban poor including security of tenure at affordable prices, improved housing, water supply, sanitation	N	100%	100%	100%	100%	Immediate provision of services to slum areas through in-situ upgradation.	Included in Urban Poor Sector	ULB

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## iv. List of Abbreviations

BPL	Below Poverty Line
CDP	City Development Plan
CFL	Compact Fluorescent Light
CIP	City Investment Plan
CIP	Capital Investment Plan
CMO	Chief Municipal Officer
CPHEEO	Central for Public Health, Engineering & Environment Organisation
DM&C	District Magistrate & Collector
DMP	Disaster Management Plan
DNA	Data not available
DPC	District Planning Committee
DPR	Detailed Project Report
DWMS	Decentralised Waste Water Management Service
ESR	Elevated Storage Reservoir
EWS	Economically Weaker Section
FOB	Foot Over-Bridge
FOP	Financial Operating Plan
GDP	Gross Domestic Product
GIS	Geographical Information System
GoMP	Government of Madhya Pradesh
GSR	Ground Level Service Reservoir
GUDC	Gujarat Urban Development Company
ha	Hectares
IEC	Information, Education & Communication
IMC	Indore Municipal Corporation
INR	Indian National Rupees
ITI	Industrial Training Institute
JnNURM	Jawaharlal Nehru National Urban Renewal Mission
kg	Kilogram
km	Kilometre
LIG	Low Income Group
lpcd	Litres per capita per day
m	metre
ML	Million Litres
MLD	Million Litres per Day
mm	Millimetres
MP	Madhya Pradesh
MPEB	Madhya Pradesh Electricity Board
MSW	Municipal Solid Waste
MT	Metric Tons
NA	Not application
ND	Not defined
NGO	Non Government Organisation
NH	National Highway
NRW	Non Revenue Water

NUHM	National Urban Health Mission
O&M	Operation & Maintenance
OD	Open Defecation
PA	Personal Assistant
PHED	Public Health & Engineering Department
PPP	Public Private Partnership
ROB	Road Over-Bridge
RTO	Regional Transport Office
SC	Scheduled Caste
ST	Scheduled Tribe
SH	State Highway
SLB	Service Level Benchmark
sqkm	Square Kilometre
sqm	Square Metre
STP	Sewage Treatment Plant
SWD	Storm Water Drains
SWM	Solid Waste Management
SWOT	Strength Weakness Opportunity Threat
TCB	Training & Capacity Building
TCPD	Town & Country Planning Department
ToR	Terms of Reference
TPD	Tons Per Day
UADD	Urban Administration & Development Department
UDPFI	Urban Development Plans Formulation & Implementation
UGD	Underground Drainage
UIDSSMT	Urban Infrastructure Development Scheme for Small & Medium Towns
ULB	Urban Local Body
UMC	Urban Management Centre
USD	United States Dollar
VMC	Vadodara Municipal Corporation
W	Watts
WTP	Water Treatment Plan

## v. Preamble

The Urban Administration and Development Department (UADD), Government of Madhya Pradesh (GoMP) invited tenders for the preparation of the City Development Plans of 253 Nagar Parishads and 6 Nagar Palikas in Madhya Pradesh in September, 2011. The proposal of Urban Management Centre (UMC) was accepted by UADD and was then principally selected for the preparation of the City Development Plans of Garoth, Malhargarh, Narayangarh, Bhanpura, Sitamau, Shamgarh and Nagri Cities in Mandsaur District.

Subsequently, UMC conducted numerous site visits, meetings and conference calls between November 2011 and July 2013 for the purposes of data collection, field visits, interaction with ULB officials, citizens, focussed groups and stakeholder workshops. In addition to data collection, detailed site visits were conducted at the following locations to assess the status of municipal services:

- Existing water supply source, pumping stations, water treatment plant(s), reservoirs, location of valves, households/ neighbourhoods where municipal water is supplied.
- Waste collection points in residential, commercial, special (including meat, vegetable markets & mandis) areas; formal and informal open dumping sites in and around the city, including water bodies
- Natural water bodies including nalas, river, lakes, ponds, etc. to assess the environmental degradation caused due to lack of municipal services in the city.
- Public toilets, urinals and open defecation (OD) sites
- Areas facing problems such as congestion, encroachments, etc.
- Areas providing formal and informal public transport services to the city
- Home/ cottage industries in the city
- Special areas such as railway station, railway colonies, etc.
- Outgrowths of the city

Other site visits included areas such as the slums, residential areas, water bodies, municipal civic centre/ camps, retail and wholesale markets, health and educational institutions, etc.

