

Development and dissemination of a tailor-made set of outreach activities to sensitize and engage communities and stakeholders in Agra



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EXECUTIVE SUMMARY

On 4th March 2019, the Government of Japan and UN Environment Programme announced that they would join hands in an effort to boost information and know-how to develop countermeasures against marine plastic litter in Southeast Asia and in India. The new initiative, *Promotion of countermeasures against marine plastic litter in Southeast Asia and India*, will develop a simulation model for plastic leakage and monitor to determine leakage hotspots along the Mekong and the Ganges. Additionally, in India, provincial and local governments in Mumbai, Agra, and selected cities along the Ganges will receive support to create awareness and engage communities to stop plastic pollution and for sustained clean-up campaigns.

Plastic waste is also swept from drains and other areas by monsoon rains typically finding its way into oceans, via rivers. In fact, over 80% of the plastics in oceans is land based. Sadly, India's sacred river, the Ganges, is amongst the top 7 rivers carrying plastic waste to the seas. Two of the 4 identified cities are the living heartbeat of the Ganges, and one, the iconic city on the Yamuna, a tributary of the Ganges.

India's 7500 kilometer-long coastline (Schwartz 2005) is increasingly reported to be covered in plastics after tidal waves, storms and cyclones, disrupting the lives of coastal communities. As a result of this, India's oceans have so much plastics, there's even a garbage patch near the ocean Gyre off the Andaman Islands that's amongst the bigger ones in the world (Sesini 2011).

With India hosting the UNEP #beatplasticpollution campaign in 2018, several small shifts have taken place. First, the Prime Minister himself has committed to phasing out single use plastics by 2022. Second, several big institutions have also reduced their plastic consumption in anticipation of this. There is public debate about this issue, with most people still wondering how to recycle plastic instead of reducing it, as there is very little information available on the reduction and what single use plastics comprise. This creates a huge opportunity to leverage large scale behaviour change, using positive messaging and sharing the science of the damage of single use plastics in a lucid, captivating manner.

Asia is the main source of marine plastic. With the view to address this problem through research, outreach and targeted solutions, UNEP India launched the Countermeasures project in partnership with TERI, Chintan, National Productivity council and Development Alternatives.

In India, along the banks of river Ganga, the project aims to understand the on-ground reasons of plastic litter while conducting activities for awareness involving local harbingers of change. The project focuses on behavioral changes among the key stakeholders through a continuous process of community mobilization.

Agra, the city of Taj is not only one of the most favorite tourist places of India but one of the most densely populated as well. Agra was chosen as one of the sites for CounterMeasures project due to its pollution, proximity to Delhi and it being situated on the banks of River Yamuna which is also a tributary of river Ganga.

It is key to help build public understanding of the link between their consumption and plastics in oceans. We have tried to achieve this by underscoring the role of rivers as plastic dumps, flowing out into oceans. This project focusses on innovatively creating awareness and behaviour change amongst key stakeholders including youth, city level influencers, waste workers, and local government in Agra.

Youth and Women comprise a significant proportion of the constituency. We believe that by engaging with the youth via this campaign, we embed the idea of plastic reduction to save the oceans and rivers in a highly influential population segment, and one which will take important decisions in the decades ahead, consequently creating long term champions. The project will be based on robust partnerships to ensure a long-term city-based knowledge and expertise for sustainability. This proposal will address the challenge in the city of Agra.

OBJECTIVES

- To enable 200,000 identified stakeholders in Agra to understand the impact of plastics on rivers and oceans and therefore, directly and indirectly reduce plastic usage and improve plastic waste management.
- To demonstrate improved plastic recycling to prevent it from reaching the oceans by enabling 500 waste generators in the city to adopt waste segregation and linking them with recycling options for such waste plastics that are currently recyclable.
- To enable 50 waste pickers and small waste dealers to upgrade their work improve plastic waste recycling.
- To create 20 plastic reduction ambassadors to create an influential, long term ‘voice.’

SCOPE OF WORK

- Assessment to identify sources of leakage, gaps and countermeasures
- Outreach-Awareness and Action disbursed through city-wide campaigns
- Advocacy through stakeholders consultations for capacity building

METHODOLOGY

The approach Chintan used is as follows:

- Diversify the Base of stakeholders
- Evidence based awareness: workshops and trainings based on perception survey
- Improve plastic recycling practices like waste segregation and better handling of plastics
- Action from the people to give up any 1 single use plastic item
- Amplify Voice by nurturing ambassadors to lead the campaign
- Use all Media to drive awareness, build local capacity

ACTIVITIES

Agra generates about 40.89 ton of plastic per day as per CPCB’s report (2015). Clean-up drives were organized to not only sensitize communities and children on the actual on ground reality of plastic but also to understand the volume and nature of plastic that Agra generates. The cleaning drive involved collecting waste, segregating plastic from non-plastic and finally segregating as per different types of plastics. Two major drives with the project technical partner collected 1000kgs in total. Perception surveys were also created and were filled by around 1300 people. Both these activities ensured an understanding from the production as well as collection perspective, the study of the highest contributors to plastic pollution so that solutions which match the local issues could be developed.

Almost 20,000 people were part of these outreach activities in short span of four months. This included, 20 champions trained in mobile storytelling enabling them to capture 40 stories; mobilizing

of local stakeholders from 10 communities on single use plastics. The interesting sessions included ones with 50 waste pickers on safety and hygiene while handling waste and another with 400 tour guides. Media was extensively used to convey messaging on indiscriminate use of single use plastic and the activities conducted to mitigate it under the Countermeasures project. Chintan also worked closely with local government bodies including Agra Nagar Nigam and other affiliated bodies to ensure the successes of the project.

Activity 1: Perception Survey Study

Demographics of Correspondents: The perception survey was done to identify the key users of plastics and hence, the key plastic waste generators, as the following. These are called stakeholders or constituency:

- Households
- Shops
- Offices
- Schools

Activity 2: Clean-Up Activities and Campaigns

- 10 plastic waste collection drives conducted through participation of school children
- 5 campaigns by students
- 1 interschool events focusing on the solution to plastic pollution
- Created momentum for observing one NO PLASTIC DAY.
- “Take a pledge” activity run by youth participants and ambassadors
- Prizes were given as follows: For the school with best single use plastic waste reduction and students who collected the maximum amount of single use plastics.

Activity 3: Trainings & Workshops

- 10 workshops in schools to understand the challenge of plastic
- 10 workshops with waste generators
- 20 mascots/trainers created
- 50 waste workers trained on handling plastic better
- 400 tourist guides trained on pollution to Yamuna through plastics
- Identify 20 local ambassadors in Agra
- Drive engagement and participation via street plays
- Social and other Media- to communicate with the constituency through posters and other material

Activity 4: Media Outreach

The media was informed about the project and press releases sent for every workshop and campaign resulting in over 15 media posts in both English and Hindi in national dailies.

RECOMMENDATIONS FOR WAY AHEAD

- a. **Success factors/learnings for effective and sustained outreach and public engagement**

During the course of the project, Chintan reached out to diverse stakeholders such as schools, parents, residents' welfare associations, market associations, corporate sector, local governments, the hospitality industry and local influencers.

The learnings were:

- Awareness campaigns for plastics should be very focussed on targeted stakeholders
- Campaigns for public engagement should be customized to different audiences.
- Messages need to be repeatedly conveyed to the public and consequent behavioural changes monitored regularly for effectiveness.
- Data based campaigns are the most effective for impactful messaging leading to informed choices.
- Campaigns should take into account cultural practices.
- Youth and women need to be focussed on for an optimal impact.
- High quality design is important, as the message competes with many others.
- For public bins, colour coding should be accompanied with labelling and a list of items to be put in each bin preferably in pictures.

b. Policy recommendations

- Plug the loopholes: Non-woven bags should be explicitly mentioned in the definition of plastic carry bags since they are majorly made of polypropylene
- Green Procurement: Government, including state and municipality, and any initiative where government is a partner, must ensure that no plastics are procured for any use. These include foods in multi-layered plastics, single use plastics, flex banners, plastic decorations, or stationary. The list can be expanded per the local situation. A government order to this effect should be issued. This should also be part of any manuals and conveyed to procurement and finance. This will also influence mindsets.
- Inclusive Recycling: To ensure smooth plastic recycling, 'No objection certificates (NOCs)' should be issued to group of waste pickers or NGOs working with them to enable them to collect, segregate and facilitate plastic waste recycling. These groups must submit annual reports to show how much plastic waste was collected and where it is being recycled, in order to safely contribute to the waste recycling and be part of the solution, instead of only facing stigma Be inclusive: Waste pickers should be engaged and incentivized for collection of MLPs and other low value plastics to ensure that they are picked up and do not reach the landfill. This is part of existing policy. However, this requires capacity building.
- This will also contribute to their livelihood and inclusion.
- Build Capacity to Use the Legal Provisions: Primary responsibility for collection of used multi-layered plastic (MLPs) sachet or pouches or packaging is of Producers, Importers and Brand Owners who introduce the products in the market. They need to establish a system for collecting back the plastic waste generated due to their products. They can do this via PROs of waste pickers and others. It is important to train the ULBs on the law and specifically, these aspects.

c. Counter measures for plastic pollution

- It has been observed that green and blue bins are available in some areas in Agra. It is important that twin bins are distributed across waste generators so that source segregation can be initiated at a large scale.

- BTL (Below the Line) activity to be planned for Plastic related awareness campaign as people agree that they have seen lots of awareness campaign in their area but they know very little about impact of plastic on health and environment
- The data collected during the project should be made widely available as a downloadable product and via quizzes etc. on social media and other sources.

d. Sustaining project impact

This project is designed to continue after the funding period because of the external capacity being built at multiple levels during the project period. The following outcomes, already underway, are expected to ensure that the issue stays active:

- A shift in cultural attitudes towards plastics and pollution.
- A shift in the current 'impossible' attitude to an empowered attitude about single use plastics.
- Pressure on the government and private institutions to shift procurement policies to prevent single use plastics. Also shifts for vendors and caterers, who often use single use plastics for events.
- Expansion of the public discourse to include plastics at the same level as key environmental concerns, such as air pollution.
- Increased public understanding about the impact of their actions on oceans and holy rivers
- Increased media understanding of plastics in general and single-use plastics in particular, therefore increased ability to seek stories around it. This in turn keeps the interest sustained.
- Increased acceptability created around less consumptive lifestyles
- Increase in micro-enterprises making long-term, sustainable products as demands increase
- Ecosystem of support for civil society organizations in the field, for greater impact.

Our project contributes to this as follows:

- 200,000 trained informed youth, who will also build the capacity of their families, friends etc.
- Over 500 persons showed how plastic recycling can be improved via community actions.
- 50 volunteers who are to be master trainers
- Identified 20 local ambassadors in Agra and launched 2 orientation workshops for them. These will be enthusiastic influencers willing to invest time to monitor public action, talk about the issue, reach out to the media and keep the issue alive post project period.
- The close association with local NGOs like Ek Pahal, Unfold Foundation, Rising India, Spheeha, and CURE also ensures that local partners will keep the work ongoing.
- A better informed media with over 15 media hits during the course of the project.
- Leadership on the issue in key industries, such as hospitality and education. We have provided a list of best alternatives for single used plastics used in the hospitality industry. In education, we have given sustainable options of for use of plastic tiffin boxes and bottles, plastic cutlery in canteens and decorations.
- A socio-economically diverse base in Agra built upon for future action
- Chintan's website will be an additional resource that contains all training materials so that it can be used by others.
- Since the materials will be in Hindi and English, it is expected to be widely used by teachers in the coming years as a resource in India.
- Chintan spent a significant range of resources to build the capacity of local organizations. These are now embedded as resources in the city and are known to other actors.

