

Regional Centre for Urban & Environmental Studies
All India Institute of Local Self-Government, Mumbai

Established in the year 1968, is fully supported by Ministry of Housing and Urban Affairs, Government of India

The Contents

Section 01 Regional Specialised Training Programme on Solid Waste Management with a focus on 100 % Segregation of Solid Waste, Chittorgarh, Rajasthan

Section 02 Regional Specialised Training Programme on Solid Waste Management with a focus on 100 % Segregation of Solid Waste, Vadodara, Gujarat

Section 03 Other than RCUES programmes

Section 04 Testimonials



Director General, AIILSG, & Editor in-Chief

Mr. Rajiv Agarwal, IAS (Retd.)

Director, RCUES, AIILSG, & Editor

Ms. Utkarsha Kayadi





Urban Environ Vision aims to take its readers through the journey of RCUES, Mumbai while providing encouragement and inspiration. It offers a platform to display the efforts undertaken by RCUES, Mumbai and showcase its achievements.

Regional Specialised Training Programme on Solid Waste Management with a focus on 100% Segregation of Solid Waste

28th & 29th July, 2017, Chittorgarh, Rajasthan

The key highlight of the programme was to familiarize participants with technologies of SWM and segregation towards zero garbage and explore best implementations & achievements of 100% segregation through ULBs presentation.



Mrs. Maleka Ansari, Research Officer, RCUES of AIILSG, Mumbai in introductory session.

Introduction

A Specialized Training Programme on 'Solid Waste Management with a 100% focus on Segregation of Solid Waste' was organized on 28th & 29th July, 2017 at Chittorgarh, Rajasthan. This programme was fully supported by Ministry of Housing and Urban Affairs, Government of India. The training programme started with the introduction given by Mrs. Maleka Ansari, Research Officer, RCUES of AIILSG, Mumbai. She welcomed the dignitaries and participants and

discussed them about the contents of the specialized training programme. She also briefed about the activities of the RCUES related to capacity building of ULBs through training, urban policy research and providing technical advisory services to ULB's.

Participation

Fifty one participants including municipal elected representatives and officials of concerned departments from the urban local bodies of Maharashtra and Rajasthan participated in the training programme.

Key Objective

The key objective of this training programme was to expedite the process of achieving goals of effective solid waste management with a focus on 100% segregation of waste at source, as mandated by the SWM Rules, 2016.

Inauguration



Mr. Sushil Sharma, Chairman, Chittorgarh Municipal Council, inaugurating SWM training programme by lighting the traditional lamp.

The Specialised Training Programme was inaugurated by Mr. Sushil Sharma, Chairman, Chittorgarh Municipal Council, in the presence of Mr. Bharat Gagetia, Deputy Chairperson, Chittorgarh, Mr. Pradeep Modi, Member, District Planning Committee, Mr. M. S. Gokhru, Elected Representative, Nimbahera & Mr. Vinod Paliwal, Regional Director, AIILSG, Jodhpur Centre, by lighting the traditional lamp of light.



Mr. Sushil Sharma, Chairperson, Chittorgarh Municipal Council, addressing the participants.

In his inaugural address, Mr. Sharma appreciated the efforts of the RCUES, Mumbai for organizing the SWM training programme in Chittorgarh and thanked the RCUES for the same. He stated that in Mewar region of Rajasthan State, very few cities have satisfactorily implemented the SWM Rules, 2016 and that door-to-door collection of solid waste in segregated form is lacking. He added that segregation was recently initiated in Chittorgarh, with the help of Srijan Seva Mandal, He expressed with confidence that the city would achieve 100% segregation of solid waste in the near future.



Mr. Bharat Gagetia, Dy. Chairperson, Chittorgarh Muncipal Council addressing the participants

Mr. Bharat Gagetia, emphasized on regular training and orientation for implementation of the SWM Rules, 2016 in all

the small and medium towns of the State. He stressed that every municipality of the state should take up a drive for segregation and collection of all the garbage generated by different sectors within the city. He also discussed about the achievements of Dungarpur city, which was declared as the first ODF & Clean City in the State. At the end of the inaugural session Mr. Paliwal, welcomed the participants and delivered a vote of thanks on behalf of AIILSG, Mumbai.