The purpose of these detailed field visits was to establish a qualitative relationship between the statistical details provided by the ULB with the actual ground realities, which in many cases, were found to be negating each other. Based on the verification of collected data, UMC conducted studies to summarise the findings and prepare proposals to fill any gaps in the municipal services. These proposals were presented to all stakeholders through the 2nd Stakeholder Workshop conducted in January 2012. Based on the citizen's feedback, their vision for development of their city over the next 25 years, and their priorities, the proposals were then refined and a broad sector wise investment was estimated for the next 25 years.

This was followed by a Report on City Profile, Sector Analysis, City Vision and Priority Projects which presented

- a) Sector wise assessment of municipal services
- b) Stakeholder's vision for development of their cities over the next 25 years
- c) Stakeholder's priorities for development
- d) Proposals under this CDP for fulfilling the gaps in municipal services for the next 25 years
- e) A broad cost estimate for all the proposals

Post submission of the Stage 2 Report, State Level Meeting 01 was organised by UADD to review the progress of the CDPs. During the State Level Meeting, general as well as city specific comments were provided by UADD

UMC also conducted Stakeholder Workshop 03 at the city level during this stage presenting the proposed projects and investment requirements to the stakeholders present. Further suggestions received during the workshop have been incorporated in the CDP.

Simultaneous to the Stakeholder Workshop 03, 1st District Level Presentation was conducted with the District Collector and Magistrate of Mandsaur district on August 06, 2012 and feedback received during this presentation has been incorporated in the CDP.

To review the draft CDP State Level Meeting 02 was organised by UADD and the feedback was provided. Based on the suggestions received, UMC prepared the Final CDP. This CDP presents the entire scope of work including city profile, sector analysis, city vision, priority projects, capital investment plan, financial operating plan and implementation mechanism for the proposals made under this CDP.

vi. Disclaimer

The scope of this report is to present the results of our detailed analysis and understanding. Our conclusions are based upon information drawn from research of the relevant region, data collected from the Urban Local Body (ULB), discussions with the respective ULB and our sector knowledge. No representation or warranty, express or implied, is given by Urban Management Centre (UMC) or any of its respective partners, officers, employees, or agents as to the accuracy or completeness of the information, data or opinions provided to UMC by third parties.

In the course of our assignment, we were provided with both written and verbal information between November 2011 and July 2013. Nothing has come to our attention to cause us to believe that the facts and the data provided by the ULBs are not true or not correct. However, no responsibility is assumed for the authenticity of the information furnished by the ULB. It is believed to be reliable and has not been independently verified by UMC.

We have neither carried out an audit or due diligence of the city nor a viability assessment of the assets of the ULB. No investigation of the title of the tangible and intangible assets has been made and the ULB's claim to the assets has been assumed to be valid. No consideration has been given to liens or encumbrances, which exist against the assets. Therefore, matters of a legal nature relating to the title of the assets have not been considered.

In case this document is to be made available or disclosed to any third party, this disclaimer along with all the limiting factors must be issued to the concerned party. The fact that UMC assumes no liability whatsoever, if for the reason any party is led to any loss for acting upon this document, must also be brought to the notice of the concerned party.



## vii. Executive Summary

### 1. Background

In order to encourage systematic and planned development of small and medium cities and towns, Government of Madhya Pradesh (GoMP) has initiated the preparation of City Development Plan (CDP). The CDP presents both a vision of a desired future for the city and the urban local body's (ULB) organization, as well as mission statements on how the ULB, together with other stakeholders, intends to work towards achieving this long-term vision in the next five years. In the current scenario, CDP is not only a prerequisite for accessing Central and State funds, but also plays a key role in developing a strategic framework to translate vision into actions and actions into outcomes.