City context/profile, objectives, scope of work and methodology

I. PROFILE

On 4th March 2019, the Government of Japan and UN Environment Programme announced that they would join hands in an effort to boost information and know-how to develop countermeasures against marine plastic litter in Southeast Asia and in India. The new initiative, *Promotion of countermeasures against marine plastic litter in Southeast Asia and India*, will develop a simulation model for plastic leakage and monitor to determine leakage hotspots along the Mekong and the Ganges. Additionally, in India, provincial and local governments in Mumbai, Agra, and selected cities along the Ganges will receive support to create awareness and engage communities to stop plastic pollution and for sustained clean-up campaigns.

Indians are using more and more plastic every year, with much of it being packaging, discarded almost instantly. The average Indian uses about 10 kilograms of plastics annually, which is 10% of the American usage (FICCI, Knowledge Paper on Plastic Industry for Infrastructure 2017). Yet, this is increasing, as the plastic packaging industry itself increases by as much as 16% annually and is valued at 32 billion USD (FICCI, A report on Plastic Industry 2016). Today, about 15,000 tons of plastic waste is discarded daily (CPCB, Overview of Plastic Waste 2013). If this was food, it could feed 1.1 million hungry people daily.

Despite a robust informal recycling economy, only 60% of all the plastic waste generated is recycled (CPCB, Assessment of Plastic Waste 2009), according to India's Central Pollution Control Board. Rest of the 40% is dumped, on mountain slopes in the Himalayas, and along or in rivers, in the plains. Plastic waste is also swept from drains and other areas by monsoon rains typically finding its way into oceans, via rivers. In fact, over 80% of the plastics in oceans is land based.

Sadly, India's sacred river, the Ganges, is amongst the top 7 rivers carrying plastic waste to the seas. Two of the 4 identified cities are the living heartbeat of the Ganges, and one, the iconic city on the Yamuna, a tributary of the Ganges.

India's 7500 kilometer-long coastline (Schwartz 2005) is increasingly reported to be covered in plastics after tidal waves, storms and cyclones, disrupting the lives of coastal communities. As a result of this, India's oceans have so much plastics, there's even a garbage patch near the ocean Gyre off the Andaman Islands that's amongst the bigger ones in the world (Sesini 2011).

This requires urgent action, for India's oceans are a hotbed of biodiversity that is already under threat from climate change. They are the source of food and livelihoods for coastal communities. If plastics continue to enter the waters, an irreversible double whammy will deprive the planet of its underwater wonders in the Indian Ocean and Bay of Bengal.

On the other hand, India has a strong, diverse culture of using and re-using sustainable materials. It is still not unusual to find certain foods wrapped in leaves, old cloth used to mop floors after being discarded and old bottles being used to store drinking water. This, however, is being fast eroded as plastics penetrate markets and are perceived to be 'modern' and progressive. With a nascent 'roots' movement, where traditional lifestyles and local foods, popular just 20 years ago are being revived, it is possible to effectively talk about reducing the use of plastics across the country.

Agra, the city of Taj is not only one of the most favorite tourist places of India but one of the most densely populated as well. Agra was chosen as one of the sites for Counter Measures project due to its pollution, proximity to Delhi and it being situated on the banks of River Yamuna which is also a tributary of river Ganga.

This project will focus on innovatively creating awareness and behaviour change amongst key stakeholders including youth, city level influencers, waste workers, and local government in 4 cities. Women will comprise a significant proportion of the constituency. The project will be based on robust partnerships to ensure a long-term city-based knowledge and expertise for sustainability. This proposal will address the challenge in the city of Agra.

II. OBJECTIVES

- To enable 200,000 identified stakeholders in Agra to understand the impact of plastics on rivers and oceans and therefore, directly and indirectly reduce plastic usage and improve plastic waste management.
- To demonstrate improved plastic recycling to prevent it from reaching the oceans by enabling 500 waste generators in the city to adopt waste segregation and linking them with recycling options for such waste plastics that are currently recyclable.
- To enable 50 waste pickers and small waste dealers to upgrade their work improve plastic waste recycling.
- To create 20 plastic reduction ambassadors to create an influential, long term 'voice.'

III. SCOPE OF WORK

Assessment

- Research and stakeholders' consultations to identify sources of leakage, gaps and countermeasures
- Perception survey at household level to identify the sources as well as behavioural pattern of the communities
- Information gathered by the scientific study

Outreach-Awareness and Action

- Outreach material will be disbursed through city-wide campaigns using radio programmes, talk shows, social media platforms, plays, and cleanliness drives
- IEC Material designed for specific stakeholders – my school campaigns for school children, waste to wealth concept for RWAs, businesses and for tourist hotspots
- Institutionalisation of activities with ULBs and schools in the area - engagement in cleanliness activities through creative expression and hands-on activities. Bridging the Information Gap sessions with different stakeholders – school students, RWAs, Tourists, Hospitality sector, Communities around the Yamuna.
- Plastic refuse and river/coastal clean-up activities
- Interface meetings to establish contact, mobilise communities towards No Plastic Day
- Involvement of local government, civil authorities, and media houses
- School children to be made mascots for the city wide campaigns
- Collection of visual records before and after intervention

Advocacy

- Stakeholders consultations at city-level and national-level
- Capacity building of the local government stakeholders on systemic and responsible waste management in cities

IV. METHODOLOGY

The approach Chintan used is as follows:

- **Diversify the Base:** Reached out to diverse stakeholders such as schools, parents, residents' welfare associations, market associations, corporate sector, local governments, the hospitality industry and local influencers. In each case, the focus was on youth and women for optimal impact.
- **Evidence based awareness:** Two forms of evidence was used to design the awareness. First, results from the perception survey. Second, science-based evidence to explain, in an engaging way, the data around plastic pollution to various constituencies, to cajole them to act.
- **Improve plastic recycling practices:** Enabled 2000 people to segregate their waste to demonstrably minimize plastic dumping and increase recycling. Enabled 50 waste workers to upgrade their work for better plastic waste handling.
- **Action from the people:** Motivated the constituency to give up any 1 single use plastic item
- **Amplify Voice:** Nurtured 20 ambassadors to lead the campaign during and after the project
- **Use all Media:** Collaborated with and used print and social media to create excitement about the campaign, drive awareness, build local capacity and share peer successes to scale up action.

ACTIVITIES

Activity 1. PERCEPTION SURVEY STUDY

- **Demographics of Correspondents and how was the target group identified**

The following points were noted regarding the demographics of the correspondents:

During the household survey the team collected 1215 responses from households including, 383 in SEC-A, 388 in SEC-B, 444 in SEC-C.

Age: The survey respondents included individuals from different age groups between 15 to 85+ years.

A total number 547 respondents fall between the age brackets of 26 years to 45 years and also 135 number of respondents make up the younger population of less than 25 years.

Next higher population is made up of the age group of 45 years to 55 years above consisting of a combined total of 533 number of respondents

Row Labels	SEC A	SEC B	SEC C	Grand Total
25 years or less	31	44	60	135
26 years to 35 years	47	71	110	228
36 years to 45 years	103	103	113	319
46 years to 55 years	109	88	72	269
More than 55 years	93	82	89	264
Grand Total	383	388	444	1215

EDUCATION PROFILE: The highest number of illiterate respondents (133 respondents) is seen in the SEC-C category and highest number of higher educated respondents(342 respondents) are seen in SECA combining graduate, post graduate, class 12 pass categories.

Significant number of dropouts are seen in the SEC C category.

Row Labels	SEC A	SEC B	SEC C	Grand Total
Dropout/no formal education	0	26	50	76
Graduate	139	24	23	186
Higher secondary / Class 12 pass	58	68	48	174
Illiterate	0	8	133	141
PhD / post doctorate	37	5	2	44
Post graduate	108	4	2	114
Primary / Class 4 pass	2	52	50	104
Secondary / Class 10 pass	35	90	46	171
Upper primary / Class 8 pass	4	111	90	205
Grand Total	383	388	444	1215

PROFESSION DETAILS: Most of respondents in the SEC-A category are businesspeople (149 respondents) and there is a significant number of people in that category who are in government service. However, majority of the respondents in the SEC-B and SEC-C category are daily wage workers. It is seen 63 respondents from SEC –A category caters to professional/doctor category respondents more than that of SEC-B and SEC-C. Housewives and private service consist of second number of respondents in SEC-C category (68 respondents)

Row Labels	SEC A	SEC B	SEC C	Grand Total
Business	149	84	38	271
Daily worker	6	115	172	293
Govt. service	78	16	12	106
Housewife	5	44	68	117
No work	15	36	62	113
Private service	42	64	68	174
Professional / Doctor	63	12	12	87
Retired	4	3		7
Student	21	14	12	47
Grand Total	383	388	444	1215

FAMILY MEMBERS: Maximum of number of respondents within SEC-C category have 4 or more than 4 family members (343 respondents combining 4 to 6 family members and 7 to 10 family members), followed by SEC-B (327 respondents combining 4 to 6 family members and 7 to 10 family members) and then followed by SEC-A

Row Labels	SEC A	SEC B	SEC C	Grand Total
Between 1 to 3	39	41	63	143
Between 4 to 6	201	215	225	641
Between 7 to 10	101	112	118	331
more than 10	42	20	38	100
Grand Total	383	388	444	1215

Selection of Target Area

Areas were identified near the Taj and based on SEC category

Areas to cover:

<u>Sec A</u>	<u>Sec B</u>	<u>Sec C</u>
Kamla nagar	K.K. nagar	Loha mandi
Dayal Bagh	Sikandara road	EID gah
Jaipur house	Belan gang	Mantola
Near Shah market	Balugung	Madhu nagar
Jawahar nagar	Taj gunj	
	Near Mangameswar mandir	

• TOOLS USED TO COLLECT RESPONSES

Quantitative survey

- Household / plastic waste generator survey
- Collector end survey

Qualitative survey

- Focused group discussion (FGD)
- Interview with stakeholders

Quantitative survey

The mobile survey app- Trackbee, the proprietary survey app was used to collect data. All enumerator used their mobile phone to install this app and collected the online as well as in offline mode. At the day end they synced their surveys with server. Necessary validation logic were implemented in the questionnaire to endure valid data get captured into the system.

A backend team was put in place to monitor the quality of the data on real time basis.

Qualitative survey

Direct face -to-face interview: FGDs were conducted with various stake holders like school students, shop owners, housewives, waste vendors, service professionals.

