

A People's Movement

- In the past, there has been a general distrust of Government schemes. The principal reason for this is that either the benefits don't reach the targeted or that the projected parameters are never achieved. However, the Swachh Bharat Abhiyan is a scheme with difference.
- This is one scheme which the people of India snatched away from the Government and converted into a **people's movement**.
- When the scheme was announced, the rural sanitation coverage of India was 39%. After four years of the scheme, 39 per cent rural sanitation coverage has increased to a phenomenal 92 per cent.
- But this 'people' movement' has today **transformed into a 'women's movement'** with rural women playing a leading role in the programme.
- Women of India are now stepping beyond their roles as mere beneficiaries of this programme to leaders of it today.
- For example, construction of toilets has always been a male bastion. In many States, however, thousands of rural women have been trained as masons and, with the assistance of Self-Help Groups, are now becoming the primary force in driving a State to be declared free from open defecation.
- The hygiene in the utilization of the toilet is also a preventive healthcare scheme. Global experts believe that the SBM will have saved over three lakh lives in the country by the time we become 'open-defecation free' in 2019. Toilets in several parts of India have been named "**Izzat Ghar**".
- This scheme will go a long way in improving the quality of life of India's rural population, particularly women.
- With rural road, rural electrification, rural Awas Yojana, toilets and a cooking gas connection with foodgrain provided at a modest cost, the quality of life of India's rural poor will get a quantum jump.
- Additionally, when the **Ayushman Bharat**, which provides upto Rs. 5 lakhs per family per year as hospitalisation expense, is fully implemented, this will change the quality of life of India's rural populations.

Success Stories:

Punjab to launch a bilingual ODF sustainability mobile App. –

- Punjab is the first state to launch an ODF sustainability App under its 'My Village My Pride' campaign. The sustainability App is one of its kind, to cover all parameters related to sanitation as well as sustainability.
- My Village, My Pride campaign also features various competitions between villages – ODF awareness, Morning Nigrani, Cleanliness drive, women mohalls, soak pit awareness, and solid waste segregation.

On the Road to Swachh Bharat

- When the government gave a clarion call for Swachh Bharat On October 2, 2014, the task ahead was daunting.

- If providing sanitation infrastructure for 125 crore people was a challenge, then invoking a sense of cleanliness among them and effecting behavioural changes was even more difficult.
- One of the major *Swachhata* challenges has been the cleaning of River Ganga to restore its *Aviralta* and *Nirmalta*-its continuous and unpolluted flow.

Reasons for pollution in Ganga

- Ganga has **multiple sources** of pollution. About 2953 million litres of sewage generated by 97 towns along the banks enter the river untreated everyday.
- The **sewage treatment infrastructure** in these towns is **inadequate**, and in many cases defunct for want of proper maintenance. The problem will only get compounded as population grows in these towns, generating more waste.
- There are **untreated effluents from industrial sources**, **solid waste** from the towns and village along the river banks, **agricultural waste**, **open defecation waste**, and **polluted tributaries** and *nallahs* emptying into the river, all contributing to the load of pollutants from each of these sources regularly, and on a sustained basis.
- This calls for coordinated and concerted action from multiple agencies – central, state, private as well as the participation of people living along the river.

Cleaning of Ganga

- **Namami Gange programme** launched in 2015 has made good headway in this direction. For the first time a **separate ministry** was made for Ganga Rejuvenation in 2014.
- **The National Mission for Clean Ganga** that is responsible for implementing the programme was declared as an Authority under Environment protection Act 1986, giving it more powers in 2016, and **State and District Ganga Committees** were established in 2017.
- **Projects Sanctioned** - 240 projects have already been sanctioned under the programme so far. These projects include sewage infrastructure, Ghats and crematoria, river surface cleaning, institutional development, biodiversity conservation, afforestation, and rural sanitation.
- **Enhancement of sewage treatment capacity** - 97 towns have been identified along the mainstream of river Ganga, generating 3603 MLD of sewage. The existing **sewage treatment capacity** in these towns is only 1651 MLD, and will be enhanced under the programme. Out of these 97 towns, the ten most polluting towns of Haridwar, Kanpur, Allahabad, Farrukhabad, Varanasi, Patna, Bhagalpur, Kolkata, Howrah and Bally are being covered extensively under STPs.
- Some **innovative models** are being followed like the **Hybrid Annuity Mode and One-City One-Operator concept** where all new and existing STPs will be under charge of one private operator, ensuring better upkeep and maintenance.
- In addition, 16 projects have been taken up on Ganga tributaries, like Yamuna (Sonapat and Panipat in Haryana, Delhi, Mathura and Vrindavan in UP), Ramganga (Moradabad, UP), Saryu (Ayodhya, UP) and Kosi (Naugachia, Bihar).
- This programme is comprehensive and integrated, allows collaborative action between state and central agencies, and brings Ganga and its tributaries under one umbrella.
- Many private companies are also taking up projects to clean Ganga, renovate the ghats and crematoria or do afforestation along the banks **under their CSR activities**.

- Many self-motivated individuals are also coming forward for afforestation, ghat cleaning and other such work. Known as **Ganga Praharis** they motivate other people to help keep the river and its banks clean.