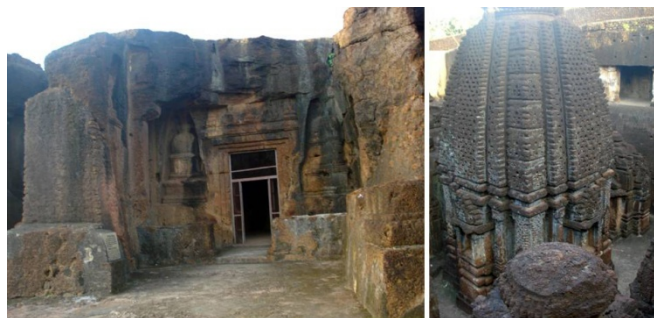
The Urban Administration and Development Department (UADD), Government of Madhya Pradesh (GoMP) invited tenders for the preparation of the City Development Plans of 253 Nagar Parishads and 6 Nagar Palikas in Madhya Pradesh in September, 2011. The proposal of Urban Management Centre (UMC) was accepted by UADD and was then principally selected for the preparation of the City Development Plans of Garoth, Malhargarh, Narayangarh, Bhanpura, Sitamau, Shamgarh and Nagri Cities in Mandsaur District.

The following sections illustrate the summary of CDP.

- Section 1 : illustrates the profile of Shamgarh city
- Section 2 : describes SWOT analysis and stakeholder vision for Shamgarh
- Section 3 : provides sector prioritisation
- Section 4 : gives an overview of infrastructure services
- Section 5 : identifies projects and investment needs along with phasing.

### 1. Shamgarh City Profile

Shamgarh is located in Mandsaur district of Madhya Pradesh state in Central India around 80 km from Mandsaur and 300 km from the state capital Bhopal. The city is surrounded by many places of archaeological interests including *Pola Dungar* with 32 caves and a Stupa. Another tourist attraction near the city is *Dharmrajeshwar*, which is located near Chandwasa village around 22 km from Shamgarh. The site is marked with 4<sup>th</sup> and 5<sup>th</sup> century rock cut Jain and Hindu temples and caves. Apart from *Pola Dungar* and *Dharmrajeshwar*, *Khejadiyabhoop* is situated around 32 km south east of Shamgarh in Suwasara Tehsil which houses 27 Buddhist caves built during 5<sup>th</sup> or 6<sup>th</sup> century A.D.



Shamgarh has a major railway station on the main broad gauge Delhi-Mumbai route. The nearest air connectivity is through Indore situated around 210 km from Shamgarh. The maps below show location and connectivity of Shamgarh city.



The city receives an annual rainfall of around 800 mm with average temperature ranging from 31.20 degree Celsius to 19.2 degree Celsius with maximum temperature reaching upto 45 degree Celsius. The city lies on the Malwa plateau at an average mean sea level of 459 metres receiving rainfall of about 796 mm annually.

As per the census of 2001, the city had a population of 21,507. As per the provisional figures for Census 2011, the city has a population of 24,632 (Census of India, 2011) where males constituted 52 percent while females constituted 48 percent with an overall literacy rate of 81 percent. The sex ratio in 2001 was 906.

The city’s economy is based on agriculture and agro related trade activities and houses a category ‘C’ mandi. A section of the population is also employed in administrative work as Shamgarh is a Tehsil. Apart from these, another section is involved in non agricultural retail and trade activities in the city.



Apart from agro trading, there is minimal small scale industries located in the city employing around 85 workers (Census of India, 2001). The city also houses a railway sleeper factory located in the northern end of the city.



Shamgarh Nagar Parishad jurisdiction has an area of 3.02 sqkm approximately. The ULB does not have a map of the city which identifies the exact boundary as per the Gazette Notification for delineating the municipal limits. Nearly 30 percent of the land use falls under agriculture, while the remaining is urbanised. Based on the urbanised area, the average density in Shamgarh is around 86 persons/ ha.

## 2. Stakeholder Vision and SWOT Analysis

In order to get a comprehensive overview of the existing situation and suggest well-rounded and pragmatic solutions it is important to avail participation from all the relevant stakeholders. The same was envisaged for the preparation of CDP and hence, consultations were made an important part of the methodology and planned at all the critical stages.