PERCEPTION ABOUT LEAKAGE POINTS AND PATHWAYS

- Stakeholders across the different walks of life and others who are directly depend upon waste collection agree that there is a decrease in plastic waste in Agra. The awareness among different sets of stakeholders has increased about plastic and its harmful effects but people are unable to adapt alternatives as they are either unavailable or very expensive
- Lack of mechanism and non-availability of credible replacement item to plastic is something which needs to be addressed
- The fact that all stakeholders are aware that burning plastic is dangerous and it can cause greater harm to the environment by clogging the sewer lines, death to animals by eating plastic. They believe that the government is in active connivance with plastic companies and not doing anything to reduce plastic.
- The greater absence of unity among people and awareness has not led to reducing plastic in greater level.
- Many respondents are of the opinion that government should close down plastic factories before going for any another plan
- Stakeholders understand the importance of Agra as a tourist destination and its importance on their local economy. Many believe that if plastic pollution is not mitigated, it will reduce the flow of tourists and affect them economically
- Lack of knowledge about Solid Waste Management Rules, 2016 and 3R's have increased dumping in the areas further more

Pathways:

- Misconceptions hampering the reuse of plastic bag as many feel it is unhygienic.
- Lacking of active Source Segregation and Plastic Recycling Units which is not increasing the value chain of the stakeholder leading to the increase of dumping of plastics.
- Awareness campaign initiation not getting the visible impact as it supposed to be because of the intended target audience are not part of the campaign (housewives, school students, professionals)
- Open sewerage or drains are a big pain point as plastic tend to end up clogging it due to the utter negligence and carelessness of the people around the city
- Active Doorstep Waste Collection is found in high profile areas leaving the economically neglected areas unchartered and viable to creation of plastic waste

RECOMMENDATIONS FOR COUNTER MEASURES

- It has been observed that green & blue bins are available in some areas. It is important that twin bins are distributed across waste generators so that source segregation can be initiated at a large scale.
- BTL (Below the Line) activity to be planned for Plastic related awareness campaign as people agree that they have seen lots of awareness campaign in their area but they know very little about impact of plastic on health and environment

Activity 2. CLEAN-UP ACTIVITIES AND CAMPAIGNS

- **Description and rationale for selection of stakeholders/participants and locations**
Based on previous campaigns in various cities and the experience of the last few years, we understand that working with youth as change agents is a key way forward to spreading awareness and behaviour change. In 2008, '09 and '10, Delhi's first campaign against plastic bags was youth driven, resulting in the city's initial policies to limit plastic bags. Since then, issues of air pollution, stopping fire-crackers (as they are polluting and based on child labour), composting, conserving water and protecting trees-all these high-profile campaigns have seen active participation and innovation by the youth and had impact across India. Based on its understanding that the youth are key drivers for change, the Government of Delhi's Environment Department, based on its internal research (not available for public use) has invested funds in almost 2000 Eco Clubs in schools to ensure its mandate of making change reaches the grassroots. Even the Prime Minister instituted a programme for youth this year, for work on waste. Hence, while there is little academic research available, Chintan's methodology is based on several previous experiences in Delhi city and precedence by key policy makers.

We proposed working with schools and colleges as they are an organized means of reaching out to youth.

This project focused on innovatively creating awareness and behaviour change amongst key stakeholders including youth, city level influencers, waste workers, and local government in Agra. Women comprised a significant proportion of the constituency. The project was based on robust partnerships to ensure a long-term city-based knowledge and expertise for sustainability. So, behavioral change among the key stakeholders through a continuous process of community mobilization was a significant part of the project.

The locations chosen for workshops and trainings were also focussed on reaching out to a judicious mix of high, middle and low income families and the trainings were customized accordingly in both English and the vernacular, Hindi to reach a wide section of the audience.

Chintan has often received audience comment on existing plastic. Instead of letting the project constituency feel daunted by this, we have converted this into positive, public actions that harvest the knowledge, motivation and pulse generated by the awareness drives.

- **Description of activities- (*Attached methodology for pilot clean up activity in Annexure 1*)**

The activities carried out were:

- 10 plastic waste collection drives conducted through participation of school children across schools
- 5 campaigns by students to reach out to other actors to convince them to give up one plastic type for the sake of the oceans and rivers via marches, talks by children in offices etc.
- 1 interschool events focusing on the solution to plastic pollution.
- Created momentum for observing one NO PLASTIC DAY.
- "Take a pledge" activity run by youth participants and ambassadors – at least 1000 pledges by the end of the programme. The pledge was giving up at least 1 plastic type and convince 2 other people. It was in the form of pledge boards, on-line on social media.

- Prizes were given as follows: For the school with best single use plastic waste reduction and students who collected the maximum amount of single use plastics.

CLEAN UP DRIVE AT HAATHIGHAT

As a part of one such initiative, Chintan in partnership with National Productivity Council and CURE, an Agra based NGO, launched a pilot clean up activity on the banks of Yamuna on 6th of November, 2019.

The main objective of the activity was to involve the community in cleaning up their own area and create awareness about the daily use of plastics and its implications on people as well as on the environment, to make people conscious about the amount of plastic wastes daily coming out- which is not only affecting their health but also the health of the environment. Around 70 people participated in the clean-up program and people from all age groups and diverse socio-economic backgrounds enthusiastically joined in. The program started with a brief introduction of the activity and the objectives behind that. The first phase was about the collection of wastes from the Haathighat area which added up to 36 sacks of wastes. The second phase started with the segregation of the plastic and non-plastic materials from the wastes which amounted to roughly 15 sacks. The third stage was the segregation of plastics according to their type. In every stage weighing was done.



Figure 1 Collection of waste



Figure 2 Segregation of waste

Each sack needed to be completely segregated from the rest as it turned out to be having different types of plastics including packaging material of tobacco, biscuits, surf excel; milk pouches; water pouches; disposable cups; multi-layered plastics; polypropylene bags; sleepers; medicine packaging etc.

Altogether, 16 varieties of plastics were collected. As the activity was done on the Yamuna bank where people come for religious purposes, the typical materials that were found specific to this particular location were plastic chains and plastic photo frames of Gods. In the final stage, counting of the number of each type of plastics was done and polybags of different types had the maximum number.

The program continued almost for five hours, and after the cleaning drive a significant change in the area could be visible. All the wastes which were collected were handed over to the Agra Nagar Nigam workers for safe disposal.

Plastic Type	Quantity (in nos.)	Weight (in kg) with black trash bag
Milk Pouches	12	0.057
Water Pouches	58	0.095
Disposable Cup	41	0.104
Multilayer Plastic: e.g. Namkeen Pouches, Snacks, Biscuits etc	184	0.761
Plastic Bottles: e.g. Bisleri, Cold Drinks	5	0.068
Soap case, razor toys Plastics (Hard Plastics) Bottles caps	27	0.253
Ritual Material e.g. Plastic Chains, Gods frame, Plastic moulds	32	0.595
Low density plastic packaging material e.g. Tea packs, Sanitary packs	38	0.108
Cloth type-polypropylene Bags	30	1.702
A-Thin	154	0.867
B-Moderate	252	-
Plastic Sheet & other thicker plastic bags. Color-Black & White	100	
Readymade dress packing	18	0.11
Rubberised sleeper	2	0.178
Plastic tubes E.g Dant kanti, Facewash cap	2	0.015
Medicine Packaging	1	0
Packaging Material e.g. Tobbaco, Biscuit,Safal, Surf excel, Rusk	136	-

Source: NPC



Figure 3 Before Clean Up



Figure 4 After Clean Up

Plastic Items found in Clean Up Activity



Figure 5 Plastic packaging



Figure 6 Plastic beads and jewelry



Figure 7 Plastic Bags



Figure 8 Polythene wrappers

CLEAN UP DRIVE AT POHIYA GHAT

In order to achieve the objectives of this project and to bring a greater positive impact in the society, Chintan conducted a cleanup drive on Pohiya Ghat, Agra in partnership with National Productivity Council, CURE, SPEEPHA and Rising India to gather scientific knowledge on marine plastics litter and effective counter measures.

The activity was conducted with participation of school and college students. As many as 55 school children of Ek Pahal Pathshala and 60 B.Com distance students of DEI Agra City Center enthusiastically participated in the drive from 9.30 am on a chilly morning. The work was carried out on banks of Pohiya Ghat till 4pm. Around 600 kg of waste got collected from the site; some ten different types of plastics were identified from this source. All segregated waste was collected by Dayal bagh Nagar Panchayat collection vehicle. The pre and post activity difference is visible in the attached pictures.

Such drives are instrumental in creating awareness and behavioural change amongst key stakeholders including school kids, youth, city level influencers, waste workers, and local government in the city of Agra, and making them champions of behavioural change.



Figure 9 School children volunteers in Drive



Figure 10 Before Clean Up



Figure 11 After Clean Up

Collection Drive at Idgah

A collection drive was organized on 29th January in Nagla Fakirchand, Idgah. 25 community members participated in the drive and the Agra Nagar Nigam people also took part in this and after the collection, they dumped it in their truck and cleaned the area. A particular area near a school was selected for the drive and people of all age groups collected the plastic wastes. Mostly polythene bags, wrappers of chips, biscuits etc. were there.

After the collection drive oath was taken by the community members to keep their area clean and whoever dumps wastes they will be charged fines by Agra Nagar Nigam. The youth of that area were excited to take the responsibility and discuss this issue with the shopkeepers to stop them from using polythene bags.



Figure 12 Clean Up Volunteers



Figure 13 Waste Collection



Figure 14 Before Clean Up



Figure 15 After Clean Up

Collection drive at Tajganj

A second collection drive was organized on 2nd February in Tajganj. More than 50 community people actively participated in the drive. It started from 8 am. People from all groups participated in this. The Agra Nagar Nigam workers were also there to help them. Mostly polythene bags, bottles, straws, wrappers of chips, biscuits etc. were there. As they cleaned the area by themselves the community people took an oath to continue the cleaning activity every Sunday. They have also pledged to reduce the usage of items having single use plastic in it. After the drive all the waste was collected by the Agra Nagar Nigam.



Figure 16 Community participation



Figure 17 Before Clean Up



Figure 18 After Clean Up

CAMPAIGNS

Drawing competition

Two drawing competitions were organized in January, 2020. On 10th of January a drawing competition was organized in a school in the primary school of Basai Kala, Tajganj with 38 children (29 girls and 9 boys). The ward councilor Mohan Singh Lodhi's presence in this event encouraged the children. Before starting the competition the problem of plastic pollution and its impact was discussed with the children to make them understand the severity of the situation. The children then used their imagination to produce a picture of the reality.

The main objective of involving the children in the community mobilization process was to take a step forward for a better future and children are the future of the society. Children also adopt new leanings quicker than grown-ups. To make them participate in this process was important. Three drawing competitions were arranged in three slums, a specific theme on plastic pollution was given to them and within a given time they transformed their understanding and imagination on the paper through drawings. Mostly children from class III to VIII were included in this competition. Certificates and prizes were distributed to them.

In Tajganj children actively started working to reduce the usage of single use plastics, and started stopping people carrying plastics in their way and requesting them to use sustainable alternatives.



Figure 19 Drawing competition at Tajganj

Another competition was organized on 28th January, 2020 in Amar Shaheed Public School in Hariparwat. 31 children participated in the competition. As the children were matured enough to understand the current situation and the crisis due to plastic they have promised to reduce the use in their houses.



Figure 20 Drawing competition at Amar Shaheed Public School, Hariparwat

Republic Day Celebration at Basai Khurd, Tajganj

An art workshop was organized on 26th January, 2020 in the school of Basai Khurd, Tajganj where drawing competition was arranged in the previous month. In this workshop the children used different types of waste plastics to make decorative things and they arranged an exhibition. They started spreading the message on dangers of using single use plastics in their community.



Figure 21 Children making innovative products from waste plastics in workshop

A significant change has been seen in three streets of Khera near to Basai Khurd where the children live. They have started stopping their parents from using polythene bags and they have started making cloth bags with the old cloths as an exercise for home science subject and distributing them in the community. A significant observation has been that earlier the drains in the colony used to get filled with plastics, and now it has changed.



Figure 22 Cloth bags made by children

As Republic Day celebration, the residents of ADA Heights arranged an event where the children of the apartment participated and then they discussed about the growing problem of plastics and ways to reduce it.

They have taken a decision to make a composting pit in their compound. They had pointed out their problems such as vegetable vendors who come to the compound always carry polythene bags with them; as a result all the residents use them. Some of the houses throw their wastes from their floors.

As a solution, cloth bags have been provided to them, and the security guards have been instructed not to let the vegetable vendors enter with the polythene bags, cloth bags are distributed to them as well and they have made it mandatory that those residents who are taking the bag from the vendor will return them the next day. Moreover in the household level they have taken few steps to reduce the plastic use, instead of polythene bags they are using paper to store their wastes, they are reusing the plastic items which are reusable, disposal of plastics in a proper place have been taken care of by them.