Swachhata in the Roads

- *Swachhata* is also a major priority in Road Transport and Highways and Shipping. Government is promoting the **use of waterways** as a cheaper and more environment friendly mode of transport. Around 111 waterways have been declared as National Waterways and will be developed for transport.
- Governments also trying to promote the **use of cleaner fuel** like Ethanol, Methanol, Bio-Diesel, Bio CNG and electricity in the transport sector as alternatives to petrol and diesel.
- The National Highways Authority of India is in the process of providing separated ladies and gents toilets on both upside and down side of toll plazas, and al 372 toll plazas across the country will get covered by March 2019.
- Road Ministry is also trying for generation of less waste during road building and using waste material like flyash, plastic, oil slag and municipal waste for construction of highways.
- The Shipping Ministry and all organisations under it took up a twenty two point agenda for renovation of rooms and toilets, cleaning of wharfs and sheds, auction and disposal of al unserviceable items and unclaimed goods, beautification and cleaning of parks etc.
- It has also focussed on the **setting up of 'Green Ports'** for sustainable, environment-friendly and long term development of ports.
- Recently **Visakhapatnam Port Trust** was adjudged as the winner in the *category of Outstanding Renewable Energy User in the service sector in India by the Indian Federation of Green Energy*. The port consumes 1.2 MU of power per year and 100 per cent of its power consumption is being met from green energy.

Towards Clean and Healthy Villages

- Only when the villages are developed the holistic and inclusive development of the country is possible. But this dream of development would remain unfulfilled without making rural India clean.
- The government is making all out efforts to bring about large scale development in the villages and cleanliness is the most important component of this effort.
- An initiative that has made marked contribution in changing the quality of life of rural people is the Swachh Bharat Mission.

Transforming the Destiny of our Villages

- Swachh Bharat has transformed the face and destiny of the village today. Studies have revealed that in every house of an Open Defecation Free village, *about Rs. 50000 are being saved* because the family is saving on the expenditure otherwise being incurred on treatment of various diseases.
- People's health related expenses have come down and they are able to work for more days.
- According to a study by the World Health Organization, with the implementation of Swachh Bharat Mission, *every year we have successfully prevented a large number of children from becoming victims of deadly diseases* in rural areas and the situation is continuously improving.

Unique Initiatives Under SBM

- Swachh Bharat has also led to certain unique initiatives in rural areas that have never been seen before. **Women associated with Self-Help Groups** have made commendable contribution in the cleanliness movement. They have invested their savings in cleanliness related works and thus played an important role in making the environment and surroundings beautiful and clean.
- **The Panchayats** have made sincere efforts to not only connect the masses with this program and with the cooperation of all made the village panchayats ODF, but they have also promoted environment related cleanliness by undertaking activities related to solid and liquid waste management.
- Swachh Bharat Mission has now acquired the **form of a mass movement** and with the aim to take it forward, the **Rural Development Ministry** has taken a number of measures through its ambitious scheme Mahatma Gandhi National Rural Employment Guarantee Act – MGNREGA.
- This includes **awareness promotion** among the village panchayats towards cleanliness in the rural areas and encouraging and training villagers to take up activities related to livelihood creation.
- The Ministry is engaged in construction of individual household toilets and soakage pits, solid waste management works related to solid and liquid waste management, liquid bio-compost, etc.

Managing Waste Water

- For waste water management in Telangana state soakage pits are being constructed through MGNREGA at family and community level. By constructing soakage pits, breeding of mosquitoes would be controlled which in turn will control spread of several diseases.
- Construction of **Lingpuri water tank of Tlengum R G Block in Aizawl district Mizoram** was started as an innovative experiment under MGNREGA.
- Harayana Government has developed a **five pond system** in rural areas for stabilization of waste water under MGNREGA.

Conclusion

- Considering the diversity of the villages in the country it should be kept in mind that no one model of sanitation can be adopted for all 238617 Gram Panchayats in India. However, we have to keep focusing on developing such measures which are easy to adopt, economical and have minimum technical limitations.

Swachhata: Juggernaut of Change

- Ministry of Petroleum & Natural Gas (MoP & NG) has passionately supported the objectives of Swachh Bharat Mission through various initiatives.
- The Oil & Gas Central Public Sector Enterprises and their Joint-Ventures (JV), have not only undertaken multifaceted projects around their core business offerings and Corporate Social Responsibility to build infrastructure that supports sanitation, but also spiritedly participated in this social movement towards attaining the goals of Swachh Bharat Abhiyan.

Steps Taken by MoP & NG:

A. Amenities in Petrol Pumps

- A mission-mode plant to provide clean toilets, clean drinking water and waste disposal facilities across all OMC petrol pumps was launched under the Swachh Bharat Abhiyan.
- Separate toilets for men and women are available in nearly 90 per cent of the feasible petrol pumps on National Highways and State Highways.
- The Swachhata@ petrolpump app leverages technology putting consumers at the forefront to monitor, report and ensure cleanliness of the toilets at outlets across India on real time basis.

