

Service Level Benchmarking

Service Level Benchmarking - Solid Waste Management for the year of 2015-16

Annexure - IV

S.No	Code	Input Nomenclature		Value	Logic/Remark
					65+22 input fields
	I	HOUSEHOLD LEVEL COVERAGE OF SOLID WASTE MANAGEMENT SERVICES		92.65	KE*100/(XE+XT)
		<i>Door to Door Collection - Number of HHs and establishments covered by Door to Door Collection</i>			
1	KA	Number of Households covered by Door to Door Collection	Number	29986	Input field
2	KB	Number of Hotels and Restaurants covered by Door to Door Collection	Number	29	Input field
3	KC	Number of Commercial Establishments (institutions, offices) covered by Door to Door Collection	Number	25	Input field
4	KD	Number of any other establishments (incl. markets) covered by Door to Door Collection	Number	3	Input field
5	KE	Total Number of Households and Establishments covered by Door to Door Collection	Number	30043	KA+KB+KC+KD
	II	EFFICIENCY OF COLLECTION OF MUNICIPAL SOLID WASTE		2,209.09	IF(KO=0,(LO*100/KL),(KO*100/KL))
		<i>Waste Generation</i>			
6	KF	Waste Generated by Households	MT/month	30	Input field
7	KG	Waste Generated by Street Sweeping	MT/month	10	Input field
8	KH	Waste Generated by Hotels and Restaurants	MT/month	5	Input field
9	KI	Waste Generated by Markets (Vegetable Markets, Mandis etc)	MT/month	5	Input field
10	KJ	Waste Generated by Commercial Establishments (eg. Institutions, etc)	MT/month	5	Input field
11	KK	Waste Generated by other sources (eg. debris, horticulture waste etc)	MT/month	0	Input field
12	KL	Total Waste Generated	MT/month	55	KF+KG+KH+KI+KJ+KK
		<i>Waste Collection and Transportation - Details of waste received at Processing/ Disposal Facilities</i>			
13	KM	Quantity of waste received at processing and recycling facilities	MT/month	0	Input field
14	KN	Quantity of waste received at disposal sites	MT/month	0	Input field
15	KO	Total waste received at processing/disposal facility and recycled	MT/month	0	KM+KN+LO-ME
		<i>Waste Collection and Transportation - Details of waste transported to Processing/ Disposal Facilities</i>			
16	KP	Number of lorries/trucks used for transportation of waste	Number	0	Input field
17	KQ	Capacity of each lorries/trucks	Metric Tons (MT)	0	Input field
18	KR	Total number of trips made by each lorries/trucks each day to the disposal site	Trips per day	0	Input field
19	KS	Total quantity of waste collected by lorries/trucks	MT/month	0	KP*KQ*KR*30
20	KT	Number of dumper placers used for transportation of waste	Number	0	Input field
21	KU	Capacity of each dumper placer	Metric Tons (MT)	2	Input field
22	KV	Total number of trips made by each dumper placers each day to the disposal site	Trips per day	5	Input field
23	KW	Total quantity of waste collected by dumper placers	MT/month	0	KT*KU*KV*30
24	KX	Number of mini lorries used for transportation of waste	Number	0	Input field
25	KY	Capacity of each mini lorry	Metric Tons (MT)	0	Input field
26	KZ	Total number of trips made by each mini lorries each day to the disposal site	Trips per day	0	Input field