Maha Swachhta Rally on decreasing plastic usage

On 12th December a Maha Swachhta Rally was organized by Agra Nagar Nigam (ANN) authority from Agra College to ANN, where Mayor Naveen Jain, 10 other NGOs, ward councilors of different wards, around 50 SHG groups, people from Army camp, NCC Camp and students schools and colleges participated. Around 10000 people took part in the rally. The schools came with their musical bands and they made different posters which were displayed. They gave slogans like “Plastic ko hatana hay, desh ko bachana hay” etc. Volunteers of our intervention areas also participated in this rally. The



Figure 23 Maha Swachhta Rally

impact of this rally was great. This rally helped to spread the awareness among every section of people in the society.

Rally for awareness on plastic pollution

The community people, volunteers, and students of Idgah took out an awareness rally on 17th February on say no to single use plastics, where almost forty people of the community participated. Most of them were young. The rally was flagged off by the former ward councilor of Idgah.

The main objective of this rally was to spread awareness among the people about plastic pollution and the members made several different placards on the theme. The rally started from the slum of Nagla Basi, and it went through Nagla Fakirchand till the vegetable market in Idgah. As earlier the community people complained about the vegetable sellers who used polythene, they wanted to make the sellers aware of the negative impact of that. A short discussion on the impact of single use plastic and the government initiatives happened on the market. Cloth bags were distributed to the vegetable



Figure 24 Rally at Idgah

sellers by the volunteers by the end of the discussion, so that they could stop using polythene plastics. The sanitation inspector of Idgah has also taken the responsibility to reduce the usage of single use plastics, and fines would be charged if polythene is used by the sellers in the

market. All the community people pledged to reduce the usage of plastic. The rally was highly successful due to the participation of the youth and their initiatives.

Box 1
Wall painting at Tedi Bagiya Primary School

A small but effective effort was made by the students of Tedi Bagiya Primary School to reduce plastic pollution through wall painting. A clean wall was chosen in slum of Lagre ki Chowki. As the children were getting to know about the facts of plastic pollution they wanted to take an innovative initiative of community mobilization so that the messages can directly go to the people.



Box 2

Awareness through making Christmas decorations at Idgah

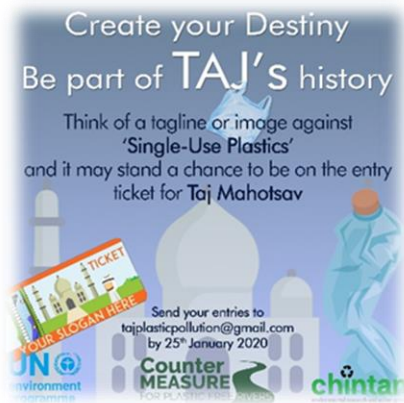
A unique style of Christmas decoration was done by the children of the community in an area of Idgah on 24th December, 2019 where the children have used the wasted plastics as the main material for every detail of the decoration. For example, the Christmas tree was prepared by plastic glasses, newspapers; old wasted pipes were used to make Santa Claus, other decorative items were made by plastic bottles and disposable plates. The community people came to see the decoration and appreciated the efforts of the children. Children explained the objective and details of the work they did. This event gave them an idea to reutilize the wastes. The enthusiasm of the children made the event successful



Christmas decorations from waste plastics

Taj Mahotsav event

The Taj Mahotsav is celebrated every year in Agra from 18th to 27th February at Shilpgram and organised by Uttar Pradesh Tourism. This 10 days long carnival is a vibrant platform where about 400 artisans from different parts of India display India's rich arts, crafts, cultures, cuisine, dance and music. This festival was a great opportunity to reach out to a wide range and number of visitors as well as small businesses that set up stalls at the event.



Chintan kick-started the event activities by launching a Taj Mahotsav ticket caption campaign on social media and the UP Tourism website. This was aimed at getting people to write a slogan on single use plastics and featuring the best on the Taj Mahotsav ticket which would be seen by thousands of visitors to the event. The campaign garnered a huge response of over 200 responses and the best of the slogans was chosen and displayed on the ticket.

“Chhodo single use plastic aaj, tabhi saaf rahega hamara Taj”- was chosen as the best slogan and displayed on ticket.

Figure 25 Taj Mahotsav Ticket Campaign

The event activities coincided with the visit of the Deputy Executive Director, Ms. Joyce Msuya of UN Environment Programme to Taj Mahotsav on 20th February, 2020. Chintan put up a stall to showcase the progress of the project and various activities were undertaken to meet the objectives of the project.

At the onset Ms. Msuya inaugurated the pledge board saying no to single use plastic displayed at the kiosk manned by Chintan volunteers. Various Ambassadors were introduced to the DED, who pledged to continue spreading the message against SUPs. Several volunteers of school and college of DEI were present at event making visitors aware of alternatives to SUPs and making them take a pledge against use of SUPs.



Figure 26 Street Play by Mascots

The kiosk also displayed various banners and posters against single use plastics and its alternatives for public information. The pledge board was also signed by hundreds of visitors to the kiosk vowing to give up using single use plastics in their daily lives and switch to eco-friendly alternatives.

Films on marine plastic litter made by Chintan were also continuously played at the kiosk on large display screens both in English and the local language, Hindi and attracted a lot of people to the kiosks. Announcements were also made over the public address system throughout the day to educate the public on not using single use plastics.

Student volunteers from Dayalbagh Educational Institution carried out a mime to spread the message of how plastic litter is creating havoc for marine life.



Figure 27 Sticker at Stalls against SUPs

Under this project, Taj Mahotsav in partnership with UP Tourism had declared the event single use plastic free. Chintan along with UP Tourism certified the stalls plastic free and discussed with the owners sustainable alternatives like cotton and jute bags for packaging.

Some stalls were also educated about the non-woven plastic bags that were mistaken for cloth and were being used rampantly. The stalls that reduced single use plastic (SUP) usage and were certified SUP free.

Ms. Msuya presented four school students Aryan Verma from Sun Flower school, Khushi from Ek Pahal Pathshala, Shaurya Chaudhary from Prelude School and Bhawna from Sumit Rahul School with medals and certificates for promoting waste segregation activities through collection drives conducted in various schools of Agra. CBS School Dayalbagh was awarded the trophy for winning this interschool competition.



Figure 28 DED presenting certificate for promoting waste segregation activities to school volunteer

Tourist guides who had been earlier trained by Chintan team interacted with visitors to spread the message against reducing usage of plastics and its ill effects on the Taj and the Yamuna.



Figure 29 Deputy Executive Director, Joyce Msuya with volunteers and partners at event

A gathering of over 100 volunteers was there on 20th February on DED visit comprising of plastic mascots, Ambassadors from diverse fields, and tourist guides were present at event to educate the public throughout the day on reducing plastic consumption.

Outreach Material in English and vernacular

A lot of outreach material in both English and the local vernacular, Hindi was created for this project in the form of posters, banners, fliers that were largely used in social media and in trainings. **This is attached in Annexure 2.**



Figure 30 Posters

Videos

1. Zero Waste Challenge video: <https://we.tl/t-R1OjCT6I9B>
2. Impact Video: <https://we.tl/t-yuXuQYnOOi>

YouTube links:

1. Zero Waste Challenge video: https://youtu.be/4Jxmf_X0cfk
2. Impact Video: <https://youtu.be/YLUVv4iNITs>

Campaign outcomes

The various campaigns by volunteers from schools and colleges, and people from diverse backgrounds like doctors, social activists, principals and teachers of schools etc. was hugely successful in garnering public attention to the topic of single use plastics and its dangers. The public enthusiastically participated in rallies against it and in signing pledges to give up single use plastics and influence other people to do so as well. Shopkeepers at events pledged to make their businesses plastic free and use sustainable alternatives like cloth, jute etc. Various stakeholders have pledged to make the project sustainable and make Agra plastic free.

Activity 3: TRAININGS & WORKSHOPS

Trainings conducted:

- 10 workshops in schools to understand the challenge of plastic and identify alternatives the youth can use and propagate for 3 common plastic types.
- 10 workshops with waste generators to segregate waste including training local enthusiasts to monitor it.
- 20 mascots/trainers created from mothers' group, teachers and youth across geographies for explaining the challenge of plastics.
- 50 waste workers trained on handling plastic better
- 400 tourist guides trained on pollution to Yamuna through plastics

Details of training conducted- number of events, locations, and number of persons trained at each event and cumulative figures

Number of Events	Locations	No. of persons trained
I.	Communities	
1.	NaglaFakirchand slum in Idgah on 2nd December, 2019	150
2.	KoyelaBasti of Langre Ki Chowki on 9th December, 2019	100
3.	HIG area of ADA Heights, Tajganj on 15th December, 2019	100
4.	AmbedkarBagichi, Tajganj	100
5.	NaglaPaima in Tajganj on 28th of December.	177
6.	Vaivhao Vilas in Hariparwat, HIG apartment on 12th January	80
7.	TajNagari, phase 1 and this was a MIG area on 25th Jan	90
8.	Panchvati Parsunath, Fatehbad Road, Taj Nagri, Phase-ii on 25th Jan	120
9.	Aparna Apartment, Old Vijay Nagar on 2nd Feb	170
10.	Mahaveer Nagar, Krishna colony, 11th Feb	150
II.	Schools	
1.	Sumit Rahul Goel Public School, Kamla Nagar on 13 th November	1003
2.	St Mark School Wazipur on 14 th November	210
3.	Ek Pahel Pathshala Dayalbagh on 14 th November	250
4.	REI school, Dayalbagh, Agra on 3 rd December	250
5.	PV Primary school, Dayalbagh on 4 th December	450
6.	MM Sherry School, Kamla Nagar Agra on 5 th December	200
7.	CBS school Mau Road, Khandari on 7 th December	290
8.	Sun Flower School, Elora Enclave on 9 th January	300
9.	Little Angles school, Rambagh, Agra on 2 nd March	250
10.	Saran Ashram School, Saran Nagar, Agra on 4 th March	210
III.	Tour Guides	400
IV.	Waste Workers	50
Total number of direct beneficiaries		5000

Community trainings

The use of plastic in our everyday life has become such an essential part that rejecting single use plastics from daily life is a difficult process for people. Community mobilization is an important aspect of that process through which they can understand the total amount of plastic waste they are generating every day. Three main locations Tajganj, Idgahand Langrekichowki were selected for the awareness program that includes HIG, MIG and the people of slums.

Meeting with ward councilors, social workers, womens' groups, Principals in schools, Anganwadi workers and Asha workers was initiated for greater stakeholder participation and involvement for long term sustainability of the project.

The persistent pollution by single use plastics is causing a severe problem in the city of Agra. Every inch of the road, open ground is covered by plastics and wastes and this is increasing every day. There is no one-size fits all solution to that, except to initiate rigorous green crusade that starts off with the community and their participation right from the household level. After the first month of workshops and regular meeting with the community people, some significant changes were visible in the perception of the communities. The participation of women and children was impressive. They began to realize the severity of the problem and consciously started taking steps towards its solution and helping in spreading awareness. Even the local government schools and the local authorities have provided their assistance in this program.

Ward councilor meeting

The program started off with a meeting with the respective ward councilors and they were given a brief of the work that is going to be done in this project. For Idgah Mr. Kamlesh Sen; for Langre ki Chowki Dr. Krishna, Ashoke Kumar (ward no. 13) and Neha Gupta (ward no. 51) and for Tajganj Lohan Singh Lodhi (ward no. 72) were contacted. After getting permission from them the interaction with the community people started. Beside this, meeting with social workers, principals of schools in the community, Anganwadi teachers and ASHA workers helped in the process of understanding the community better. As the use of plastic for men and women are different, for some of the areas interactive session with the women of the community was also organized.