B. Making Cooking Women Friendly

- Since millennia, women of India have been choking helplessly over the kitchen choolha.
- The government empathized with the suffering of these millions of underprivileged women and families in India, who could not afford clean cooking fuel like LPG and set out to bring a **Blue Flame Revolution**.
- Since the launch of the **Pradhan Mantri Ujjwala Yojana (PMUY)**, more than 551 crore LPG connections have been released for women from underprivileged and SC/ST communities in India.
- LPG penetration in India from Independence till 2014 was about 54 per cent. The LPG penetration in 2018 is 88 per cent.

C. Improving Fuel Efficiency

- In line with India's climate change commitments at COP21 in Paris, the Central Government has taken several policy measures and interventions to reduce vehicular emissions and improve fuel efficiency.
- The Government has taken a bold decision to **leapfrog from BS IV to BS VI fuel** norms directly. BS VI standard fuel is significantly less polluting than BSIV, and comparable to global standards such as Euro VI.
- BS VI has been proactively launched at petrol pumps in Delhi from April 2018 and will be rolled-out pan India by April 2020.

D. Biofuel Policy

- With an objective of addressing both the environmental pollution from burning of agricultural waste and generating additional income for Indian farmers, the government approved the landmark **National Policy on Biofuels in 2018**.
- Plans are afoot to set up twelve **2nd generation bio-refineries** which will be capable of generating bio-ethanol from agricultural residue.
- So far we have already achieved 4 per cent ethanol blending in petrol leading to a 7.8 million MT reduction in green house gas emissions and forex savings of \$1520 million from fuel imports, and our target is to reach 10 per cent ethanol blending in petrol.
- Great potential also lies in the employment of **used cooking oil** as a potential feedstock for biodiesel which will not only augment fuel production, but also prevent diversion of used cooking oil in the food industry. MoP&NG has also driven an aggressive capacity expansion in its solar and wind energy projects since 2014.

E. Other Initiatives

- The oil & gas CPSEs are among India's most profitable corporations with a **commitment to spend 33 per cent of their CSR funds** on Swachh Bharat activities.
- Under the Swachh Vidyalaya Abhiyan sub-project, oil & gas CPSEs have constructed more than 21,750 school toilets across the country.
- **Ten iconic places** of historical and religious importance were identified and adopted by oil & gas CPSEs for upkeep and maintenance across the length and breadth of the country.

- Some of the most innovative projects undertaken by oil & gas CPSEs include a **Bandicoot robotic manhole cleaner** installed by Indian Oil Corporation in Thanjavur, Tamil Nadu which replaces manual scavenging.
- An Oil & Natural Gas Corporation (ONGC) project installed eco-friendly incinerators at locations in Gujarat and Rajasthan for disposal of used sanitary parts benefitting thousands of rural women. ONGC also provisioned 3 water ATMs and solar RO water purifiers at locations in Assam, Jharkhand and Tripura.
- Initiatives such as the fortnightly observance of **Swachhata Pakhwada** and **Swachhata his Sewa** provide an opportunity to showcase and celebrate the core messages of the Swachh Bharat Abhiyan.
- The Ministry of Petroleum & Natural Gas was awarded the **Swachh Bharat Inter-Ministerial Award in Swachh Bharat National Awards 2017**.

Sanitation Revolution: Implementation at Scale

Data related to Sanitation:

- From being a major cause of the world's sanitation crisis, with about 600 million people defecating in the open, about 500 million people now have access to toilets through a sanitation revolution which has taken place over the last four years. Today, India has a rural sanitation coverage of over 95 per cent.
- After building a phenomenal 87 million individual household toilets, as many as 5.1 lakh villages, 529 districts and 25 States and Union Territories are now open defecation free. Further, a recent, independent large-scale household surveyed which had toilets used them, confirming the behaviour change focus of the Swachh Bharat Mission.

How did India move from being the largest contributor to open defecation to implementer of the largest behaviour change campaign in the world?

- The Swachh Bharat Mission (SBM), had to change and amplify strategy, in order to address, what we like to call, the **challenge of the 4 Ss**.
- **Scale**. To meet the need to change the behaviour of 600 million people, the SBM had to acknowledge the scale it was dealing with and respond with a national Team Swachh Bharat with the calibre to change the behaviour of the individual, as well as the community.
- **Speed**. A sense of urgency needed to be created to kick start and roll through the campaign. Speed was also required in setting up the team.
- By creating the team from scratch, the SBM had to first ensure each individual in the team believed. This was true behaviour change in the very leadership which would take the Mission forward and gave rise to the **PM-CM-DM-VM** model.
- The Prime Minister gave the vision of an ODF India by October 2019, the Chief Ministers led at the State- level, District Magistrates prioritized sanitation and put the focus on the SBM, further empowering the **Village Motivators**, the swachhagrahis, to partake in inter-personal communication, and lead behaviour change in the villages.
- **Sigmas and Myths**. There were various common myths in rural India regarding sanitation – toilets are only required for women and children, having a toilet within the premises of one's home is impure, cleaning the toilet is not one's own duty, and many more.
- Along with addressing these on the ground, at a central level, mass media campaign were launched, each with their own messages and myth busters. The Darwaza Band

Campaign, starring Bollywood icons Amitabh Bachchan and Anushka Sharma, moved beyond access to toilets and communicated the need to use toilets, not just by women and children, but by each and every member of the household.

