

# WAVES OF CHANGE

## Stories From Tide Turners

2025







# CONTENTS

1.	MESSAGE FROM UNEP	PAGE 02
2.	ABOUT THE CHALLENGE	PAGE 04
3.	YOUTH-LED INDIVIDUAL ACTIONS	PAGE 06
4.	UNITED FOR CHANGE- COLLECTIVE EFFORTS FOR PLASTIC POLLUTION	PAGE 22
5.	TIDE TURNERS TRANSFORMING SYSTEMS	PAGE 36
6.	FUTURE REIMAGINED- YOUTH SUSTAINABLE LIVELIHOOD SKILLING	PAGE 50

ACKNOWLEDGEMENTS:  
WRITER: Rajeshwari Namagiri  
EDITOR: Sudeshna Shome Ghosh  
DESIGNER: Urban Talkies





## MESSAGE FROM UNEP

A healthy planet begins with action.

The Tide Turners Plastic Challenge's Champions Stories capture the spirit of action at its best. They highlight the inspiring achievements of young leaders who are not only dreaming of a better future, but building it, right now, right where they are.

Launched in 2018 as part of UNEP's "Beat Plastic Pollution" campaign, the Tide Turners Plastic Challenge has since brought together nearly one million young people across more than 60 countries. In classrooms, in communities, along coastlines and city streets, they are turning awareness into action, and action into real, lasting change.

This book is a celebration of their leadership, ingenuity and determination.

You will meet young visionaries like Anusweta from India, who turned plastic waste into life vests to address both pollution and flooding in her community. And Kenyan siblings Michelle and Jeremy Muchilwa, who pioneered youth organizing to tackle plastic pollution in Lake Victoria, spanning three countries.

The plastic scourge continues to threaten our lands, waterways, and oceans. But the stories you will read here show that when young people are in charge, they can find solutions and turn them into real-world results.

Young people are not just the leaders of tomorrow; they are leaders today. With courage and resolve, they are stepping up, speaking out and showing us the way forward. It fills me with great optimism to see young leaders, like these champions, many of them girls and women, in action.

The strength of the Tide Turners Plastic Challenge lies in its community-led approach and collaborative spirit. It brings together youth networks, civil society organizations, governments, and the private sector, while equipping young leaders with the knowledge, skills, and networks to become powerful voices, influence behavior, and advocate for policy change.

The Tide Turners movement shows what is possible when young people have the opportunity and the platform to lead. Awareness is just the beginning. Real results come from sustained advocacy, collective action, and community engagement.

Much more needs to be done. As we move forward, it is critical that we properly support youth leadership, through investment, partnership, and the political will to scale their solutions. The question is not whether we can end plastic pollution. It is whether we will choose to act with the urgency and determination it demands.

To the young champions featured here: your courage and commitment give me great hope. To our partners in government, civil society, and the private sector: this is your call to action.

The Tide Turners Plastic Challenge shows what is possible. Now it is up to all of us to turn that momentum into lasting impact.

Together, we can turn the tide. The future is in our hands.