Women's meeting

The type of plastics used and its consumption varies between men and women. In Agra it was important to understand the perception of housewives as well since they could be potentially major change makers. So, a meeting was held on 20th of December, 2019 where women participated in the meeting to understand the plastic problem. A general discussion was held on the type of plastics they use regularly and its impact on health of the environment and humans. They took an oath to reduce the usage of single use plastics and they have taken the initiative to make cloth bags and distribute it in the community from next month.



Figure 31 Women's meeting on Plastics

Workshops with the waste generators

The first workshop was organized in Nagla Fakirchand slum in Idgah on 2nd December, 2019. The main objective of this workshop was to make people aware of the present situation of plastic pollution. Both adults and children from Nagla Fakirchand, Nagla Basi and Bagnanakchand. Presentation on the topic of plastic pollution which includes the concept of waste segregation and impact of single use plastics was presented to the community people. The youth actively participated in the discussion. Followed by this an interactive session was arranged where the community people shared their views on this topic and they came up with different solutions to reduce the daily usage of single use plastics. A group of volunteers has been formed in Idgah who are taking the message forward and are actively reducing the usage. They are stopping their parents to use the plastic bags and they have spoken to the vegetable sellers who come to that area regularly and requested them to ban the plastic bags.

Savita Kumari, 80 years old of NaglaFakirchand slum said “I never use plastic items since in our times there were no plastics. I find it better to use steel vessels as they last longer than the present day plastic items.”

A food vendor influenced by community members at Idgah has stopped using plastic cutlery and replaced it with steel cutlery.

The second workshop was organized in Koyela Basti of Langre Ki Chowki on 9th December, 2019. A detailed interactive discussion was done on waste segregation and plastic waste and people also participated in the discussion. They talked about the present scenario of their community where the drains and ponds were choked with plastics. Though Agra Nagar Nigam is supposed to do the cleaning, but the ANN workers do not come to the slum area to collect the wastes, and there is no provision of dustbins in these localities. So, the community people are trying to convince the ward councilor for his help.

The third workshop was organized in an HIG area of ADA Heights, Tajganj on 15th December, 2019. Here most of the people were fully aware of the negative impact of plastic use, but most of them were not interested to work on it and the waste collectors of the apartments do not segregate the waste. A discussion was done with the residents of ADA Heights and the interaction with them was very helpful.

In this community, high education levels has made few of them adopt composting for their organic waste and few households have taken the initiative to stop using single use plastics. Many residents discussed about the biological hazards contingent upon plastic usage and they themselves promised to take an initiative to segregate wastes. It was also found that the central problem they are facing is the output of waste segregation. They want an agency to work for the recycling of the wastes as Agra Nagar Nigam has not provided them proper dustbins and recycling mechanisms. So they have been dumping their waste in a nearby open ground without any segregation.

After the workshop 6 women have taken an initiative to make a composting pit in the society which will be used for the disposal of all the organic waste coming from the houses.



Figure 32 Composting at household level



Figure 33 Dumping ground of ADA Heights

Fourth workshop was organized in the slum of Ambedkar Bagichi, Tajganj. A large number of people participated in the meeting. The participation of the people in the workshop made it successful and immediately after the presentation, the children influenced by the discussions, started collecting the wrappers and cups in the community.



Figure 34 Children collecting plastic waste at Ambedkar Bagichi, Tajganj

Fifth workshop was organized in the slum of Nagla Paima in Tajganj on 28th of December, 2019. After the discussion on the impact of plastic use a small play was performed by the students of Laddu gopal school and the teachers of this school gave us huge support. In this meeting school teachers, students, community people, ASHA workers have participated and they have taken the initiative to spread awareness. As teachers and ASHA workers interact with the students and local people every day they include the topic of plastic pollution and its impact on health in every discussion. The children of the community have become so conscious about the situation that they themselves are fighting to reduce the plastic use and stopping the community people to use it, and small clean up drives around the school premises have started.



Figure 35 Clean up drive at Nagla Paima, Tajganj

From the interactive session with the community people the most common problem which has been highlighted is that most of the areas do not have dustbins, and Agra Nagar Nigam has not been very proactive in providing these. No waste collectors from ANN come to these places. So a better waste collection mechanism is the imperative for a cleaner plastic free Agra.



Figure 36 Workshop in Idgah



Figure 37 Workshop in Ambedkar Bagichi



Figure 38 Workshop in ADA Heights

The sixth workshop was conducted on 12th January, 2020 in Vaivhao Vilas in Hariparwat. This is an HIG apartment and presentation was given followed by an interactive session with the residents. Some very interesting points were discussed. Many of them agreed that waste segregation can be a useful method to reduce the amount of waste significantly. As the participation of Agra Nagar Nigam in this aspect is negligible, according to the residents, they are eager to take steps by themselves and start working on the segregation and composting of the biodegradable materials. Now they are planning to dig a composting pit in their apartment and promised to train their household helps to help in this process.



Figure 39 Workshop in Vaibhao Vilas

The seventh workshop was arranged at Taj Nagari, Phase 1 and this was a MIG area. After the presentation an interactive session was organized with the people. This part of Tajganj is very clean and wastes are regularly collected and the ward councilor and the community members both work together to make this area clean. The ward councilor also participated in the workshop and conveyed his message that plastic has become such big problem, that the whole society together have to work for a plastic free society. Though the cleaning is done regular here, the waste management part is still avoided. The feedback of the people was very useful. According to them the children should be educated first in this aspect as they are the future of the society, parents should make them understand the impact of plastic pollution.



Figure 40 Workshop in Taj Nagari, Ph 1



Figure 41 Workshop in Panchvati, Tajganj

The eighth workshop was done in Panchvati Parsunath. This was an interesting workshop where we discussed the topic of plastic pollution and impact of single use plastic with two different age groups. The first round of discussion was done with senior residents. In their opinion this problem is very recent as plastics was not there in their time, but now it is widely used and this is a “plastic era” and as everyone is so habituated with plastic it is very difficult to reject plastic even if it is harmful. According to them the industry of plastics should be shut down, only then the problem will be solved.

The second round of discussion happened with a group of young women, both working women and home makers. Many of them have already reduced the usage of single use plastics; even for them it is difficult because polythene bags are still available in the market. Regarding the waste segregation they complained about ANN, which always mix up the wastes even after collecting segregated wastes from the residents. This was seen as a common problem in many communities in Agra.

Trainings were given to communities through interactive discussions and innovative methods like street plays by college students in the vernacular, Hindi.

Street plays (Nukkad Nataks) by college student volunteers in communities

Students of Dayalbagh College performed at multiple locations across the city to engage with locals and tourist, and help drive the message home.



Figure 42 Street Plays by Volunteers

Learnings from the Community

School Trainings

Workshops with schools was conducted at various schools in Agra. The activity was aimed to create awareness among school children regarding ill effects of plastic and to reduce the usage of single use plastic in our daily life. The main objective of the activity was to involve the students in cleaning up and segregation of wastes into separate dustbins at their own area and create awareness about the daily use of plastics and its implications on people as well as on the environment, to make children conscious about the amount of plastic wastes daily coming out- which is not only affecting their health but also the health of the environment. Students enthusiastically participated in the presentation and answered to queries raised by the presenter time to time. They also took pledges to not use Single Use Plastics and continue the same at their households and community as well.

Name of the places	Waste Management Scenario
ADA Heights, Tajganj	No ANN workers come and all the wastes are dumped in the backside of the apartment by the domestic help. No dustbins.
Panchvati, Tajganj	The same scenario prevails here and the wastes are dumped in the same ground where the ADA people dump. No dustbins.
Dhandhupura, Tajganj	No ANN workers come. No dustbins are available.
NaglaPaima, Tajganj	No ANN workers come. No dustbins are available.
KoyelaBasti, LangrekiChowki	The ANN workers come to the dumping ground to collect the wastes, but never come to the slum. No dustbin
NaglaBasi, Idgah	ANN workers come every day. No dustbin.
Dev Nagar, Idgah	ANN workers come every day. No dustbin.
NaglaChhaua, Idgah	ANN workers come every day. No dustbin.
Fakirchand, Idgah	ANN workers come every day. No dustbin.



Figure 43 Students of PV Primary School, Agra



Figure 44 Students of REI School, Agra



Figure 45 CBS students taking pledge not to use SUPs



Figure 46 MM Sherry students recalling SUPs

Box 3

Learnings by DEI Primary School Children, Agra

School students were not aware of the impact of plastics on their health and environment. Most of these students carry water and food in plastic containers. Our campaign focused on increasing the awareness level of these students and the profound impact of one such intervention was change to steel containers from plastic.



Activity: Social and other Media

The media-print and social media-was key to communicating with the constituency, drawing in more people into the campaign, injecting data into the thinking amongst the people and sharing peer experiences to motivate. The following were the key activities:

Social Media:

- **Community Building:** 1 day- Mobile Storytelling training - 20 mascots selected by Chintan were trained in a 1-day hands-on workshop which included introduction to mobile storytelling, how to storyboard, basics of shooting, how to anchor, basics of editing, and how to share the stories. Further, a 20 day engagement with the mascots via Whatsapp Newsroom (support and handholding in producing first 2 stories, community encouragement and collaboration, amplifying the discourse on plastic pollution) was formed to generate continuous content on the issue
- **Videos:** Video series was created focusing especially on Agra with 2 episodes. Each Video is 3-5 mins long with a very well-defined Call to Action. The first video was of tracking the journey of plastic in Agra (with voices of various stakeholders, guides, family, students, and waste pickers) as well as showcasing project impact (showcasing the work done, change achieved,

behind the scenes, numbers, champions etc.) The second video showcased a compilation of the 7 day Plastic Challenge by the mascots.

- **Working with ambassadors** etc. to penetrate local WhatsApp groups with films and messages. These were enthusiastic influencers willing to invest time to talk about the issue, reach out to the media and keep the issue alive post project period. **List of ambassadors attached in Annexure 7.**



Figure 47 Mobile story telling for mascots

Training of Guides

Tour guides play a very important role in presenting a city to visitors and can be a very important tool in training people and sending out relevant messages. They are usually the first point of contact when tourists visit monuments, especially so in Agra which attracts thousands of visitors each day globally to see the Taj Mahal, Agra Fort and other historic and heritage monuments.

Tour guides were also asked to encourage visitors to do the following to reduce single use plastic usage:

- Carry your own refillable glass or steel bottle
- Avoid buying food in plastic disposable cutlery
- Avoid tissues
- Avoid using plastic straws
- Avoid drinking hot beverages in plastic coated paper cups
- Carry cloth bags and refuse plastic and non-woven plastic bags

On 3rd Feb, 20, there was a gathering of 400 tourist guides at The International School, Fatehabad Road organized by the U P state tourist guides welfare association.



Figure 48 Training by Chintan Project Coordinator



Figure 49 Tour Guides at Workshop

The workshop for the guides detailed out how plastics were used in Agra and the litter and trash was ruining the beauty of Taj. This monument was built when Yamuna was not even dreamt of and the river was plastic-free and clean. To keep the architecture pure and clean and in the context it was seen and the way Shahjahan imagined it and built it, we have to make the efforts as a community. People need to realize that one could be throwing plastics upstream or even in Delhi or on way to Agra and these plastics, especially Single Use Plastics that cannot be recycled will create a problem. They might be burnt and cause air pollution or eventually all land up in the Yamuna. So no matter how hard Agra municipality tries, the plastics will flow down from the land and enter the rivers. 80% of all marine plastics comes from the land and so we need to fight this.

The guides were encouraged to tell the tourists that our contribution is not just admiring the Taj and buying the tickets but also using less plastics so there will be less of it downstream and less pollution in the Taj and Yamuna.