### Stakeholder Vision for Development of Shamgarh

*“To establish Shamgarh as an aesthetical pleasing regional hub for education, health and sports services which is very well connected with hinterland and where sanitation and transport activities are managed well with the help of a master plan.”*

*“Shamgarh should be become a city well managed with computerization (especially of property tax records) with good facilities for education, sanitation and public spaces.”*

*“Shamgarh should be developed as a green city with an aim to become a district itself with technically trained adequate staff and opportunities for industrial employment, especially for urban poor.”*

*“Shamgarh should aim to become a district soon where adequate housing for poor is available with ample industrial employment opportunities removing any unemployment.”*

*“House to house sanitised city with superior development in industrial and health sectors.”*

*“Shamgarh should become a well planned, beautiful city setting example in Madhya Pradesh, and set an example for other cities. Shamgarh should be developed to such levels that people from other cities come to see and learn from the city.”*

Based on the vision statements provided by stakeholders, the vision for the development of Shamgarh has been summarised as below:

**To establish Shamgarh as a model city in Madhya Pradesh with excellent governance, superior facilities in sanitation, education and sports, and a balanced eco-industrial centre in the region.**

### SWOT Analysis

Sectoral SWOT analysis was carried out for Shamgarh to better assess the position of the city with respect to future growth and development

#### Strength

Strong agricultural base with an active mandi emerged as the key economic strength for Shamgarh. Apart from this, presence of main Delhi-Mumbai broad gauge railway line provides excellent connectivity of Shamgarh to the rest of the country. Existing railway sleeper factory also provides industrial impetus to the city.

**Weakness**

The town is facing degradation due poor municipal services, especially in roads, water and sanitation sectors. Lack of any town planning/ development schemes has been a major cause of low economic development in the city.

**Opportunities**

There exists a good opportunity for development of agro-processing industries in the city and utilize the regional agricultural strength for development of formal trading infrastructure. The transport and logistics potential of the city can be explored for development of industries and trade.

**Threats**

Absence of a development plan poses a threat of haphazard development to the existing fabric of the town, besides lack of basic municipal services. Also, stiff competition is being faced by Shamgarh from neighbouring Garoth City for economic development and potentially attracting industrial development in the future.

**3. Sector Priority**

The sector priorities have been computed by weighing each sector based on the above listed parameters and sub parameters. Computation of the same has set the prioritisation of sectors for CDP in Shamgarh as follows:

<b>High Priority</b>	Solid Waste Management
	Sanitation
	Parks, Open Spaces & Water Bodies
	Water Supply
<b>Medium Priority</b>	Health
	Education
	Public Amenities
	Waste water
<b>Low Priority</b>	Street Lighting
	Slums & Urban Poor
	Storm Water Drainage
	Roads
	Transportation & Mobility
	Heritage & Tourism

**4. Status of Infrastructure Services**

**Water Supply**

The city sources water from various sources including Juna Pani Dam, Dhabla Deval Dam and a few wells in and around the city. The city supplies 1.21 MLD of water without treatment, partially through direct supply and partially through 3 ESRs located in various parts of the city. The city serves only 2,547 residential connections out of a total of 4,512 properties, through a 27 km long distribution network covering nearly 90 percent of the city area. Additionally, the city provides water to around 2300 properties (without individual connection) through 167 stand posts out of which only 25 public stand posts are functional.

Although, no study has been conducted, NRW has been estimated at 55 percent using thumb rule calculations based on pipe sizes and duration of water supply. While, due to poor accounting

practices, cost recovery in water supply is not known, the collection efficiency of water supply related charges has been measured to be 99.2 percent.

The city has a Water Augmentation Scheme under approval process to augment the supply by 2.06 MLD through an additional 0.49 MLD of storage capacity and 17.71 km of distribution network. Despite this scheme, additional infrastructure would be required to meet the service level benchmarks (SLB) and has been proposed under this CDP.

### **Waste Water Management**

Shamgarh does not have an underground sewer network for collection of waste water. The toilets in the city either dispose waste in open or closed storm water drains in the city. An estimated 50 percent of households have individual toilets in Shamgarh. The city generates around 0.97 MLD of waste water daily. There is no mechanized facility (municipal or private) available in the city to clean septic tanks or for fecal sludge management.

The main *nala* which collects the waste from the city runs through the western periphery of the town which results into potential health hazards. There is no facility to treat waste water in Shamgarh. Hence, all waste water collected through storm water drains and *nalas* is disposed-off untreated in natural drain flowing in the centre of the city. At present, there is no scheme to provide waste water collection and/or treatment facilities in the city.

Decentralised Waste Management System (DWMS) has been proposed in the city as an alternative technology for waste water management.