Mr. Vinod Paliwal, Regional Director, AIILSG, Jodhpur welcoming Mr. Pradeep Modi, Member, District Planning Committee, Chittorgarh.

Technical Sessions

Mrs. Maleka Ansari, Research Officer, RCUES of AIILSG, Mumbai, initiated the session with a discussion on 'Overview of Solid Waste Management & Swacch Bharat Mission'. She enumerated salient features of the Municipal Solid Waste (management & handling) Rules, 2000 and those of the Solid Waste Management Rules, 2016. She also highlighted the notable features in the present scenario of the implementation of SWM in cities of Gujarat and Maharashtra. Mr. Debartha Banerjee, Director, Sampurna Earth, Mumbai discussed on SWM Rules 2016 & Legal Framework for SWM with a focus on Segregation of Solid Waste & Segregation and



Mr. Debartha Banerjee, Director, Sampurna Earth, Mumbai delivering lecture on segregation and recycling technologies.

Recycling Technologies. He referred to the provisions of the SWM Rules, 2016 and said that the practice of segregation picks up slowly around the cities; new ways of using the separated waste are also emerging. Further, Mr. Banerjee stressed that efficient waste management is to ensure proper segregation of waste at source and to ensure that the waste goes through different streams of recycling and resource recovery. In his highly informative speech, he covered different technologies of segregation and recycling of solid waste including aerobic composting - turning spoil into soil, composting solutions at household level, community leveldrum based, community level-composting pits, mechanized composting, composting machine with curing systems, vermi-composting with earthworms- mulching and earth worm composting. Further, he discussed the Organic Recycling System (ORS) of Solapur pattern in which mixed waste is separated by using a combination of mechanised sorting and human efforts. The resulting organic waste, supposedly of high quality, runs a 4 MW plant and leaves 40 tonnes of compost a day.



Mr. Deepak Chabukswar, Dy. President, Janadhar, Latur presenting his theme through role play.

Mr. Deepak Chabukswar, Dy. President, Janadhar, Latur shared his experiences on the 'Role of waste pickers & their value addition in segregation process'. He said that the informal recycling industry plays a major role in waste management as it also ensures that less waste reaches at landfills. Their organization, Janadhar has made efforts to integrate people working in the informal sector, given them identity in society & upgrade their livelihood as well as their life.

Presentations by the representatives of ULBs

Mr. Sushil Sharma, Chairman, Chittorgarh Municipal Council made his presentation based on the theme of 'Community Participation in SWM – focus on segregation', covering in

detail the present scenario of SWM. According to him, municipal solid waste disposal methods followed in many parts of the region are unsystematic and involve dumping in low lying areas. He stated that most of the disposal sites are just uncontrolled dumps where a mixture of domestic, commercial, industrial and hospital wastes are thrown at the dumping sites. Apart from creating air pollution, ground water contamination and soil contamination, open dumping of wastes generally becomes breeding grounds of disease causing germs and vectors in the surrounding vicinity. He suggested the participants of Rajasthan State to shift to systematic implementation of SWM to avoid the unhealthy state of affairs. He further pointed that community participation is the most important factor for achievement of 100% segregation and further management of solid waste.



Mr. Rajubhai Gupta, Chief Engineer, SWM, Navsari Municipal Council presenting case study on SWM covering 100% segregation at HH level.

Mr. Rajubhai Gupta, Chief Engineer, SWM, Navsari Municipal Council made a presentation on Solid Waste Management covering 100% Segregation at HH level.

It was enlightening to listen to his speech when he informed the participants about the excellent SWM projects implemented by their council by focusing on 100% door-to-door collection of solid waste in segregated form and also running composting plants for wet waste disposal. Navsari has been awarded by the Government of Gujarat for the cleanliness and making city open defecation free.



Mr. Ashok Jain, Municipal Commissioner, Pratapgarh Municipal Council discussing on the SWM activities completed by their city.