Standing at the most beautiful monument ever built, the Taj, there can be no better place than this to pledge to love the planet by using less plastics.

Training of Waste Workers

There are about 2 million informal waste workers in India and in urban cities and towns they are primarily responsible for collecting waste from garbage dumps and landfills as well as many of them also are engaged in doorstep collection. They collect about 15-20% of all waste that is generated and divert it from landfills. The dry recyclables like paper, cardboard, metal and even plastics like PET etc. are picked up and sent for recycling. They save the municipalities a lot of resources and money by doing the work which is the primarily the work of the municipalities.

Since waste workers directly come in contact with waste, it was essential that a training be done for them on handling plastics better.

Chintan conducted a survey of over 50 waste workers in Agra to collect information on their work and the challenges they faced in collecting SUPs especially since these were low value, difficult to recycle and hence posed a challenge in removing from the waste stream.

On 8th March, 2020 at Tora village at Fatehabad road a training was conducted for 70-75 waste pickers. The training was conducted by the Safai Sena President, Mr. Jaiprakash Chowdhary and Safai Sena member Nazir.



Figure 50 Trainers at workshop

Safai Sena is a registered group of waste pickers, doorstep waste collectors, itinerant and other small buyers, small waste traders, and other types of recyclers, in operation since 2009 and based in Delhi. The Safai Sena Secretariat has been actively working towards empowerment of the waste picker community through capacity building, trainings, knowledge sharing and creating livelihoods for this workforce of green recyclers.

Through the training, it was communicated to them the necessary precautions that they must take while handling waste. Wearing masks and gloves to avoid pollution and toxicity and also be disease-free. Training was given to wash hands regularly before eating and general measures of safety and precautions.

Mr Amaan Shahid, Inspector Nagar Nigam was also invited for the training and assured the waste pickers that they will get identity cards from Nagar Nigam which will make them authorized and legal so that they will face less harassment in their work. Their identity will help in getting admission to schools and in opening bank account etc.



Figure 51 Waste workers at workshop

Masks, gloves and aprons were also distributed masks, gloves and aprons to them which would help protect them in their work. **List of waste workers trained attached in Annexure 5**

Meeting with Hospitality Industry

We met with the District Magistrate, Agra regarding plastic waste reduction by the hospitality industry and provided him with a compiled list of single use items and its alternatives for the industry. On his suggestion we approached the hospitality industry through Mr Hari Sukumar, President of Tourist Guild association, Mr Arun Dang (Past President) and Mrs Renuka Dang (President of Gourmet Club). They have promised that will bring down the consumption of single use plastic in hospitality industry significantly. It was decided that a deadline will be declared giving sufficient time to consume off such single use plastic things and then it will be ensured that industry is strictly adhering to it through periodic monitoring. **List of alternatives for hospitality industry attached in Annexure 8.**

Advisory Council

The District Magistrate, Agra and UP tourism officials are very enthusiastic in joining hands to carry on the activities of the project further and to become a part of this board. In association and discussion with District Magistrate, Agra Nagar Nigam officials and other influential people, advisory board consists of panel of 10 influential people from various walks of Agra is framed consisting of following members:

1. Mr. Prabhu Narayan Singh-DM Agra
2. Mr Rajiv Raathi-Incharge Nagar Nigam
3. Mr Anand Menon-Incharge Smart City Agra
4. Dr. Riju Agarwal- Doctor By Profession
5. Mrs. Shivali Garg-Principal Little Angel School
6. Mrs. Manoj Bal-Director-Sumit Rahul School
7. Mr. Hari Sukumar-President Tourism Guild
8. Mr. Asad Pathan-President Spheeha
9. Mr. Sarvan-Environmentalist
10. Mr. Rajiv Narain-Past President Tourism Guild Association

Training module and training tools

Training modules were created for schools and communities. ***This is attached in Annexure 4.***

Feedback and key recommendations

The response to the trainings in both schools and communities has been very encouraging. School students were not aware of the impact of plastics on their health and environment. Most of these students carry water and food in plastic containers. Our campaign focused on increasing the awareness level of these students and the profound impact of one such intervention was to change to steel containers. The sessions focussed on increasing their awareness by exposing them to various unknown sources of plastics such as wet wipes, paper glasses, woven carry bags tea bags etc.

People of Agra have been very concerned that the city is facing massive problems of choked drains, dirty streets due to plastic bags and other single use plastic items like cutlery, PET bottles etc. There is a growing awareness that single use plastics are dangerous for human health and the environment, and a concern that the Yamuna is being polluted by plastic waste. The citizens of Agra feel that this has had a backlash on tourism as well. Hence there was an eagerness and enthusiasm to understand the dangers of plastics and explore ways of reducing its usage and adopt sustainable alternatives.

Some key recommendations:

- Let the public know how plastics are damaging the country. Big picture is as key as any other awareness. People respond to images. Don't miss the change to tell the story beautifully, powerfully and with a You-Can-Make-A-Change tone. Awareness can lead to public participation. It also makes clear what the laws are. Besides, awareness means several organizations can be made part of the implementation.
- Communities and stakeholders need to be made aware of what items of use are single use plastics, the dangers to human health, marine life and environment, as well as be given sustainable alternatives

- There needs to be easy availability of alternatives to plastics and the government should give subsidies to industries making them as well as promote them

Plastic Mascots- profile, reason for selection, training and anticipated role making long-term impact

The plastic mascots chosen have been a group of very enthusiastic and dedicated school and college students, social activists, housewives and community workers. They were chosen due to their dedication and sincerity towards the cause, their motivation and willingness to learn about the dangers of plastics and also influence people around them for behavioral change. *The list of mascots is attached in attached in Annexure 6.*

Media outreach in English and vernacular media- evidence as images, links, cuttings of newspaper etc. (Attached in Annexure 3)

Print Media	November 2019	December 2019	January 2020	February 2020
	https://timesofindia.indiatimes.com/city/agra/ngo-begins-collecting-plastic-waste-from-yamuna-banks/articleshow/71944909.cms	Hindi News-paper "Dainik Bhaskar"- "School Aur college ke Bacchon Ne chalaya Swacchta Abhiyan"	https://timesofindia.indiatimes.com/city/agra/amc-councillors-plan-postcard-drive-to-focus-on-irregularities-in-door-to-door-garbage-collection/articleshow/73090738.cms	https://www.jagran.com/uttar-pradesh/agra-city-single-use-plastic-boycott-message-will-be-given-at-taj-mahotsav-19952964.html
			Hindi News-paper 'Hindustan'- 'Chatrone chalaya Swacchta Abhiyan'	https://www.jagran.com/uttar-pradesh/agra-city-taj-mahotsav-2020-will-give-the-message-of-save-environment-jagran-special-20035400.html
			Hindi news-paper "Agra Satur-day Live"- "Jaanc-on kay Chakra-vuyh main Kooda Collect-ion Ghotala"	https://www.anews.in/videos/national/cleanliness-drive-underway-agra-slums-ahead-trumps-visit-residents-call-move-temporary/

Recommendation for way ahead

e. Success factors/learnings for effective and sustained outreach and public engagement

During the course of the project, Chintan reached out to diverse stakeholders such as schools, parents, residents' welfare associations, market associations, corporate sector, local governments, the hospitality industry and local influencers.

The learnings were:

- Awareness campaigns for plastics should be very focussed on targeted stakeholders like housewives, school students and professionals, not be generic.
- Campaigns for public engagement should be customized to different audiences. It cannot be a one size fits all approach. For eg. For an informal sector street plays and use of vernacular would be the most effective means of communication but it not likely to have high impact to ask them to stop using plastics as they are not only poor, but also consume very few plastics.
- Innovative methods of communication need to be devised. Youth would be more engaged through social media campaigns.
- Messages need to be repeatedly conveyed to the public and consequent behavioural changes monitored regularly for effectiveness.
- Data based campaigns are the most effective for impactful messaging leading to informed choices.
- Campaigns should take into account cultural practices.
- Youth and women need to be focussed on for an optimal impact.
- High quality design is important, as the message competes with many others. This should be invested in.
- For public bins, colour coding should be accompanied with labelling and a list of items to be put in each bin preferably in pictures.

f. Policy recommendations

- Plug the loopholes: Non-woven bags should be explicitly mentioned in the definition of plastic carry bags since they are majorly made of polypropylene (Non-Woven bags found consisting of 98.3% polypropylene as per [this](#) Delhi government notice). Subsequent to this notice, Kannur Municipality, Kerala, banned the use of non-woven bags as per this [Link](#).
- Green Procurement: Government, including state and municipality, and any initiative where government is a partner, must ensure that no plastics are procured for any use. These include foods in multi-layered plastics, single use plastics, flex banners, plastic decorations, or stationary. The list can be expanded per the local situation. A government order to this effect should be issued. This should also be part of any manuals and conveyed to procurement and finance. This will also influence mindsets.
- Inclusive Recycling: To ensure smooth plastic recycling, 'No objection certificates (NOCs)' should be issued to group of waste pickers or NGOs working with them to enable them to collect, segregate and facilitate plastic waste recycling. These groups must submit annual reports to show how much plastic waste was collected and where it is being recycled, in order to safely contribute to the waste recycling and be part of the solution, instead of only facing stigma Be inclusive: Waste pickers should be engaged and incentivized for collection of MLPs

and other low value plastics to ensure that they are picked up and do not reach the landfill. This is part of existing policy. However, this requires capacity building.

- This will also contribute to their livelihood and inclusion.
- Build Capacity to Use the Legal Provisions: Primary responsibility for collection of used multi-layered plastic (MLPs) sachet or pouches or packaging is of Producers, Importers and Brand Owners who introduce the products in the market. They need to establish a system for collecting back the plastic waste generated due to their products. They can do this via PROs of waste pickers and others. It is important to train the ULBs on the law and specifically, these aspects.

g. Counter measures for plastic pollution

- It has been observed that green and blue bins are available in some areas in Agra. It is important that twin bins are distributed across waste generators so that source segregation can be initiated at a large scale.
- BTL (Below the Line) activity to be planned for Plastic related awareness campaign as people agree that they have seen lots of awareness campaign in their area but they know very little about impact of plastic on health and environment
- The data collected during the project should be made widely available as a downloadable product and via quizzes etc on social media and other sources.

h. Sustaining project impact

This project is designed to continue after the funding period because of the external capacity being built at multiple levels during the project period.

The following outcomes, already underway, are expected to ensure that the issue stays active:

- A shift in cultural attitudes towards plastics and pollution.
- A shift in the current 'impossible' attitude to an empowered attitude about single use plastics.
- Pressure on the government and private institutions to shift procurement policies to prevent single use plastics. Also shifts for vendors and caterers, who often use single use plastics for events.
- Expansion of the public discourse to include plastics at the same level as key environmental concerns, such as air pollution.
- Increased public understanding about the impact of their actions on oceans and holy rivers
- Increased media understanding of plastics in general and single-use plastics in particular, therefore increased ability to seek stories around it. This in turn keeps the interest sustained.
- Increased acceptability created around less consumptive lifestyles
- Increase in micro-enterprises making long-term, sustainable products as demands increase
- Ecosystem of support for civil society organizations in the field, for greater impact.

Our project contributes to this as follows:

- 200,000 trained and informed youth, who in turn will also build the capacity of their families, friends and others
- Over 500 persons showed how plastic recycling can be improved via community actions. They continue to be active locally.