- **Sustainability.** With the sanitation revolution gaining momentum, the SBM also maintained its parallel focus on sustaining the jan andolan and the progress being made on the ground. The following were key elements of the sustainability strategy:
 - **ODF-Quality (ODF-Q):** Requires every toilet constructed under the Mission to be geo-tagged. All villages are subject to a double verification system, which includes self-declaration as well as third party verification.
 - **ODF-Sustainability (ODF-S):** Ensures continuous behaviour change communication, to remain much after the achievement of ODF.
 - **ODF plus (ODF+):** SBM goes beyond toilets and works towards clean villages by prioritizing solid and liquid waste management practices in ODF villages, as well as the prioritization on rural water supply for ODF villages, in coordination with the National Rural Drinking water programme.

Special Initiatives under this project:

- **Swachhata Pakhwada** - where all Union Ministries/Departments take up swachhata related activities for a fortnight each,
- **Swachh Iconic Places** - A multi-stakeholder initiative focusing on cleaning up 100 places across India that are iconic due to their heritage, religious and/or cultural significance
- **Swachhata Action Plan** - where 76 Ministries/Departments have earmarked funds for their Swachhata plans
- Making villages along the banks of the Ganga River ODF.
- The most recent initiative was **Swachh Survekshan Grameen** 2018 under which an independent sanitation survey was conducted.
- **Few instances of our SBM Champions:**
 - When mason's training was offered to women, **Sunitha Devi** enthusiastically joined the programme and learned to build twin pit toilets in the proper way. Seeing her skill, the district administration made her a master trainer who went from village to village, training other Rani Mistris. To date, she has trained over 1600 Rani Mistris.
 - **Shamshah Begum**, an active campaigner of the SBM-G was to get married. When she received a proposal from Tousef Reza Ahmad, a cellphone shop owner, she agreed, subject to certain conditions – including the setting up of a proper toilet in the groom's home in Murshidabad.

Lessons Learned:

- From addressing the 4 Ss, the SBM has guided discourse to lessons learnt in the form of the importance of the 4 PsS.
- **Political Leadership.** Political will and leadership from the top are critical.
- **Public funding.** Over Rs. One lakh crore have been committed by centre states to the SBM to ensure no shortfall in funding.
- **Partnership.** Constant engagement with development partners, NGOs, the private sector, civil society, media, etc.
- **Peoples participation.** Sanitation is not a government programme, but a jan andolan.
- The SBM is setting an example for the rest of the world to move towards improving sanitation for all and achieving the United Nation's Sustainable Development Goal 6

mission mode and ensuring that behaviour change communication in all its forms is the only tool for sustainable change.

SATAT initiative to promote Compressed Bio-Gas as an Alternate, Green Transport Fuel

An innovative initiative – SATAT – to set up Compressed Bio-Gas (CBG) production plants and make available CBG in the market for use in automotive fuels was launched recently by the Union Minister of Petroleum and Natural Gas & Skill Development and Entrepreneurship.

Besides the potential to boost availability of more affordable transport fuels, better use of agricultural residue, cattle dung and municipal solid waste, the CBG plants will provide an additional revenue source to farmers.

SATAT is aimed at providing a Sustainable Alternative Towards Affordable Transportation as a developmental effort that would benefit both vehicle-users as well as farmers and entrepreneurs. This initiative holds great promise for efficient municipal solid waste management and in tackling the problem of polluted urban air due to farm stubble-burning and carbon emissions.

Improving Cleanliness of Health Care Facilities

- For addressing the growing challenges of Sanitation and Hygiene, the Ministry of Health & Family Welfare of Government of India has adopted a multi-pronged strategy and has launched many initiatives for improving hygiene and sanitation holistically.
- These initiatives address hygiene and sanitation within existing health facilities as well as in the community through its own programs, and also in partnership with other Ministries to address the issue holistically.

Initiatives:

- MoHFW's **Kayakalp initiative** began in 2015 with the aim of improving infrastructure upkeep, hygiene and sanitation, and infection control practices in Central Government institutions and public health facilities in all 36 States and UTs.
- Health facilities are **assessed and scored** on a number of parameters, and every year the highest-scoring facilities at each level receive recognition through Kayakalp Awards that carry a cash award, apart from citation.
- The Kayakalp scheme has resulted in significant improvement in the level of the cleanliness, hygiene and infection control practices at public healthcare facilities.
- Encouraged by the achievements of Kayakalp Scheme, the private sector has come forward and joined the efforts of the Governments. National Accreditation Board for Hospitals & Healthcare Providers (NABH) has decided to consider assessment of healthcare facilities in the private sector on the lines of parameters of Kayakalp.
- Additionally, MoFHW has used the platforms of **Village Health Sanitation and nutrition Committees** (VHSNCs) under the **National Health Mission** and **Mahila Arogya Samitis** (MAS) under the **National Urban Health Mission (NUHM)** to promote sanitation in the vulnerable urban communities.
- MoHFW is also working to improve sanitation through a convergence of efforts with other ministries.

- One such joint initiative between MoHFW and the Ministry of Drinking Water and Sanitation is the **Swachh Swasth Sarvatra** that attempts to bring synergy between the Swachh Bharat Mission (SBM) and Kayakalp by enabling and awarding funds to Gram Panchayats where Kayakalp awarded PHCs and CHCs are located to become Open Defecation Free.