The presentation of Mr. Ashok Jain, Municipal Commissioner, Pratapgarh Municipal Council was on Support Clean India Campaign. He informed the participants about the public awareness campaigns taken up by different modes of IEC and how the city achieved objective of solid waste management in accordance with the SWM Rules, 2016, with the help of Srijan Seva Mandal. Ms. Shweta Gupta, President, Srijan Seva Mandal also added about the activities conducted by their Mandal to elicit people's participation.



Ms. Shweta Gupta, President, Srijan Seva Mandal discussing on IEC components.

Field Visit

Field visit to Pratapgarh city was organized on 29th July, 2017. Pratapgarh Municipal Council has implemented Clean India projects with the help of Srijan Seva Mandal. According to the officials, they mainly focused on creating public awareness

about importance of solid waste management. For achieving public awareness & spreading message of cleanliness, they adopted IEC modes like newspapers, banners, posters, organizing meetings of housewives through *bachat gat*, *bhajani mandali*, and street play. Initially they faced many problems, but with the help of Srijan Seva Mandal the success achieved was highly satisfactory.

In the concluding session the participants shared their experiences through feedback about the training programme.

Dumping ground before SWM project implementation



Dumping ground after SWM project implementation



Glimpses of the programme









Regional Specialized Training Programme on Solid Waste Management with a focus on 100% Segregation of Solid Waste

27th to 28th September, 2017, Vadodara, Gujarat

The key highlight of the programme was to discuss initiatives taken by ULBs towards sustainable municipal solid waste management through ULBs presentations and techniques of waste minimisation at source through field visit.

Introduction



The Swachh Bharat Mission (SBM) emanated from the vision of the Government articulated in the address of the Hon'ble Prime Minister to the Joint Session of Parliament on 9th June 2014, when he inter alia, said "We must not tolerate the indignity of homes without toilets and public spaces littered with garbage. For ensuring hygiene, waste management and sanitation across the nation, a "Swachh Bharat Mission" will be launched. This will be our tribute to Mahatma Gandhi on

his 150th birth anniversary to be celebrated in the year 2019". With this background SBM was launched on 2nd October, 2014 and is being implemented by the Ministry of Urban Development in Urban areas.

Municipal Solid Waste Management (MSWM) is an important component of this mission and the most essential service for maintaining the quality of life of people in the urban areas for ensuring better standard of health, sanitation & environment. Solid wastes in the country pose a severe problem not only because of environmental and aesthetic concerns but also because of sheer quantities generated every day. According to Central Pollution Control Board, 144,165 TPD of MSW was generated in India during 2013-14. Of the total waste generated, approximately 115,742 TPD (80%) of MSW was collected & only 32,871 TPD (22.8%) was treated. SBM offers an opportunity to address the issues linked with this situation.

It is mandatory for all municipal bodies to follow and implement the Solid Waste Management Rules 2016 in order to effectively manage urban solid waste in the city. Similarly, it is mandatory for waste generators to store segregated waste at source so that it is collected by the municipal staff in a segregated manner directly from the households and transport it to designated places for appropriate treatment and processing. Major focus of SWM Rule 2016 is on segregation at source & zero garbage concepts.

The Rules make it essential for municipal bodies to adopt more systematic approach towards planning and management of solid waste and develop capacities of their staff / officials towards effective and efficient solid waste management system.

A Specialized Training Programme was organized on 'Solid Waste Management with a 100% focus on Segregation of

Solid Waste' on 27th & 28th September, 2017 at Vadodara, Gujarat. The programme started with the introduction given by Mrs. Maleka Ansari, Research Officer, RCUES of AIILSG, Mumbai. She welcomed the dignitaries and participants and briefed them about the contents of the specialized training programme. She also spoke about the RCUES activities of capacity building of ULBs through training & urban policy research.

Two days programme included presentations, experience sharing participatory activities and site visits. The participants were taken to the places where good practices developed under solid waste management focussing on 100% segregation are effectively implemented in three wards of the Vadodara Municipal Corporation.

Participation

Seventy participants comprising elected representatives and officials of the ULBs of Rajasthan and Gujarat attended the training programme.