27	LA	Total quantity of waste collected by mini lorries	MT/month	0	KX*KY*KZ*30
28	LB	Number of tractor trailers used for transportation of waste	Number	9	Input field
29	LC	Capacity of each tractor trailer	Metric Tons (MT)	1.5	Input field
30	LD	Total number of trips made by each tractor trailer each day to the disposal site	Trips per day	3	Input field
31	LE	Total quantity of waste collected by tractor trailer	MT/month	1215	LB*LC*LD*30
32	LF	Number of tipper trucks used for transportation of waste	Number	0	Input field
33	LG	Capacity of each tipper trucks	Metric Tons (MT)	0	Input field
34	LH	Total number of trips made by each tipper trucks each day to the disposal site	Trips per day	0	Input field
35	LI	Total quantity of waste collected by tipper trucks	MT/month	0	LF*LG*LH*30
36	LJ	Number of 3 wheeler auto tippers used for transportation of waste	Number	5	Input field
37	LK	Capacity of each 3 wheeler auto tipper	Metric Tons (MT)	0.4	Input field
38	LM	Total number of trips made by each 3 wheeler auto tippers each day to the disposal site	Trips per day	0	Input field
39	LN	Total quantity of waste collected by 3 wheeler auto tippers	MT/month	0	LJ*LK*LM*30
40	LO	Total quantity of waste collected and transported to disposal site	MT/month	1215	KS+KW+LA+LE+LI+LN
	III	EXTENT OF SEGREGATION OF MUNICIPAL SOLID WASTE		-	((LP+LQ)/IF(MH=0,LO,MH))*100
		<i>Segregation of Waste</i>			
41	LP	Quantity of waste arriving at Processing/ Disposal facility in segregated manner	MT/month	0	Input field
42	LQ	Quantity of waste taken away by recyclers from intermediate points	MT/month	0	Input field
	IV	EXTENT OF MUNICIPAL SOLID WASTE RECOVERED		0.16	(MF/IF(KO=0,LO,KO))*100
		<i>Quantity of Waste Processing</i>			
43	LR	Installed Capacity of Composting Plant	MT/month	3	Input field
44	LS	Waste Quantity Input at the Composting Plant	MT/month	2	Input field
45	LT	Installed Capacity of Vermi-composting Plant	MT/month	0	Input field
46	LU	Waste Quantity Input at the Vermi-composting Plant	MT/month	0	Input field
47	LV	Installed Capacity of Refuse Derived Fuel	MT/month	0	Input field
48	LW	Waste Quantity Input at the Refuse Derived Fuel	MT/month	0	Input field
49	LX	Installed Capacity of Bio Methanation/ Waste-to-Energy Plants	MT/month	0	Input field
50	LY	Waste Quantity Input at Bio methanation/ Waste-to-Energy plants	MT/month	0	Input field
51	LZ	Installed Capacity of any other processing facilities	MT/month	0	Input field
52	MA	Waste Quantity Input at other processing facilities	MT/month	0	Input field
53	MB	Total Installed Capacity of Processing facilities	MT/month	3	LR+LT+LV+LX+LZ
54	MC	Total Waste Quantity Input at all types of processing facilities	MT/month	2	LS+LU+LW+LY+MA
55	MD	Quantity of waste rejected by processing facilities at intake point	MT/month	0	Input field
56	ME	Quantity of post-processing rejects sent to dumpsite/ landfills	MT/month	0	Input field
57	MF	Total Waste Processed in the ULB	MT/month	2	IF(MC<MB,(MC+LO-MD),(MB+LO-MD))