VISHWAS-A New Initiative

- In 2017, NHM has launched a new campaign, **VISHWAS – Village based Initiative to Synergies Health, Water and Sanitation** – a year long campaign to be carried out by VHSNCs to build community awareness and develop local champions for action on water, sanitation and health, and create a platform for building synergies between various programmes, such as the Swachh Bharat Mission.

Swachh Swasth Sarvatra

- Swachh Swasth Sarvatra is a joint initiative of Ministry of Health & Family Welfare and Ministry of Drinking Water and Sanitation to achieve better health outcomes through improved sanitation and increase awareness on healthy lifestyles, Its objective is to have more synergy between two complementary programmes - Swachh Bharat Mission (SBM) and Kayakalp
- Three broad objectives of this scheme are:
 1. Enabling Gram Panchayat where *Kayakalp* awarded PHCs is located to become Open Defecation Free (ODF).
 2. Strengthening Community Health Centre (CHC) in ODF blocks to achieve a high level of cleanliness to meet *Kayakalp* standards through a support of Rs 10 lakhs under NHM.
 3. Build capacity through training in water, sanitation and hygiene (WASH) to nominees from such CHCs and PHCs.

Village Health Sanitation and Nutrition Committees (VHSNCs)

- National Rural Health Mission, since its inception in 2005, created Village Health Sanitation Committees (VHSCs) across all states, as the 'platform for community action on health', clearly highlighting the key role of mobilising communities in improving sanitation and achieving health outcomes.
- VHSCs have been later renamed as Village Health Sanitation and Nutrition Committees (VHSNCs), to underscore Nutrition as part of its focus.
- As per the revised guidelines for VHSNC, released in 2013, the local Gram Panchayat Member is to be the Chairperson of VHSNC (earlier it was the Gram Panchayat Sarpanch), to ensure more active participation of the community, as well as Panchayat representatives in every village.
- ASHAs play a key role in facilitating VHSNCs, and, not only work for improving community level awareness and support and facilitate the activities of VHSNCs in their villages, but they also mobilise the community for construction and use of toilets.

Mahila Arogya Samitis (MAS) under NUHM

- Similar to VHSNCs, Mahila Arogya Samiti (MAS) has been established in urban areas under NUHM. MAS are groups of about 12 to 20 women in an urban area, in a community of primarily poor and vulnerable sections. Under NUHM, processes for constitution and training of MAS are being supported actively.

A Swachh Independence Day For Kalaburagi

- To motivate and mobilize people to accept swachhata as a way of life, the zila Panchayat of Kalaburagi district in Karnataka, demonstrated the steps to handwashing to an audience of over 5000 people at the Police Parade grounds during the independence Day celebration.
- The mass demonstration-drill depicting the best practices of handwashing was conducted by over 600 students of residential schools from all over the district.
- The theme of the event was Swachh Meva Jayate and it included the Swachh Survekshan Logo.
- The event highlighted the fact that students are key to ODF sustainability and that sanitation is an integral component of nation building.

A hygienic Environment for Mother and Child

- The concept of “sanitation’ is a comprehensive one including effective management (collection, treatment and disposal/recovery, reuse or recycling) of human waste, solid waste (including biodegradable and non-biodegradable refuse/trash/rubbish), waste water, sewage effluents, industrial wastes and hazardous wastes (such as hospital, chemical, radioactive, plastic or other dangerous).
- The standards of sanitation in a society are closely inter-related to the levels of hygiene and public health in it including extent of diseases and to the attainable standards of longevity, and thus to the productive levels of the society.
- Water, Sanitation and Hygiene are the three core issues which are grouped together to represent a growing sector. While each is a separate field of work, each is dependent field of work, each is dependent on the presence of the other. For example, without toilets, water sources become contaminated; without clean water, basic hygiene practices are not possible.

Why Sanitation is needed?

- For children under five, water and sanitation-related diseases are one of the leading causes of death.
- Every day, over 800 children die from preventable diseases caused by poor water, and a lack of sanitation and hygiene, Around 564 million people, which is nearly half the population of India, defecate in the open.
- Indian accounts for 90 per cent of the people in South Asia and 59 per cent of the 1.1 billion people in the world who practice open defecation.

Steps Taken By MWCD:

- The Ministry of Women and Child Development has been a pioneering Ministry in undertaking Swachhata to the next level.
- To maintain universal sanitation and hygiene at Anganwadi Centres, all States and Union Territories were directed to conduct activities on various themes like **Clean**

Anganwadi, Clean Surrounding under “Swachh Bharat Mission” and “Bal Swachhata Mission”.