Key Objective

The key objective of this training programme was to discuss regulatory framework of SWM rules 2016 and its effective implementation towards making cities zero garbage by adopting different techniques of segregation.

Inauguration

Dr. Jigisha Sheth, Chairperson, Vadodara Municipal Corporation inaugurated the training programme, in the presence of Dr. Jatin Modi, Emeritus President, AIILSG & Ms. Hansaben Patel, Senior Advisor, AIILSG, by lighting the traditional lamp.

In the inaugural address, Dr. Jigisha Sheth pointed that solid waste management was not only a technical challenge, it also included environmental impacts, financial and economic



Dr. Jigisha Sheth, Chairperson, Vadodara Municipal Corporation lighting the traditional lamp.

calculations social and cultural impacts, and the institutional, political and legal frameworks which are most crucial for planning and operation of a sustainable solid waste management scheme. She also shared her experiences from her visit to Sri Lanka where people were made aware of environmental problems, about how to manage the problems related to solid waste management and the preventive measures.

In his key-note address, Dr. Jatin Modi, Emeritus President, AIILSG, stated that segregation is the most important function in overall waste management process. It has been observed that waste segregation at source is the biggest obstacle for effective solid waste management due to lack of public awareness and advancements in source separation techniques. He suggested that at the local level, ULBs should encourage technology based entrepreneurship to achieve effective solid waste management. NGOs should be involved in various components of waste management including public awareness. He expressed best wishes for the success of the training programme.

Ms. Hansaben Patel, Senior Advisor, AIILSG welcomed all the dignitaries, faculties and participants on behalf of AIILSG, Vadodara centre. She also hoped that the two days training programme would be a grand success.

At the end of the inaugural session, Mr. Chandresh Shah, Executive Director, AILLSG, Vadodara expressed vote of thanks on behalf of AIILSG.

Technical Sessions



views on SWM and SBM.

Mr. Jatin Sheth, SWM Expert, Ahmedabad delivered a lecture on 'Overview of Solid Waste Management & Swachh Bharat Mission' and 'Role of waste pickers & their value addition in segregation process'.

He said that the primary goal of solid waste management is reducing and eliminating adverse impacts of waste materials on human health and environment, and to support sanitation and better quality of life. He cited an estimated figure of garbage collection according to which generation of solid waste would be 165 million tonnes per year by 2030, and by 2050 it would be 436 million tonnes. If cities continued to dump waste at present rate without treatment an additional 1240 hectares of land would be required per year, he said. This would necessitate land requirement of 66000 hectares with 10 meters height till 2031. He emphasized that in this situation new landfills were not a viable solution. Segregation of waste at source should be mandated with the aims of waste to wealth and recovery reuse and recycle. He stressed on the urgent need to change the perception of citizens and make them realize their civic duties through the national initiative of Swachh Bharat Abhiyan. The ULBs should impose fines for non-compliance of segregation process at household and society level, he remarked.

Concluding his highly informative speech, he advised the ULBs to take note of the important role played by the rag pickers in SWM process and to train them in protective methods for guarding against hazards of handling garbage. He said that NGOs should make initiatives for preparation of proposals for social security of these people working in unorganized sector.

Mr. F. T. Kanpurwala, Consultant, SWM delivered his lecture on 'SWM Rules 2016 & Legal Framework for SWM with a focus on Segregation of Solid Waste' and 'Segregation and Recycling Technologies'.

He pointed that solid waste management includes series of activities from its inception, i.e. generation of waste to final disposal. In the present scenario mixed waste poses a serious challenge to treat and dispose the waste in an environmentally acceptable manner. He emphasized that waste minimization or waste reduction at source was an important step in the process of SWM. If solid waste is segregated at source it would lead to minimize the expenses incurred on transportation and final disposal. On the other hand it would greatly enhance the standard of segregated waste for further process of recycling. "Many industrial firms are making special efforts to minimize generation of waste not only to reduce their waste treatment and disposal costs but also improve their resource efficiency," he said.



Mr. Rajubhai Gupta, Chief Engineer, Navsari Municipal Council discussing case study on Navsari SWM pattern.