### **Sanitation**

The city has 9 blocks of public toilets with a total of 74 seats, 1 pay & use toilet block with 4 seats, 10 urinal seats for men and 1 urinal for women. The facilities are highly inadequate and do not cover all public places. Open defecation is observed in the town causing public health risks and environmental threats. The status of sanitation is further exacerbated due to no septic tanks or soaks pits for safe treatment and disposal from the public toilets. This CDP proposed to provide individual toilets to all households and augment public toilets, especially at public places.

### **Storm Water Drainage**

The city has 18.5 km of storm water drains against a road length of 30 km. At present, waste water is also being collected by this system hence polluting the environment. A natural *nala* flows through the city with 5.5 km passing through the city collecting both rain and waste water. Many areas of the city area unserved by storm water drains and water logging is reported at 2 locations in the city.

This CDP proposes to fulfil the gaps in storm water drains, desilting of natural drains and eliminating any spots prone to water-logging.

### **Solid Waste Management**

The city generates an estimated 5.54 MT of municipal solid waste. However, estimated 3.6 MT is collected daily from 20 secondary collection bins, unknown number of nuisance spots and through street sweeping done by 32 sweepers using 50 handcarts. The remaining waste finds its way to open

spaces, along roads and water bodies. No door to door collection is undertaken in the city. The waste is transported to open dump site through tractor-trolleys and is disposed untreated.

This CDP proposes to provide infrastructure and technical support for improvement of MSW services in the city including door to door collection, transportation, treatment and disposal as per the norms.

### **Roads and Transportation**

The city is very well connected with the road network of the district. Shamgarh has total road network of 30 km including both kuccha nad pukka roads. The road width of the roads in the core city area varies from 2 m to 5 m and that of main roads varies from 9 m to 12 m. SH 31A passes through the city and is the widest road with a divider in between. The city faces some congestion on SH 31A and near the Railway Station.. Also, local congestion can be observed in market area with retail markets functioning during the day and vehicles parked along the road in the absence of any designated parking in the city. The main Delhi-Mumbai broad gauge railway line divides the city into 2 parts and with heavy rail traffic, the at-grade crossings are closed frequently and often for long durations causing disruption of traffic.

Local jeeps/ taxis and regional buses serve the city as public transport. There is no formal bus stand forcing the regional buses to stop on main roads causing hindrance to traffic flow. There is no facility for trucks and tractors near the mandi causing congestion, especially during harvest times. There are no footpaths or other pedestrian facilities (like zebra crossings, foot over-bridge, etc.) in the city.

The city desperately needs grade separator crossing(s) over the railway line along with other public transport facilities like bus stand, parking, footpaths and additional roads on the periphery of the city. These improvements have been taken up under this CDP.

### **Streetlight**

There are around 732 street lights in the city out of which 60 percent are tube lights, around 5.5 percent are sodium vapour lamps and the remaining 34 percent are CFL lights. The street lights are switched on and switch off manually and no timer device has been installed for street light operation. Madhya Pradesh Electricity Board (MPEB) undertakes repairs and replacement as no technically qualified staff is available with the ULB.

The city needs additional street lights for additional roads alongwith energy saving initiatives like automatic timer devices and energy efficient lights like LED and Solar lamps. These improvements have been taken up under this CDP.

### **Public Amenities, Open Spaces and Water Bodies**

Shamgarh has around 5 percent of land under public amenities, 1.4 percent under water bodies and another 8 percent is under green areas summing upto a total of around 15 percent for public use. The city has 2 parks and 1 lake (with a park proposed around it) as the only public spaces. The city has 1 graveyard and 1 crematorium and 1 *Manglik Bhavan* (community hall) which is currently being used as a boys' hostel.

The city needs additional public amenities and public spaces such as library, night shelters, sports complex, parks, exhibition ground and appropriately developed water bodies. These improvements have been taken up under this CDP.

### **Health and Educational Facility**

The city houses 1 civil hospital and 1 railway hospital alongwith various private health facilities including clinics, pathology laboratories, X-Ray clinics, etc. Quantitatively, the facilities suffice the health infrastructure requirements of the city but the citizens have expressed qualitative inadequacy of these facilities.