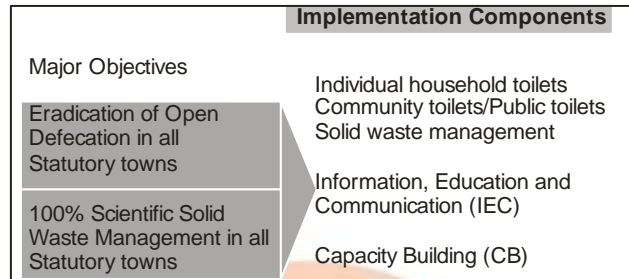
- A **booklet on Ball Swachhata Mission** was also released regarding conduct of various activities relating to cleanliness and sanitation and use of safe drinking water at Anganwadi Centres.
- Simultaneously, joint efforts with MoRD and MoPR for construction of 4 lakh anganwadi buildings and toilets under MGREGA were taken.
- The Ministry of Women & Child Development observed **Swachhata Pakhwada** from 1st March 2017 to 15th March 2017 to raise awareness.
- Various Swachhata related activities were carried out in field units of the Ministry like Anganwadi Centres, Child Care Institutions, Swadhar Grehs, One Stop Centres, Working Women’s Hostels etc.
- There were also activities for the girl child on the theme of Swachha Bharat, demonstration on hygiene cooking behaviour and practices were given.
- The Ministry has organized Swachhata hi Sewa campaign from 15th September 2018 to 2nd October 2018.
- The Ministry has taken separate care for conducting awareness campaigns for menstrual hygiene for women.
- The Ministry has tried to reinforce the concept of “Sanitation as Everyone’s Business”.
- For the children specifically, puppet shows, wall paintings and street plays are organized according on the theme so that the message of Swachhata is disseminated to them along with entertainment.
- Demonstration of hand washing using WHO techniques has been organized during events like **POSHAN Maah, Swachhata Hi Sewa Campaign and Swachhata Pakhwadas**.
- The Ministry has also initiated **POSHAN Abhiyan** to reduce the problem of poor nutrition among children by synthesizing, generating and mobilizing nutritional resources.
- The Ministry of Drinking Water and Sanitation, Ministry of Women and Child Development has taken Sanitation in its purview and is acting as an active body to work inside out for it.

Sanitation Revolution: Cleansing Urban India

- A multi-pronged approach comprising regulatory and policy level changes, sustainable infrastructure creation and focusing on attitudinal and behavioural change among people through large scale citizen engagement has been the hallmark of the Government’s initiatives on the journey towards a “Swachh Bharat”.
- Various studies have established that the problem of solid waste management has been compounded due to high population growth rates and population concentration in urban areas.
- Studies have proved that improvement in sanitation and hygiene results in better health outcomes. As per the India Health Report for Nutrition Security in India (PHFI, 2015), the North Eastern state of Mizoram has reported a 13 percentage-point decline in stunting and five percentage points decline in underweight children between 2006 and 2014 due to improved access to sanitation.

The Launch of Swachh Bharat Mission

- The launch of Swachh Bharat Mission on 2nd October 2014 by the Prime Minister to address this burgeoning health crisis was a historic moment for India.
- The Swachh Bharat Mission (Urban) being implemented by the Ministry of Housing and Urban Affairs (MoHUA) is aimed at transforming Urban India into a garbage-free and open defecation free country across all its towns and cities by 2nd October 2019.



Sanitation –the ODF Journey

- SBM (Urban) is focusing on counting and sustaining Open Defecation Free (ODF) towns/cities, rather than only counting toilets.
- Today, urban areas of 19 States/UTs have become ODF.
- Government has now introduced the SBM ODF + and ODF ++ protocols to address the issue of operation and maintenance of community and public toilets, and also the issue of holistic sanitation, including faecal sludge management, so that the ODF outcomes that have seen achieved are sustained in the long run.
- Parallely, MoHUA has partnered with Google to upload and make available on Google to upload and make available on Google maps all the public and community toilets in the cities so that citizens and visitors are able to easily locate these facilities in their vicinity.

Solid Waste Management – a Multi-Pronged approach

- In India, an estimated 65 million tonnes of Municipal Solid Waste is generated annually by around 400 million citizens residing in urban areas. It is estimated that 165 million tonnes of waste will be generated by 2030.
- We are also losing 1,250 hectares of additional precious land every year to accommodate dumping of un-processed municipal solid waste.
- Therefore, MoHUA has adopted a multi-pronged approach to address the complex issue of scientific waste management in urban areas of Indian.
- This includes **policy and regulatory changes** to encourage process of waste to value added products on the one hand, along with Mission initiatives such as **Swachh Survekshan** to inculcate a spirit of healthy competition, and **Star Rating for Garbage Free cities** to ensure long term sustainability.
- At the time of launch of the Swachh Bharat Mission, 95 lakh tonnes per annum of waste was the treatment capacity across processes such as composting, bio-methanation, RDF and waste to energy plants.
- This has been enhanced substantially in the last 4 years, and approximately 37 per cent of the total waste generated is being processed today.

Swachh Survekshan- a Toll for Mission Monitoring and Governance

- Under the SBM Urban, MoHUA has been conducting the *Swachh Survekshan*- an annual survey to rank cities on various sanitation and cleanliness parameters. The

survey has been successful in enthusing cities with a spirit of healthy competition towards the concept of 'swachhata', while also emerging as an effective Mission monitoring and governance tool.