Mr. Rajubhai Gupta, Chief Engineer, SWM, Navsari Municipal Council, Gujarat presented a case study on Solid Waste Management covering 100% Segregation at HH level. He discussed the implementation procedures needed before commencement of segregation of solid waste which included route mapping, household surveys, visits to home, shop, market place, industries and slaughter houses by ULB officers. They adopted IEC techniques to convince the people about sanitation though painting on wall, hoardings handbills, and cleanliness rallies.

A group work on preparation of plan on implementation of effective Solid Waste Management with a focus on 100% segregation of solid waste was the last event of the day. Three groups were formed from among the participants. It was observed that all the groups made enthusiastic attempts at conceptualizing and presenting good plans of action.

Field Visit

In the post-lunch session the participants were taken to the sites at New Sindhi Market, near Maheshwari Society, Iskcon Road and Laheripura, Near Nyay Mandir. Mr. Nayak, Addl. City Engineer, Vadodara showed them various processes of various SWM spots. He explained them the good practices of SWM adopted at those sites. The participants were impressed to observe the efficient system resulting into collection and transportation of 7,30,00 Metric ton per day out the generated quantity of 7,50,00 MTs. The participants were explained the detailed operational features of MSW, including the following:

Primary Collection & its Transportation

- · Sweeping during day and night time
- Container lifting
- Door to door garbage collection vehicles with GPS system.
- Night scraping and brushing activity

Secondary Transportation

The participants were explained the process of waste transportation which was done through the dumper trucks, container lifting vehicles, refuse compactors and transportation vehicles. The collected waste was transported from the storage receptacles to the landfill site in closed dumper trucks. A dumper truck was fully covered with plastic/tarpaulin sheets during transportation. It was mentioned to the participants that considering the city population, normally 650 containers would have been required for collecting total waste in the city. But as VMC has commenced door-to-door waste collection and the collected waste was directly transported to the compost/disposal sites the existing 261 containers were found to be sufficient for city waste storage.

Disposal of Municipal Solid Waste Management Vadodara Municipal Corporation had also developed its second processing plant adjoining to the landfill cell phase I site of 300 MT/day (expandable up to 700 TPD) capacity

based on Integrated Processing Technology with the

intention to minimize waste load on the landfill site and to increase the life span of the landfill site. The work was allotted to M/s. Hanjer Biotech Energies Pvt. Ltd. on PPP basis. The Integrated Processing facility consists of composting of biodegradable matter, pelletisation, recovery of recyclables such as metals, rubber, plastics, RDF and manufacturing of sand and eco bricks. Only 20% of the total incoming waste went for the land filling by this technology. The processing plant was in operation from February-2010. The tenure of the agreement was of 10 years which would be expiring in 2018. The capacity of plant is now expanded to 500 TPD. The participants also visited Bio gas plant at Vodagamadi, where wet waste and nirmalya (flowers and other materials from temples in the city were supplied by the Corporation for processing.

Closing session was presided over by Mr. Ranjit Chavan, President, AIILSG, Mumbai. In his address he appreciated the initiatives of Government and efficient processes of the Corporation leading to efficient solid waste management in the city.

He appealed to the participants for effective implementation of segregation of waste. He said that nature of the work is



Mr. Ranjit Chavan, President, AIILSG, Mumbai addressing the participants.

such that any delay or deficiency would complicate the situation. Mr. Ranjit Chavan also distributed certificates to the participants. Mrs. Maleka Ansari concluded the training programme and also gave a vote of thanks to guest of honours, resource persons and participants.

Other than RCUES Programmes

Building Capacities on Fecal Sludge and Septage Managment for ULBs in Rajasthan.

29th August, 2017, Jaipur, Rajasthan

The workshop disseminated of concept of fecal sludge and septage management in the cities of Rajasthan and focused on interaction with ULBs to understand on-ground challenges that cities face and provide solutions for the same.