**Dr. Susan Gardner**

Director, Ecosystems Division

United Nations Environment Programme

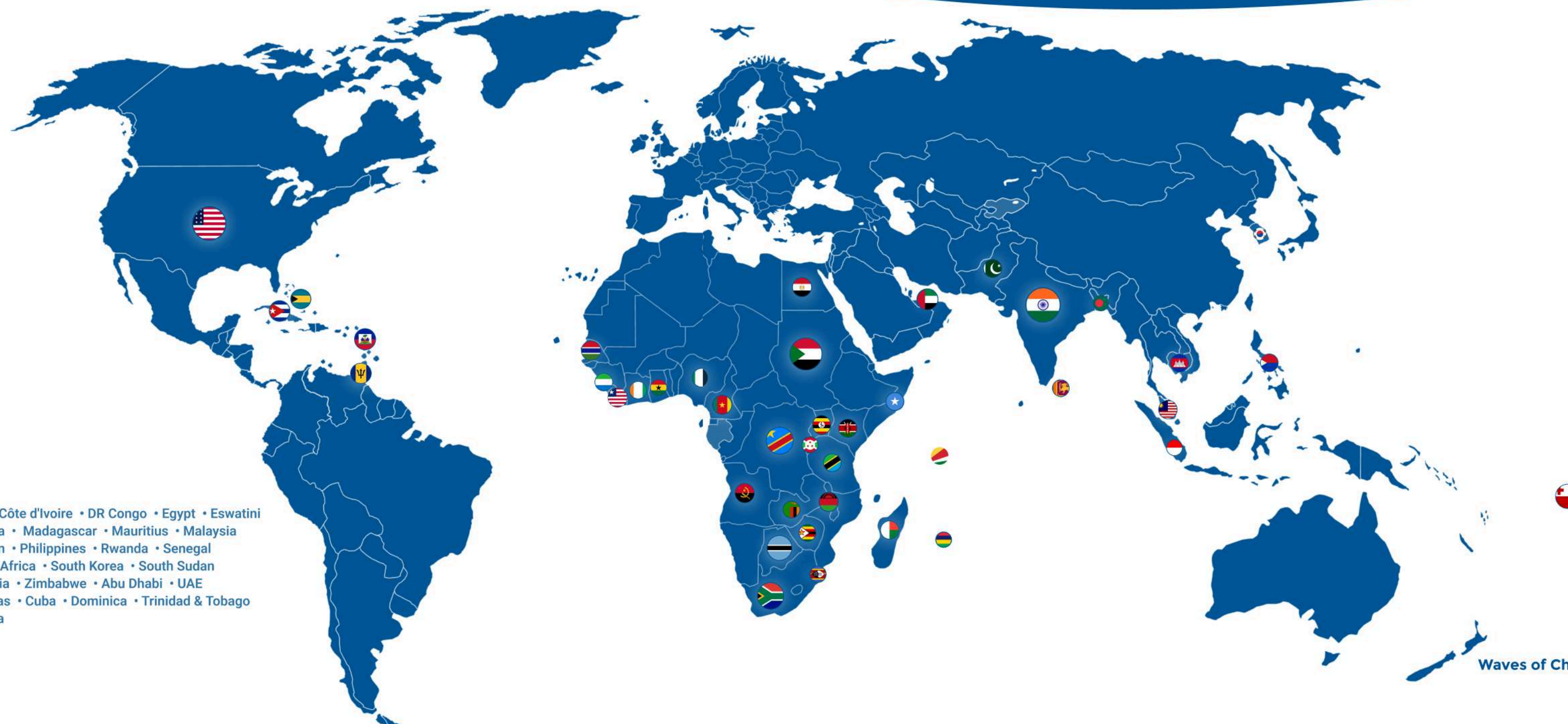




## ABOUT THE CHALLENGE

The UNEP's Tide Turners Plastic Challenge is a global youth movement empowering young people aged 11 to 35 to tackle plastic pollution by promoting behaviour change, reducing consumption, and leading sustainable initiatives in their communities.

Since 2018, nearly a million youth across 60+ countries have joined the challenge, gaining knowledge on single-use plastics (SUPs), exploring alternatives, and inspiring collective action. Through partnerships the challenge reaches local governments, schools, universities, youth groups from urban and rural communities, fostering leadership and advocacy for a plastic-free future. Young participants not only develop skills in environmental stewardship but also take an active role in driving community-led change, inspiring more citizens to join the fight against plastic pollution.



• Angola • Botswana • Burundi • Cameroon • Côte d'Ivoire • DR Congo • Egypt • Eswatini  
 • Gambia • Ghana • Indonesia • Kenya • Liberia • Madagascar • Mauritius • Malaysia  
 • Malawi • Nigeria • Namibia • Niger • Pakistan • Philippines • Rwanda • Senegal  
 • Seychelles • Sierra Leone • Somalia • South Africa • South Korea • South Sudan  
 • Tanzania • Thailand • Uganda • USA • Zambia • Zimbabwe • Abu Dhabi • UAE  
 • Bangladesh • India • Sri Lanka • The Bahamas • Cuba • Dominica • Trinidad & Tobago  
 • Cook Islands • Fiji • Kiribati • Samoa • Tonga