Star Rating for Garbage Cities

- The Ministry has introduced a new innovative initiative for evaluating the Garbage Free status of Cities and awarding the "**Garbage Free City Stars**" to the city.
- The Star Rating initiative, which is a rating protocol based on twelve (12) parameters, follows a **SMART framework** – **S**ingle metric, **M**easurable, **A**chievable, **R**igorous verification mechanism and **T**argeted towards outcomes- and has been devised in a holistic manner covering all aspects of Solid Waste Management.
- In fact, the Star Rating protocol, properly implemented, can prove to be a game changer and revolutionise the way solid Waste is managed in India.
- **Way Forward:** At MoHUA, other Missions such as Atal Mission for Rejuvenation and Urban Transformation (AMRUT) which addresses the tissue of waste water and faecal sludge management the Smart Cities Mission (SCM) which has solid Waste Management as one of its development parameter – are complementing the SBM (Urban)' efforts in taking forward the mandate of sanitation and waste management. The focus will now be not only on sustaining the momentum but on accelerating the pace further through innovative, game changing approaches, along with a strong regulatory and legal framework and strict enforcement.

Plastic Free Sitamarhi

- Sitamarhi, the first district in Bihar to become open defecation free (ODF), on 17th July 2018 is now heading towards a much-talked about plastic ban that will be carried out in a phased manner.

Success Stories from States and Cities

- Chhatisgarh is on its way to becoming a Zero Landfill state through the Zero Waste Model being replicated in its cities. Ambikapur in Chhatisgarh has no open dumping yards, segregating over 90 per cent of its waste through their innovative Solid Liquid Waste Management (SLRM) approach.
- Kerala has been leading the way in decentralized waste management with most of its cities having installed pipe compost and bio gas plants at the households level. In fact, Alappuzha in Kerala is among the top five cities in the world recognised by the United Nations Environment Programme (UNEP) in its efforts to tackle the problem of solid waste.
- Goa has proven how waste can be an asset through its source segregation into 5 fractions. The city claims 100 per cent door to door collection.
- 100 percent of waste in Gangtok is being segregated at sources and being processed.

Sanitation as Everyone's Business

- Political Will, Public Policy, Investments, Partnerships- all must come together to create an enabling environment that would be powered by people's participation to deliver the final assault on decades of lack of sanitation and neglect of hygiene.
- Sanitation work by non-sanitation ministries and departments, giving time and resources out of their core business, holds eminent assurance that the path of Swachhata should be irreversible.

- To help the Union Ministries to build *swachhata* into their own schemes and policies, special projects with measurable outcomes have been developed. As a result, the Swachh Bharat Mission has become all-encompassing- a synergizer of efforts across all stakeholders.

SBM: Bringing Together Multiple Stakeholders

A. Swachhata Action Plant (SAP)

- SAP was launched on 1st April 2017. Under this, ministries and departments mainstream sanitation in their mandates through budgeted and accountable action plants.
- SAP heralds a milestone in government functioning where all wings joint hands to deliver the goal of Swachh Bharat, irrespective of their allocated functions.

B. Swachh Iconic Places (SIP)

- It was decided that places of heritage, with significance for history and culture and centres of pilgrimage marked by high footfall would be taken up to raise them to distinctly higher levels of cleanliness.
- The Swachh Iconic Place (SIP) project, as a component of SBM, aims to achieve the same.
- For execution, MDWS coordinates with partner ministers like Housing and Urban Affairs, Tourism and Culture as well as with States, Local bodies, Trust and Managing Committees that manage the iconic places.

C. Ganga Grams

- Ganga Gram is another inter-ministry project between SBM and the National Mission for Clean Ganga (NMCG). The project is focused on better cleanliness on the banks of river Ganga, through convergence with other departments.
- Ganga Gram Project was unveiled at Allahabad on August 12, 2017 at a grand sammelan of sarpanches where all 4,475 villages on Ganga bank were declared Open Defecation Free (ODF).

D. Students and Youths to the Fore

- Swachh Bharat Mission has the most productive involvement of students and youth community to rejuvenate sanitation on campus and nearby areas and also to harness their potential as change agents.
- A special '**Swachh Bharat Summer Internship**' programme was developed for college students and youth to devote at least 100 hours to Swachhata during summer this year.
- The Ministry of Drinking Water and Sanitation in association with the Ministry of Human Resource Development and Ministry of Youth Affairs and Sports conducted this programme between May and July, the vacation time for a large number of students.

E. Corporate Partnership

- The Swachh Bharat Mission has received significant support from the corporate sector. To facilitate financial contributions from individuals and corporate, **Swachh Bharat Kosh** was set up.
- The partnership between MDWS and Tata Trust is an outstanding example of leveraging corporate strength to deliver a public mandate.
- This partnership focused on building a cadre of skilled young professionals to work as **Zila Swachh Bharat Preraks (ZSBPs)**. Tata Trusts trained and deployed 475 motivated young professionals, to help districts design, implement and monitor various interventions under the SBM-G.

F. Support from Media

- The Media has also taken upon itself to sensitise the people about the ill effects of poor sanitation and is playing a significant role in influencing behaviour change.

G. Business of Jan Jan

- Millions have come together under special campaign like *Swachhata Hi Seva*, Chalo Champaran, ODF Weeks and fortnights and many more for adoption of sustainable sanitation.
- Women have been championing the Swachh Bharat Mission like no other group. In the run up to International Women's Day on 8th March, The *Swachh Shakti* was celebrated in both 2017 and 2018 with special events to honour women champions who have done exceptional work in the field of rural sanitation.
- *Swachh Jeevika Swachh Bihar* is again a special campaign launched in July this year, to provide safe sanitation facilities at households of all Didis (members of women's Self Help Groups).