Introduction



In recent months, Sanitation agenda has been at the forefront of development agenda in India. The Government of India has launched Swachh Bharat Mission and AMRUT where the emphasis is on eradicating open defecation. With the rapid rate of construction of individual toilets with increased use of onsite disposal system, the need to formalize and strategically implement the faecal sludge and septage management (FSSM) system has been established. Given this, Government of Rajasthan (GoR) aims at cities to become ODF+ and ODF++, by implementing septage management

and treatment of faecal matter. Capacity building programmes for ULBs are therefore essential and Government of Rajasthan is committed to encourage ULBs to implement FSSM plans. The training programme was integrated with the Capacity Building activities planned under SBM/AMRUT at the state level. This workshop was the first in a series of orientation workshops planned by NIUA for all ULBs in Rajasthan and are conducted under Sanitation Capacity Building Platform (SCBP) to support Government of Rajasthan.

The orientation program was to be conducted for all ULBs of Jaipur Division of Rajasthan to introduce the topic of FSSM and make them aware of various technologies and their benefits and will be conducted at the divisional headquarters of Rajasthan. The orientation introduced ways for implementation of the septage and liquid waste management plan. Experts from various organisations are invited to share their experiences and discuss viable options to implement FSSM in Rajasthan. The program was interactive, encouraging peer learning and knowledge sharing within the participants.

Inauguration

The programme was conducted by AIILSG Mumbai and presided over by Shri Mukesh Kumar Meena, Additional Director of Local Bodies, Department of Local Self Government, Government of Rajasthan, Shri Bhupendra Mathur, Chief Engineer, DLB, Rajasthan, Dr. Himani Tiwari, Director of City Manager's Association, Rajasthan. Officials of ULBs from 18 cities within Jaipur Division were also present. Following the lighting of the lamp by chief guest Shri Mukesh Kumar Meena, and felicitation ceremony, the program was initiated with an overview of the Jaipur orientation program by the Chief Engineer Shri Bhupendra

Mathur. This session included presentation on current condition of sanitation in the cities and towns of the state. This session helped to bring clarity to the participants about the responsibilities of the ULB officials and the necessity of such a capacity building program for the betterment of the state in the sanitation sector.

Technical Sessions



Ms. Utkarsha Kavadi, Director, RCUES, AIILSG, Mumbai addressing the participants

In the first technical session, Ms. Utkarsha Kavadi, Director, RCUES, AllLSG, Mumbai gave an overview of the status of the ODF cities in the state of Rajasthan and determining the onground problems faced by the ULBs in the process of implementation. The presentation was structured to establish various facts showing the development of Urban India in the context of sanitation and the challenges faced by the authorities at the city level. The points of discussion revolved around various challenges at the city level and possible solutions through experiences from the state of Maharashtra.

Mr. Nogesh Bhardwaj, Regional In-Charge Rajasthan, CDD society, in the session taken by him, elaborated upon FSSM and importance of waste water treatment. Waste water treatment by centralised and decentralised systems was



Mr. Nogesh Bhardwaj, Regional In-Charge Rajasthan, CDD society addressing the participants

discussed further to understand the importance of both the approaches. Since, Rajasthan state was not very familiar with the concept of FSSM, a detailed discussion was important to explain the participants about the objectives and methodology of the study to be carried out in the cities under the FSSM to extend help to the government authorities of small towns/cities to manage the septage in an efficient way.



Mr. Suraj Kumar, Program Manager, IPE Global addressing the participants

Mr. Suraj Kumar, Program Manager, IPE Global in his session, presented an overview about the government FSSM policies for all cities / towns. Further, a brief discussion was held on the timeline of the policy interventions to ensure 100 per cent collection, conveyance and treatment of all Faecal sludge and its disposal in a safe manner. Policy interventions of Phulera and Sambhar were discussed in detail.



Mr. Dhruv Bhavsar, Senior Research Associate, C-WAS, CEPT University, Ahmedabad addressing the participants

Mr. Dhruv Bhavsar, Senior Research Associate, C-WAS, CEPT University, Ahmedabad dwelt upon the need for septage management plan and planning strategies by explaining the emerging recognition of FSSM. A detailed comparison was listed to understand the major differentiating factors between the conventional sewerage and septage management. Further, a complete step-by step approach to operationalize the Septage Management Plan (SMP) was discussed.