# YOUTH-LED INDIVIDUAL ACTIONS



01

# ANUSWETA'S JOURNEY

LIFE JACKETS FOR PEOPLE, SOLUTIONS FOR THE ENVIRONMENT



Anusweta, a TTPC Champion's story begins in Hailakandi, a district in Assam, India—through which the Barak River and its tributaries, Dhaleswari and Katakhal flow. Like in many cities and towns plastic waste is often burnt or discarded into rivers, exacerbated by a lack of awareness and recycling systems. “Most people throw plastics into rivers, unperturbed because what is out of sight is out of mind!” she observes. Consequently, rivers and tributaries are burdened with plastic waste. During a flood episode, a solution took shape in her imagination—a life-saving jacket made from repurposed plastic waste!

“My vision is to repurpose plastic waste into life-saving jackets, ensuring environmental sustainability and flood resilience, while empowering communities to navigate natural disasters safely.”



Hailakandi is prone to annual floods, exacerbated by extreme weather events attributable to climate change, which submerge acres of crops, leave thousands of people stranded and homes marooned. As rivers rise above danger levels, residents often have to evacuate to safety, wading through floodwaters, facing the risk of drowning. Her sewing skills that she learnt from her parents, a sense of empathy, and a concern about plastic waste, all played a crucial role in coming up with an innovative solution.

Anusweta was aware of the impacts of plastic pollution as a child. TTPC recognized Anusweta's efforts and served as a platform to advocate for addressing plastic waste and floods. The Challenge transformed her from a local innovator into a national champion. Since then, she has trained over 100 young women from flood-affected communities in Assam, Odisha, and Kerala.

“Every day now feels like I’m part of something bigger,” she says as she balances her studies and work on life jackets and preparing training modules.



## Did you know?

That river systems are becoming both reservoirs and highways for plastic waste, distributing it inland and into our oceans?

218 million people, or 3% of the global population is at high risk of facing plastic-aggravated flooding worldwide.

Every year 19-23 million tonnes of plastic waste leaks into aquatic ecosystems, polluting lakes, rivers and seas. (source UNEP)





## THE STORY OF DEJEA LYON FROM CAYMAN ISLANDS

Dejea Lyon grew up in the Cayman Islands, a British Overseas Territory, located in Western Caribbean Sea, South of Cuba. Her great-grandfather was a seafarer and her father ran a water sports company. Days spent exploring coral reefs and sandy shores cultivated a deep, abiding love for the ocean that developed into a mission to protect it.

In 2019, she attended her first policy advocacy training organized by TTPC partners. Like-minded young advocates, 300 of them from around the world, learnt the power of public speaking, campaign strategy, and effective policy advocacy, equipping themselves to be the voices of change.



Protect Our Future, Dejea's group, gained recognition when her first local conservation campaign saw success. A proposed cruise berthing facility in George Town Harbour that would have threatened the marine ecosystem, got stalled through petitions and peaceful protests, raising awareness of the environmental consequences. The group was affectionately dubbed as "the sheet kids" by the community for their hand-painted protest banners.

Her group again rallied the community to address the trash mound known as Mount Trashmore, the highest point in the Cayman Islands. They pushed for legislation to reduce plastic pollution

"Youths are only a certain percentage of the global population right now, but we're 100% of our future."  
- Unnamed fellow advocate of Dejea



despite challenges from COVID-19 and government changes, and left an impact on the community's awareness of plastic waste. She was honoured with the Diana Award in 2022, in acknowledgment of her commitment to promoting dialogue across generations.

She now studies Global Development and Sustainability at Bath Spa University in the UK one of the leading environmentally focused academic institutions. Her passion, anchored in the Cayman Islands, has blossomed into a lifelong commitment to the cause of environment and people.