Swachh Rail, Swachh Bharat

- Consequent to the launch of the Swachh Bharat Mission, the Ministry of Railways launched the '**Swachh Rail, Swachh Bharat**' campaign with the mission to improve cleanliness across railway station premises and trains.
- Indian Railways has more than 8700 stations, running an average of over 13000 trains every day. Maintaining and improving cleanliness of these stations and trains is a mammoth task due to heavy footfalls/overcrowding, uncontrolled usage and passenger habits, particularly on trains and at major stations where passengers tend to remain for long hours.

Different Initiatives:

- Series of initiatives have been taken by the Ministry of Railways under the "Swachh Rail, Swachh Bharat" campaign that includes but is not limited to the following :
 - Outsourcing of cleanliness; Improving flooring of platforms to enable mechanised cleaning;
 - Providing separate dustbins for different types of waste;
 - Employing CCTVs to monitor cleaning practices; Installation of bio-toilets in passenger coaches;
 - Development of a "Customer Complaint" Web Portal and Mobile Application to collect continuous Citizen Feedback;
 - Introduction of on-board housekeeping services (OBHS), Clean my Coach and Coach Mitra services in nominated trains;
 - Employing first of its kind, real time 24 x 7 public grievance system through Twitter and provision of medical, security and other emergency assistance to passengers.
- '**Clean Train Station**' (CTS) are provided for limited mechanised cleaning services to passing through trains during their stoppages at selected stations enroute.
- To assess the impact of cleanliness efforts at major stations, **third party survey** on cleanliness indicators is periodically being done at 407 major stations.

Effective Customer Engagement

- Weekly intensive cleanliness drives have been undertaken at various railway stations in rotation by Zonal Railway. Theme based drives are also undertaken from time to time with focus on cleanliness in different areas of railway working.

- Use of social media, electronic media, public announcements etc. is being made to create awareness amongst rail users about cleanliness.
- Indian Railways have already introduced social media platform for customer engagement through twitter handles of the Ministry of Railways @ Rail Min India, facebook page “Ministry of Railways- India” as well as twitter handles of all Divisional Railway Managers and General Managers of Indian Railways for effective customer engagement.
- This has proved to be a more effective interactive mechanism with passengers where issues are addressed on real time basis.
- Passengers are also made aware of the already existing system of “**Clean My Coach**” (wherein one can SMS his PNR no. To 58888 to get their complaint registered for cleanliness at his seat) and helpline no. **138**.

Bio-Friendly Technology

- Bio-toilet technology has been developed jointly by Indian Railways (IR) and Defence Research and Development Organisation (DRDO). This environment-friendly, low-cost and robust technology is the first of its kind in the railway system in the world.
- The biggest advantage of this technology is that the colony of anaerobic bacteria converts human waste mainly into water and biogases (mainly methane CH₄ and Carbon Dioxide CO₂). The gases escape into the atmosphere and the waste water in discharged after disinfection on to the track.
- To avoid misuse of bio-toilets, awareness programmes to educate the passengers on ‘how to use bio-toilets- dos and don’ts’ are regularly by providing stickers in coach toilets, playing audio/video clipping and model display etc.
- The first train, **Gwalior-Varanasi-Bundelkhand Express**, fitted with IR-DRDO bio-toilets was introduced in service in January 2011.
- Since, 2014 the pace of fitment of bio-toilets has been increased substantially and it is planned to install bio-toilets in the entire coaching fleet by March 2019. Twenty seven sections on IR have been declared as Green Train Corridors which have no human waste discharge from trains, as all trains passing to these sections are fitted with 100 per cent bio-toilets
- With an aim to provide clean and efficient toilets and to reduce the water consumption in toilets, IR is doing a trial of Bio-Vacuum toilet on the passenger interface and bio-digester tank is fitted beneath the toilet area on the coach. The faecal matter gets digested in the bio-tanks on board.

Solid Waste Management

- To manage solid waste, segregation in three separate streams namely bio-degradable (wet waste), non bio-degradable (dry waste) and hazardous waste is required.
- Railways have taken up a pilot project for disposal of municipal solid waste generated at railway terminals in an environment-friendly manner including conversion of waste to energy.
- Pilot plants are being set up at Jaipur and New Delhi which will convert bio-degradable waste to energy through bio-methanation process. Energy generated from these plants would be utilised for suitable services at or near the stations.
- For the first time in 2016, railway stations (407 stations of A1 & A category) were audited for cleanliness by an independent third party agency.

- A similar survey on ranking of 210 important trains on cleanliness is also nearing completion.

Areas of Success:

The key areas of achievement of cleanliness behind the success stories are as under:

1. Reduction of plastic waste through bottle crushing machines.
2. Personal hygiene at railway stations through sanitary napkin vending machines.
3. Outsourcing of cleanliness at major railway stations.
4. Awareness initiatives carried out in schools, NGOs and communities.

Conclusion:

Railways are conscious of its duties and responsibilities towards providing a reasonably safe, clean and healthy mode of transportation to its passengers. The task requires active co-operation of the users.



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