He also explained the financing aspects of FSSM for all components of the service chain and then identifying the potential financial sources like central or state grants or local government funds. The identification of existing revenue sources was discussed in detail which was important to understand the financial powers local bodies possess in the state of Rajasthan. Financial models of Sinnar and Wai were explained and hands -on activity was carried out which made this session interactive and informative.

Mr. Ritesh Kumar Suman, in his session briefed about the various treatment methods like centralised and decentralised systems and their pros & cons. The speaker explained DEWATS system and introduced it as solution to the current scenario of small and medium towns in the state. The session gave an overview of technological options by showing various system diagrams and systems installed on site.



Mr. Ritesh Kumar Suman, Project Engineer, CDD Society, Bengaluru addressing the participants

The session also covered the reuse of the septage waste and concluded with case studies.

The orientation program concluded with distribution of certificates by the honourable chief guest Shri Mukesh Kumar Meena.

Testimonials



Mr. Bharat Gajetia, Dy. Chairperson, Chittorgarh Municipal Council, Rajasthan

"I am immensely thankful to RCUES of AIILSG, Mumbai. The information of segregation and recycling technologies learned in this training programme will greatly help us to achieve the goals and fulfillments of dreams of solid waste management as per Rules, 2016."

Mrs. Mamata Kale, Former Mayor, Vadodara Municipal Corporation, Gujarat

"A very informative training program and the lectures planned, focussed very deeply on every small issues' of segregation of solid waste."

Mr. Jitendra K Patel, SWM Incharge, Valsad Municipality, Gujarat

"This type of training programme should arrange continuously, because it encourages ULBs executive and deliberative wing to work with great enthusiasm."

Mr. I. K. Sindha, Sanitary Inspector, Karjan Municipality, Gujarat

"I observed during the training programme participants satisfied with getting opportunity to discuss issues openly and honestly without any prejudice... really appreciated."

RCUES, Mumbai Advisory Committee

Mrs. Manisha Mhaiskar, IAS

Ex-Officio Chairperson Principal Secretary, Urban Development Department, Government of Maharashtra, Mumbai

Mr. Sanjay Kumar, IAS

Member
Joint Secretary (DAY – NULM),
Ministry of Housing & Urban Affairs,
Government of India, Nirman Bhavan, New Delhi

Mr. Mukesh Puri, IAS

Member Principal Secretary, Urban Development & Urban Housing Department, Government of Gujarat, Gandhinagar, Gujarat.

Mr. Mukesh Sharma, IAS

Member

Addl. Chief Secretary, Urban Development & Housing Department, Government of Rajasthan, Jaipur, Rajasthan.

Mr. Sudhir Mahajan, IAS

Member Secretary,

Urban Development Department, Government of Goa, Porvorim, Bardez, Goa.

Mr. Sanjib Kumar Gohain Baruah, IAS

Member Secretary,

Urban Development Department,

Government of Assam, Guwahati, Assam.

Mr. Lok Ranjan, IAS

Member

Principal Secretary,

Urban Development Department,

Government of Tripura, Agartala, Tripura.

Dr. T. Chatterjee, IAS (Retired)

Member

Director,

Indian Institute of Public Administration, Indraprastha Estate, New Delhi.

Dr. (Mrs.) Sudha Mohan

Member

Professor & Head,

Department of Civics & Politics,

University of Mumbai, Vidyanagari, Mumbai.

Mr. Rajiv Agarwal, IAS (Retd.)

Member

Director-General,

All India Institute of Local Self-Government,

Mumbai.

Ms. Utkarsha Kavadi

Member-Secretary

Director,

Regional Centre for Urban & Environmental Studies,

All India Institute of Local Self-Government,

Mumbai.

Established in the year 1968, is fully supported by Ministry of Housing and Urban Affairs, Government of India

Printed by All India Institute of Local Self-Government, at Copytronics, Bandra (East) - 400 051.

Disclaimer

The views expressed in the articles, briefs and news in this publication are those of the respective authors and researchers. They do not depict, in any way, the views and policies of the RCUES, AllLSG, Mumbai and Ministry of Housing and Urban Affairs, Government of India.