- 50 volunteers who are to be master trainers
- Identified 20 local ambassadors in Agra and launched 2 orientation workshops for them. These will be enthusiastic influencers willing to invest time to monitor public action, talk about the issue, reach out to the media and keep the issue alive post project period.
- The close association with local NGOs like Ek Pahal, Unfold Foundation, Rising India, Spheeha, and CURE also ensures that local partners will keep the work ongoing.
- A better informed media with over 15 media hits during the course of the project.
- Leadership on the issue in key industries, such as hospitality and education. We have provided a list of best alternatives for single used plastics used in the hospitality industry. In education, we have given sustainable options of for use of plastic tiffin boxes and bottles, plastic cutlery in canteens and decorations.
- A socio-economically diverse base in Agra built upon for future action
- Chintan's website will be an additional resource that contains all training materials so that it can be used by others.
- Since the materials will be in Hindi and English, it is expected to be widely used by teachers in the coming years as a resource in India.
- Chintan spent a significant range of resources to build the capacity of local organizations. These are now embedded as resources in the city and are known to other actors.

ANNEXURES

Annexure 1-Methodology for Pilot clean up activity

Detailed Methodology for undertaking Clean up Activity

I. Preparation Procedure

1) Location of the clean-up

- The location of clean-up should be identified in consideration of the local “Hotspot” related to the rivers and waterways.
- It is recommended to discuss the location of the clean-up in each pilot city among expert group members.
- Latitude and longitude is required to identify the location of the clean-up.

2) Time & Data

- The time should be arranged in the early morning to avoid strong sunlight. (7:30 – 9:00 am, maybe good).

3) Organizer & Participants

- Organizer deploys three teams such as survey, clean-up, and photo (before and after) with GPS teams
- Organizer conducts the waste characterization survey from the sample bags collected in the clean-up (See “Survey methodology”)
- If you already have an existing programme of clean-up, please utilize it. (Ex. “Beach cleanup” activity in Mumbai)
- Organizer consults with the officer in charge of waste management in local governments to manage all collected bags properly (Transfer, Recycle and Dispose).

1. Organizer	UNEP
2. Target City	Agra
3. Contact person (EMAIL/TEL)	Ms. Chitra Mukherjee, Chintan, 09205192508, chitra@chintan-india.org Dr. Shukla Pal Maitra, NPC, 9899549948 , shukla.pal@npcindia.gov.in
4. Existing Initiative	Clean up activity in collaboration with local partners
5. Hotspot & Clean-up location	tbc (Latitude/Longitude)
6. Time/date of Clean-up	6 November, 2019

7. Estimated # of participants	tbc
7. Survey Team	Chintan , NPC
8. Photos (Before and After)	

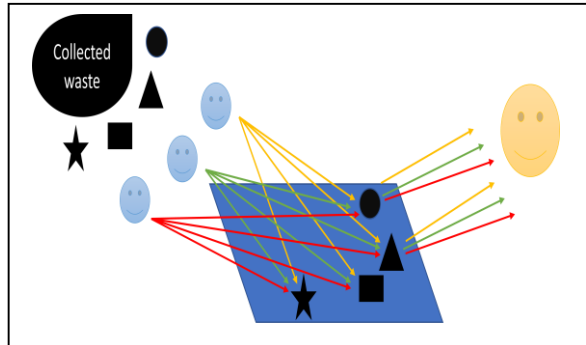
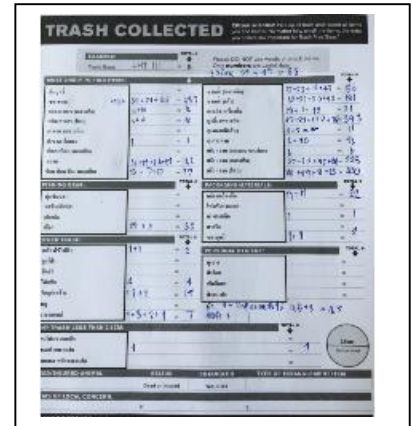
II. Implementation Plan for Pilot scale Clean up Activity

- 1) Organize three teams : 1. Survey, 2. Clean-up, and 3. Photo (before and after with GPS)
- 2) Prepare for all materials and equipment such as PPE, collection bag (numbering), data sheet, scale, pen, board, and so on. Take photos with GPS around the site before and after the clean-up.
- 3) Visual Inspection may be required especially before the Clean-up.
- 4) Instruct the clean-up operation to all volunteers with notification of any risks
- 5) Notify exclusion of liability of the organizer from any injuries and accidents during the clean-up
- 6) Conduct the survey after the collection of wastes.
- 7) Data entry of collected data into the excel sheet after the survey, analyze and develop the summary report with photos
- 8) Promote the recycling for collected wastes
- 9) Hand over to all collected wastes during the clean-up to the local authority (Agra Municipal Corporation)
- 10) Clean the site after completion of the survey

Survey Methodology

1. Collection Team (say 8-10 participants for pilot scale)

- Collect wastes and bring it to the survey site

2. Separation Team (5 people)

- Pick-up same item with its number from the bag
- Put the designated place on the

3. Data record (1 person)

- Fill the number of each item in the sheet one by one informed by separation member



III. Equipment required

- Hand gloves, Safety boots, Masks
- A measuring tape
- Pens, clip boards, and forms for recording
- Ground (blue) sheets to spread the collected materials on the ground sheet to sort, to show and to take photos
- Scales of different capacities, e.g. one to measure from 1g and another heavy-duty one that can measure up to 50kg. A handheld one is relatively useful, but may not be ideal.
- **A medical box/ kit for minor injuries (e.g. cuts)**
- Guidelines to organize a low plastic, outdoor event (e.g. water and food for volunteers without individual plastic packaging)
- A broom and a dustpan, because the small pieces are most difficult to collect and count
- Mid-size bags or containers to store the light items. Winds blew away plastic bags and small pieces when separating (Especially at the beach)

IV. Important points to be considered

- Take photos of all the bags collected before weighing.
- Weigh all organic materials (except dead animal) separately.
- **Need to record the Bag ID number for sampling.**
- Place the content of the bags over the ground blue sheet before sorting in order to avoid waste getting mixed with sand.
- **Need enough surveyors. It takes 4 hrs for 4 people to sort and record 28kg of waste. Roughly it takes one hour to sort 2kg per person.**
- Promote recycling after the survey by making specific collection arrangements.
- Analyze the gathered data and share the finding.

Tentative schedule for Pilot scale Clean up Activity at Agra

9.00 – 9.20	Registration of volunteers
9.20 - 9.25	Welcome speech
9.25 – 9.30	Opening speech
9.30 – 10.30	Pilot cleaning activity at hotspot
10.30 – 12.00	Weighing the litter

VOLUNTEER- Ocean Trash Data Form

Ocean and waterways trash rank as one of the most serious pollution problems choking our planet. Far more than an eyesore, a rising tide of marine debris threatens human health, wildlife, communities and economies around the world. The ocean faces many challenges, but trash should not be one of them. Ocean trash is entirely preventable, and data you collect are part of the solution. The international cleanup is the world's largest volunteer effort on behalf of ocean and waterway health.

SITE INFORMATION:

Clean up Site Name:
 State:
 Zone or Country:
 Country:
 Landmark:

MOST UNUSUAL ITEM COLLECTED:

Type of Clean up

Number of Volunteers Working on this card

Land

adults

children (under

Under water

Water

Date:

TRASH COLLECTED

Citizen scientist: *Pick up all trash and record all items you find below. No matter how small the items, the data you collect are important for Trash Free Seas*

S. NO.	MOST LIKELY TO FIND ITEMS:	Total No.	Total weight in Kg
1	Cigarette Butts		
2	Food wrappers (Biscuits, Chips etc)		
3	Take Out/ Away containers (Plastic)		
4	Take Out/ Away containers (Food)		
5	Bottle Caps (Plastic)		
6	Bottle Caps (Food)		
7	Lids (Plastic)		
8	Straws		
9	Beverage Bottle (plastic)		
10	Beverage Bottle (glass)		
11	Beverage Cans		
12	Grocery Bags (Plastics)		
13	Other Plastic bags		
14	Paper bags		
15	Cups & Plates (paper)		
16	Cups & Plates (plastics)		
17	Cups & Plates (foams)		
FISHING GEAR			
1	Fishing Buoys pots & traps:		
2	Fishing Net & Pieces:		
3	Fishing Line (1 Yard/ meter)= 1 piece		
4	Rope (1 Yard/ meter)= 1 piece		
OTHER TRASH			

Participant List

<u>Collection Team</u> <u>(Clean Up)</u>	<u>Survey Team</u> <u>(Segregation)</u>	<u>Photo Team</u>	<u>Visual</u> <u>Inspection</u> <u>Team</u>

An Example of Mekong river, Thailand Clean up Activity Details recorded

1. Number of Participants: 118 participants
(excluding TSCC and UN team)
2. Period of the collection: 7:30 – 8:30 (1 hour)
3. Site: Bang Saen Beach (1km)
4. Number of Bags collected: 117 pcs
5. Total Weight of Bags collected: 389.73kg

Sample bag's information

Person in charge	4 people	
Time for survey	8:00 - 13:30	4 hours (Practically)
Role of surveyors	Separation, Counting, Weighing, Recording, Analysis and Taking Photos	
Number/Weight of Sample Bags	15	28.16 kg
Average		1.88 kg
Weight ratio (sample weight/total weight)		7%
Bag number ratio (sample number/total number)		13%

Example of Summary report

No.	Item	Number (pcs)
1	Rubber Band* (0.2g/pcs)	1,600
2	Straws/stirrers:	368
3	Other Plastic Bags:	294
4	Bottle caps (Plastic):	281
5*	Cigarette butts:	205
6	Cotton Swab (Ear)*	178
7	Food wrappers (candy, chips, etc.):	140
8	Other Plastic (hard)	139
9	Bottle caps (Metal):	118
10	Forks, knives, Spoons: (No knives)	85

11	Plastic Pieces*	67
12	Fishing Net and Pieces: (including Rope)	61
13*	Take-away containers (Foam):	56
14	Strapping Bands*:	43
15	Beverage Bottle (Plastic):	35
16	Chopsticks, bamboo sticks*	32
17	Cups & plates (Plastic):	25
18	Incense Stick*	25
19	Take-away containers (Plastic):	19
20	Beverage Bottle (Glass):	19

No.	No.	Item	Weight (kg)
52	1	Others (mainly trees and reefs)	7.3
12	2	Fishing Net and Pieces: (including Rope)	3.7
3	3	Other Plastic Bags:	3.7
20	4	Beverage Bottle (Glass):	3.0
8	5	Other Plastic (hard)	1.6
15	6	Beverage Bottle (Plastic):	1.2
21	7	Fish including horse-shoe crab	1.1
29	8	Shoes, Flip flops	1.0
4	9	Bottle caps (Plastic):	0.7
2	10	Straws/stirrers:	0.5
24	11	Toy*	0.5
19	12	Take-away containers (Plastic):	0.5
17	13	Cups & plates (Plastic):	0.4
27	14	Other Plastic Bottles (oil, breach, etc.)*	0.4
9	15	Bottle caps (Metal):	0.3
1	16	Rubber Band* (0.2g/pcs)	0.3
7	17	Food wrappers (candy, chips, etc.):	0.3
33	18	Diapers:	0.3
31	19	Tabaco Packaging/Wraps*:	0.2
26	20	Cigarette lighters:	0.2