Similarly, there are adequate education facilities based on the size of the city, the quality of these institutions has been reported poor by the citizens. The city has 25 *Aanganwadis*, 7 primary schools, 15 secondary/high schools 2 private colleges and 1 government Industrial Training Institute (ITI).

### **Services for Urban Poor**

Currently, the city does not have any data and information on the slum population in the city. The city does not report any area as slum. However, during site visits, slum-like settlements were identified as Bagrikheda, Alamgarh with around 20 households or around 120 people. Apart from this there are no slums or slum-like pockets within the municipal limits of Shamgarh Nagar Parishad. In-situ upgradation has been suggested for this settlement in this CDP.

### **Emergency Services**

Shamgarh Nagar Parishad owns 1 fire engine (heavy transport vehicle category) for emergency services with 1 driver deputed for the same. As streets of the older parts of the city are very narrow, nearly 50 percent of the city is inaccessible to this fire engine. The city does not have a fire station and there is absence of appropriate equipments, gear and trained staff to handle any emergency situations. Although a Disaster Management Plan (DMP) at district level is present, the city is not aware about it and the city does not have a DMP of its own. Improvements such as purchase of smaller fire engine, construction of a fully equipped fire station have been proposed under this CDP

### **Administrative and Other Projects**

The city also needs to initiate E-Governance and computerisation, database creation, asset management plan and training & capacity building of its administrative staff in order to provide efficient municipal services to the city. Such improvements have been taken up under this CDP.

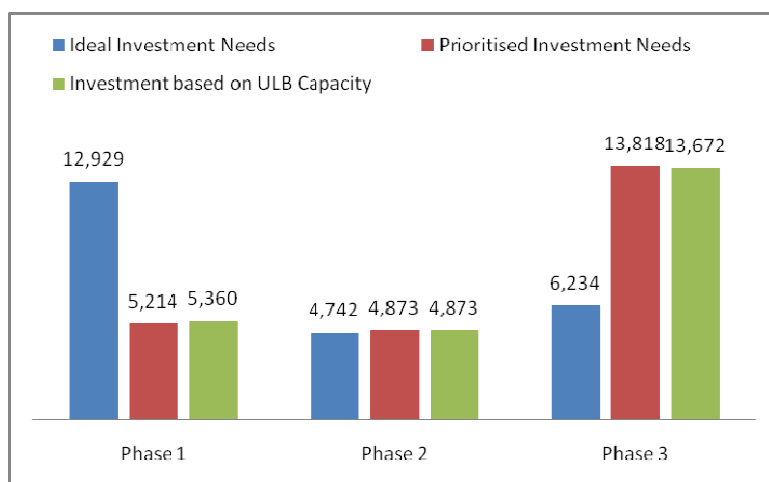
## **5. Proposed Projects and Investment Needs**

Investment needs of every sector are divided into two categories – infrastructure projects; and studies & programmes. While infrastructure projects include implementation costs of projects on ground, the studies & programmes include preparation of studies, reports, conducting IEC campaigns, training programmes, etc.

The total infrastructure investment anticipated for Shamgarh is INR 21,285 lakh while INR 2,620 is anticipated for studies and programs making the total investment need for the city to be INR 23,905. A sector wise breakup is provided below:

Sector	Infrastructure Projects	Studies & Programmes	Total
<b>Category A: Municipal Investments</b>			
Water Supply	1,647	330	<b>1,977</b>
Waste Water	2,268	280	<b>2,548</b>
Urban Roads, Traffic & Transportation	10,218	370	<b>10,588</b>
Storm Water Drains	2,114	280	<b>2,394</b>
Street Lighting	1,633	185	<b>1,818</b>
Solid Waste Management	403	280	<b>683</b>
Sanitation	649	280	<b>929</b>
Urban Poor & Slums' Improvement	-	80	<b>80</b>
Open Spaces & Water Bodies	1,055	125	<b>1,180</b>
Public Amenities & Other Projects	655	-	<b>655</b>
Administrative Studies (incl. Training & Capacity Building)	250	130	<b>380</b>
Emergency Services	58	155	<b>213</b>
<b>Total Requirement (A)</b>	<b>20,950</b>	<b>2,495</b>	<b>23,445</b>
	89.4%	10.6%	
<b>Category B: Non-municipal Investments</b>			
Heritage & Tourism	10	-	<b>10</b>
Education facilities	295	63	<b>358</b>
Health facilities	30	63	<b>93</b>
<b>Phase wise Total Requirement (B)</b>	<b>335</b>	<b>125</b>	<b>460</b>
<b>TOTAL INVESTMENT (A+B)</b>			
	<b>21,285</b>	<b>2,620</b>	<b>23,905</b>