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V		EXTENT OF SCIENTIFIC DISPOSAL OF MUNICIPAL SOLID WASTE		#DIV/0!	(MG*100/(MG+MH))
		<i>Quantity of Waste Disposal</i>			
58	MG	Quantity of waste disposed in compliant landfill sites	MT/month	0	Input field
59	MH	Quantity of waste disposed in open dump sites	MT/month	0	Input field
VI		EFFICIENCY IN REDRESSAL OF CUSTOMER COMPLAINTS		96.15	(MJ*100/MI)
		<i>Customer Service</i>			
60	MI	Complaints received during the year	Number	52	Input field
61	MJ	Complaints resolved within 24 hours during the year	Number	50	Input field
VII		EXTENT OF COST RECOVERY IN SWM SERVICES		-	(NA*100/MR)
		<i>Financial Information - Operational Expenditure on SWM during previous year</i>			
62	MK	Regular Staff & Administration	Rs. In Lakhs	144	Input field
63	ML	Outsourced/Contracted Staff Costs	Rs. In Lakhs	0	Input field
64	MM	Electricity Charges/Fuel Costs	Rs. In Lakhs	0	Input field
65	MN	Chemical Costs	Rs. In Lakhs	10	Input field
66	MO	Repair/Maintenance Costs	Rs. In Lakhs	0	Input field
67	MP	Contracted Services Cost	Rs. In Lakhs	6	Input field
68	MQ	Other Costs (Specify)	Rs. In Lakhs	0	Input field
69	MR	Total Operational Expenses	Rs. In Lakhs	160	MK+ML+MM+MN+MO+MP+MQ
		<i>Financial Information - Operational Revenues from SWM during previous year</i>			
70	MS	Arrears at the end of previous year	Rs. In Lakhs	0	Input field
71	MT	Tax / Cess - Solid Waste only	Rs. In Lakhs	0	Input field
72	MU	User Charges	Rs. In Lakhs	0	Input field
73	MV	Fixed Charges based on Property Tax/ State Taxes/Cess/Surcharges	Rs. In Lakhs	0	Input field
74	MW	Sale of Recyclables	Rs. In Lakhs	0	Input field
75	MX	Sale from processing - compost/energy	Rs. In Lakhs	0	Input field
76	MY	Royalty	Rs. In Lakhs	0	Input field
77	MZ	Others (Specify)	Rs. In Lakhs	0	Input field
78	NA	Total Revenue Demand Raised for the previous year	Rs. In Lakhs	0	MT+MU+MV+MW+MX+MY+MZ
VIII		EFFICIENCY IN COLLECTION OF SWM CHARGES		#DIV/0!	(NC*100/NA)
79	NA	Total Revenue Demand Raised for the previous year	Rs. In Lakhs	0	NA
80	NB	Collection against arrears	Rs. In Lakhs	0	Input field
81	NC	Collection against Current Demand	Rs. In Lakhs	0	Input field
		Additional Information (Optional)			
		Staff Information			
82	ND	Senior Management-Health Officer (Sanctioned)	Number	0	Input field
83	NE	Senior Management-Health Officer (Working)	Number	0	Input field
84	NF	Sanitary Inspector (Sanctioned)	Number	8	Input field
85	NG	Sanitary Inspector (Working)	Number	3	Input field
86	NH	Sanitary Supervisor (Sanctioned)	Number	0	Input field
87	NI	Sanitary Supervisor (Working)	Number	0	Input field
88	NJ	Maistries/Safai Karam chari (Sanctioned)	Number	13	Input field
89	NK	Maistries/Safai Karam chari (Working)	Number	8	Input field
90	NL	Cleaners/Drivers (Sanctioned)	Number	6	Input field
91	NM	Cleaners/Drivers (Working)	Number	4	Input field
92	NN	Labourers (Sanctioned)	Number	186	Input field
93	NO	Labourers (Working)	Number	120	Input field
94	NP	Others Specify	Number	0	Input field
95	NQ	Total (Sanctioned)	Number	213	ND+NF+NH+NJ+NL+NN
96	NR	Total (Working)	Number	135	NE+NG+NI+NK+NM+NO+NP
97	NS	Are daily records of waste received at compliant landfill maintained (MSW 2000)	Yes/No	No	Input field
98	NT	Is weighbridge available at landfill site?	Yes/No	No	Input field
99	NU	Are daily records of waste received at open dumpsites maintained?	Yes/No	No	Input field
100	NV	Is weighbridge available at dumpsite?	Yes/No	No	Input field
		User charges			
101	NW	Residential - General	Rs./ Month	0	Input field
102	NX	Residential - Urban Poor	Rs./ Month	0	Input field
103	NY	Commercial Establishment	Rs./ Month	0	Input field
104	NZ	Fixed charge through property tax	Rs./ Month	0	Input field
105	OA	Others	Rs./ Month	0	Input field
		SOLID WASTE MANAGEMENT INDICATORS			
		<i>Indicators</i>	<i>Unit</i>	<i>Result</i>	<i>Reliability</i>
1		Household level coverage of solid waste management services	%	92.6	95.00
2		Efficiency of collection of municipal solid waste	%	2209.1	95.00
3		Extent of segregation of municipal solid waste	%	0.0	15.00
4		Extent of municipal solid waste recovered	%	0.2	10.00
5		Extent of scientific disposal of municipal solid waste	%	#DIV/0!	0.00
6		Extent of cost recovery in solid waste management services	%	0.0	0.00
7		Efficiency in collection of solid waste management charges	%	#DIV/0!	10.00
8		Efficiency in redressal of customer complaints	%	96.2	10.00