Example of Summary report Photographs



Rubber Band: About 1,00,000



Plastic stirrers: About 5,000



Plastic Bags: 7



Bottle caps (Plastic): About 4,000



Cigarette butts: About 7,000



Cotton Swab (Ear): About 3,000



Food wrappers: About 2,000



Plastic (hard): About 1,000



Bottle caps (Metal): About 1,000

Annexure 5-List of Waste workers

Enumerator	Name	Age	Gender	Place of waste collection
Sanjay Prasad	Jogendar	45	Male	Landfill
Sanjay Prasad	Rajendar	35	Male	Landfill
Sanjay Prasad	Asha	35	Female	Landfill
Ratan	Upendra	27	Male	Landfill
Ratan	Munna chauhan	25	Male	Landfill
Ratan	Mitthu	26	Male	Landfill
Sanjay Prasad	Shahrukh	19	Male	Landfill
Sanjay Prasad	Dilshaad	40	Male	Landfill
Sanjay Prasad	Sharik	13	Male	Landfill
Sanjay Prasad	Vishal	18	Male	Landfill
Sanjay Prasad	Dinesh	38	Male	Landfill
Sanjay Prasad	Renu	20	Female	Big kabadiwala
Ratan	Ravi	22	Male	Big kabadiwala
Sanjay Prasad	Charan singh	38	Male	Big kabadiwala
Sanjay Prasad	Dolly	18	Female	Big kabadiwala
Sanjay Prasad	Laxmi	17	Female	Big kabadiwala
Sanjay Prasad	Khushbu	20	Female	Big kabadiwala
Ratan	Hariom	19	Male	Big kabadiwala
Sanjay Prasad	Baby	20	Female	Big kabadiwala
Sanjay Prasad	Kashmiri	39	Female	Big kabadiwala
Sanjay Prasad	Durgesh	17	Female	Big kabadiwala
Ratan	Suman Devi	40	Female	Small Kabadiwala
Sanjay Prasad	Asha	35	Female	Small Kabadiwala
Sanjay Prasad	Deepak	20	Male	Big kabadiwala
Ratan	Rama	38	Female	Big kabadiwala

Sanjay Prasad	Poonam	18	Female	Shops/factory
Sanjay Prasad	Harpal	26	Male	Big kabadiwala
Ratan	Raman	18	Male	Big kabadiwala
Sanjay Prasad	Sheela	40	Female	Small Kabadiwala
Sanjay Prasad	Chote lal	48	Male	Big kabadiwala
Ratan	Chotu	18	Male	Big kabadiwala
Sanjay Prasad	Ashiq	20	Male	Small Kabadiwala
Ratan	Shyam lal	25	Male	Small Kabadiwala
Ratan	Narendra	19	Male	Big kabadiwala
Ratan	Rahul	22	Male	Big kabadiwala
Sanjay Prasad	Shiv shankar	35	Male	Big kabadiwala
Sanjay Prasad	Vishnu	22	Male	Small Kabadiwala
Sanjay Prasad	Sonu	33	Male	Small Kabadiwala
Sanjay Prasad	Kaale	25	Male	Big kabadiwala
Sanjay Prasad	Poonam	35	Female	Big kabadiwala
Sanjay Prasad	Pooja	45	Female	Small Kabadiwala
Sanjay Prasad	Leela	45	Female	Small Kabadiwala
Ratan	Rama Devi	45	Female	Big kabadiwala
Ratan	Reshma	40	Female	Big kabadiwala
Ratan	Mukesh	19	Male	Big kabadiwala
Ratan	Rinku	18	Male	Big kabadiwala
Ratan	Keshav	22	Male	Big kabadiwala
Ratan	Sunita	48	Female	Big kabadiwala

Annexure 6-List of Mascots

List Of Mascots			
1	Megha Sagar	6397564158	Student
2	Versha Kumari	6397564158	Student
3	Shivani Singh	9557943186	Student
4	Nisha	7467030992	Student
5	Nandini Verma	7505195208	Student
6	Mamta Kushwaha	9027015927	Social Activist
7	Sanjay Prasad	7520956604	Social Activist
8	Nishtha Garg	9319208362	Student
9	Mannu Datt	8755455061	Student
10	Kumar Hrithik Ranjan	7903211698	Student
11	Kautilya Upadhayay	8859724682	Student
12	Dipanshu Aisawal	8077901829	Student
13	Saloni Agarwal	9717022892	Student
14	Harendra Kumar	88811698816	Student
15	Mukul Rajput	9837054298	Student
16	Ajeet Singh	7669008828	Student
17	Devaki	9045067150	Student
18	Ganesh	8273779717	Student
19	Nishi	9639805615	Student
20	Ambika	6396602033	Student
21	Ratan	8630300606	Social Activist
22	Sahej Khurana	8750478383	Student
23	Sabiya Javed	9045045353	Student
24	Aashika	8394085466	Student
25	Mriganka Garg	8077977432	Student
26	Sandarbh Singhal	8881257219	Student
27	Garima Satsangi	8433164581	Student
28	Shivani Gautum	8979294244	Student
29	Shubhangi Anand	8279915595	Student
30	Artee Satsangee	9557774417	Student
31	Shweta Kain	8445133362	Student
32	Ayushi Agarwal	9368031917	Student
33	Yashmi Vatyani	9997723389	Student
34	Pragati Gupta	7906904518	Student
35	Lavanya Sharma	6396696224	Student
36	Yukti Jain	8126492604	Student
37	Komal Bhadoriya	8171742935	Student

38	Yash Chaudhary	9412458962	Student
39	Bhawna Dayal	8477916054	Student
40	Shrey Sinha	9917987815	Student
41	Anushka Pachauri	7055020365	Student
42	Astha Jain	6396338292	Student
43	Sourabhpal Singh	8057066247	Student
44	Smriti Amar	9760857557	Student
45	Vachan Satsangi	8368084546	Student
46	Dimple Khushlani	7417512997	Student
47	Somya Saluja	9927290999	Student
48	Amit Asvani	7417579753	Student
49	Akshay Kumar	7895267301	Student
50	Gaurang Jaiswal	7017211958	Student
51	Devansh Arora	7906045545	Student
52	Nisha Sawlani	9457752091	Student
53	Tanisha Vatyani	7599322015	Student
54	Anushka Verma	9759780078	Student
55	Ria Jain	7017945983	Student
56	Jassidak Singh Kochar	8881999077	Student
57	Nihit Jain	9997404472	Student
58	Apoorvi Chaturvedi	7737439855	Student
59	Prince Kume	9756563419	Student
60	Rahul Kumar	8171526789	Student

Annexure 7-List of Ambassadors

List Of Ambassadors					
1	Ankit Khandelwal	M	9760004809	28	Social Activist
2	Siddharth Jain	M	9557065980	25	Social Worker
3	Manish Kheterpal	M	9897357789	35	Bjp Nagar Adhyaksh
4	Manish Rai	M	9808444600	40	Founder-Ek Pahal Pathshala
5	Mrs Manoj Bal	F	9760180955	55	Director-Sumit Rahul School
6	Ajay Bahadur	M	8439995999	27	Scholar-Entrepreneurship In Dei
7	Dr Alka Kapoor	F	9837611236	55	Docter By Profession
8	Dr Meeta Kulshrtha	F	9897255262	55	Docter By Profession
9	Mr T. Santhil	M	7417090200	42	Faculty At Hindustan Colg
10	Dr Sheetal Sachdeva	F	9634086449	45	Faculty At Hindustan Management Inst
11	Ram Krishan	M	8826696032	26	Scholar -Waste Management In Dei
12	Harvijay Singh		9997506506	45	Very Active Social Activist
13	Anand	M	9456403663	40	Worked With Univ Of Pennsylvania And Engaged With Behavioral Neuroscientist For Manned Mars Mission, Social Activist
14	Vikas Choudhary	M	9412425668	40	Social Worker
15	Jagmohan	M	9759485351	41	Parshad
16	Mohan Singh	M	7906018180	43	Parshad
17	Shobha Ram Rathore	M	8630237214	44	Parshad
18	Guddu Rathore	M	8077765573	45	Parshad
19	Radhika	F	8971689126	40	Parshad
20	Dr Shri Krishna	M	9837276294	40	Docter By Profession
21	Vishal Kumar	M	7017149406	34	Social Worker
22	Mr Ak Tomar	M	9897599255	50	Principal Cbs School

Annexure 8-List of alternatives for Hospitality Industry to reduce SUPs usage

Hotels	
Plastic Item	Alternative
Plastic key cards	<ul style="list-style-type: none"> • Wooden key cards • Regular keys • Charge significantly for every card not returned.
Pens	<ul style="list-style-type: none"> • Pencils • Refillable pens
Plastic water bottles	<ul style="list-style-type: none"> • Glass bottles/ carafes • Water dispensers/refill stations close to the rooms
Amenities/toiletries	<ul style="list-style-type: none"> • Soap, shampoo, shower gel dispensers • Providing amenities (on request only)
Plastic bag in bin	<ul style="list-style-type: none"> • Don't use plastic bags • Paper bin liners for wet waste • Compostable bags (only if no other option is viable and these should be re-used as much as possible)
Paper door hanger	<ul style="list-style-type: none"> • Reusable door hanger (wooden/bamboo)
Hotel directory	<ul style="list-style-type: none"> • TV presentation • App
Wrapped slippers	<ul style="list-style-type: none"> • Slippers in bathrobe (in pockets, in basket) • Slippers in cotton bags • Slippers on demand
Laundry plastic bags	<ul style="list-style-type: none"> • Change process – explain that a bag will be provided at reception if laundry is needed • Reusable laundry bags (cotton/linen) or paper bags • Laundry on demand
Tea/coffee station	<ul style="list-style-type: none"> • Sugar cubes instead of sugar sachets • Loose tea with reusable tea infuser • Public coffee and tea provisions, close to the room (e.g. one on each floor)
Toothbrush	<ul style="list-style-type: none"> • Toothbrush on demand • Wooden/bamboo toothbrush

KITCHEN, RESTAURANTS AND (POOL) BARS/Office Pantry	
Plastic Item	Alternative
Single-use cups	<ul style="list-style-type: none"> • Hard plastic glasses for all beverages • Glass cups
Straws	<ul style="list-style-type: none"> • No straws policy (on request only) • Reusable straws (steel/glass) • Single-use straws (paper/straw/edible/ bamboo)
Stirrers	<ul style="list-style-type: none"> • No Stirrers (on request only if necessary) • Reusable stirrers (paper/steel/wooden/ bamboo/straw/glass) • Single-use stirrers (paper/wooden/ bamboo/straw)
Tea/coffee station	<ul style="list-style-type: none"> • Sugar cubes instead of sugar sachets • Loose tea with reusable tea infuser • Public coffee and tea provisions, close to the room (e.g. one on each floor)

	<ul style="list-style-type: none"> • Sugar dispenser
Plates and cutlery	<ul style="list-style-type: none"> • Reusable cutlery (metal) and porcelain/ china crockery • Reusable hard plastic plates and cutlery • Single-use compostable/biodegradable plates and cutlery (wooden/cardboard/ bamboo/palm leaves/corn/wheat)
Water bottles	<ul style="list-style-type: none"> • Dispensers plus hard plastic cups • Glass bottles
Pre-portioned food items (jams, honey, chocolate, butter, cereals, yoghurt, etc.)	<ul style="list-style-type: none"> • Dispensers • Open jars/bowls • Pre-portioned without plastic
Single use sachets (ketchup, mayo, oregano, etc)	<ul style="list-style-type: none"> • Sauce dispensers • Providing sauce in bowls • Providing sauce in a bottle
Pre-portioned milk cups/sachets	<ul style="list-style-type: none"> • Milk cans/cups • Milk powder • Glass bottles

CONFERENCE ROOMS	
Plastic Item	Alternative
Plastic bottles	<ul style="list-style-type: none"> • Water carafes • Dispensers and glasses • Glass bottles
Plastic pens	<ul style="list-style-type: none"> • Pencils • Refillable pens
Coasters	<ul style="list-style-type: none"> • No coasters • Reusable coasters (wooden/bamboo/ cork/glass) • Single-use coasters (paper)
Single packaged sweets, cookies, nuts and others	<ul style="list-style-type: none"> • Provide snacks in bowls/on plates