The financial capacity of Shamgarh Nagar Parishad is limited and in order to undertake large investments (in this case up to INR 240 crore in the next 25 years), phasing of the above investments would have to be scheduled. A comparison between ideal investment requirements, investments needs based on citizen priorities and investment needs based on actual capacity of the ULB have been shown below:



Based on the financial capacity of the ULB, the final proposed phasing of investments has been done on the basis of following ratios:

Priority	Phase 1	Phase 2	Phase 3
Essential	100%	100%	100%
High Priority	100%	100%	100%
Medium Priority	50%	100% + 50% of Phase 1	100%
Low Priority	10%	50%	100% + 90% of Phase 1 + 50% of Phase 2



The resultant final proposed phasing is as follows:

Priority	Sector	Phase 1	Phase 2	Phase 3	Total
<b>Essential</b>	Emergency Services	113	50	50	<b>213</b>
	Administrative Projects, Training & Studies	280	50	50	<b>380</b>
<b>High Priority</b>	Solid Waste Management	318	160	205	<b>683</b>
	Sanitation	650	134	145	<b>929</b>
	Parks, Open Spaces & Water Bodies	420	380	380	<b>1,180</b>
	Water Supply	1,382	276	320	<b>1,977</b>
<b>Medium Priority</b>	Health	16	41	35	<b>93</b>
	Education	79	149	130	<b>358</b>
	Public Amenities	163	333	160	<b>655</b>
	Waste water	781	1,230	537	<b>2,548</b>
	Street Lighting	305	858	655	<b>1,818</b>
<b>Low Priority</b>	Slums & Urban Poor	2	15	63	<b>80</b>
	Storm Water Drainage	137	233	2,024	<b>2,394</b>
	Roads, Transportation & Mobility	568	965	9,056	<b>10,588</b>
	Heritage & Tourism	1	-	9	<b>10</b>
<b>TOTAL INVESTMENT (A+B)</b>		<b>5,214</b>	<b>4,873</b>	<b>13,818</b>	<b>23,905</b>

Under the ideal scenario, the investment requirements for Phase 1 considering sector prioritization are INR 12,929 lakh, which is beyond the capacity of the Nagar Parishad. According to the Financial Operating Plan, Shamgarh Nagar Parishad is capable operating and maintaining project worth INR 5,214 lakh.

The phasing of investment based on the above principles indicates that only 22% of the total investment can be undertaken in Phase 1, while the remaining 20% percent and 58% percent can be undertaken in Phase 2 and 3 respectively.

Based on the above investment, the financial operations of the ULB for Phase 1 have been shown below:

Revenue	CAGR	2011-12	2012-13	2013-14	2014-15	2015-16
Receipt	7.88%	305.69	329.78	355.77	383.80	414.05
Expenditure	3.86%	240.96	250.25	259.90	269.93	280.34
<b>Surplus/ Deficit</b>		<b>64.73</b>	<b>79.53</b>	<b>95.86</b>	<b>113.87</b>	<b>133.71</b>
Operating ratio		0.79	0.76	0.73	0.70	0.68
<b>Capital</b>						
Receipt	70.51%	330.60	563.70	961.16	1638.88	2794.45
Expenditure	55.75%	377.42	587.82	915.51	1425.89	2220.79
<b>Surplus/ Deficit</b>		<b>-46.82</b>	<b>-24.12</b>	<b>45.65</b>	<b>212.98</b>	<b>573.66</b>
Capital Utilisation ratio		1.14	1.04	0.95	0.87	0.79
Opening Balance		83.91	101.81	157.21	298.72	625.58
Total inflow		636.29	893.48	1316.93	2022.68	3208.49
Total Outflow		618.38	838.07	1175.42	1695.82	2501.12
<b>Net surplus / Deficit</b>		<b>101.81</b>	<b>157.21</b>	<b>298.72</b>	<b>625.58</b>	<b>1332.95</b>

The projects proposed under this CDP and the resultant investment needed are based on 2012 rates and shall be revised periodically as and when needed.