03

## TEJ PRATAP WILL BUILD A FUTURE FREE OF SINGLE-USE PLASTICS



Tej Pratap Singh hails from Basdila village in Sakardih Panchayat in the Saran district of Bihar, India. A common sight in the village that concerns him is the water bodies filled with plastics, marring the beauty and causing environmental harm.

Tej enrolled in the University of Lucknow and joined the National Service Scheme (NSS). He got a chance to attend the TTPC Youth Leadership workshop. Tej registered for the Challenge as he was witness to the mess that plastics create. His first steps were small changes—refusing SUPs and encouraging others to do so.



As he became committed to the cause, he inspired his friends, a team of 15, seven women and eight men from the University to join him. Together, they led awareness campaigns in and around the university. Efforts like these instilled confidence to attempt something bigger and wider.

Opportunity showed up in the form of a popular Fair, a much awaited cultural event—the Kartik Mela— held on the banks of River Gomti during Diwali, the festival of lights. The Fair attracts large number of people, young and old filled with festive spirit. Tej and friends knew their message can reach a large number if they organized events in the Fair. They performed a street play, an engaging means to tell about the harms of SUPs to the thronging crowd.

The passion to address plastic pollution led him to see that Environment and Development are two-sides of the same coin. Every weekend he dedicated his time to teaching children in the Daliganj slum near his university. As a Champion, both Lucknow and Basdila became his canvas for action.

India accounts for about 20% of the total global plastic waste, the largest contributor globally-- approximately 9.3 million tonnes of plastic waste is generated annually.

Plastic pollution is both a seen and an unseen challenge. High-income countries have higher plastic waste generation rates, but none are ranked in the top 90 polluters, as most have 100 per cent collection coverage and controlled disposal.



Tej shares that he would push for policies to impose fines on plastic use to build a future free of single-use plastics. He stands testament to the idea that it is dedicated individuals like him that can lead the way to a cleaner and greener future.

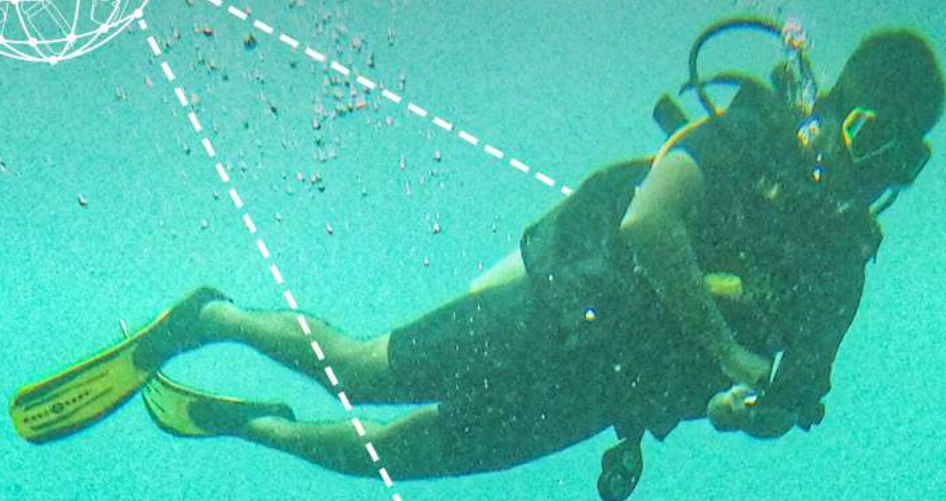




## CLEANING THE OCEAN—ONE DIVE AT A TIME

Lakshan Ranasinghe from Sri Lanka was fascinated by wildlife from a young age. Snakes, especially allured him, and he dedicated countless hours rescuing and relocating them from urbanized areas to their natural environment.

He joined the Young Biologists' Association where not only his scientific approach to conservation was honed but also led him to the ocean that surround the island nation. After obtaining Professional Association of Diving Instructors (PADI) diving license, he discovered a realm of wonder under water. Coral reefs, schools of fish and the quiet depths that were not only astonishingly beautiful - but also tragic, because of abandoned fishing nets (ghost nets) and single-use plastics; drifting across the seabed, endangering marine life.



Lakshan led reef and seabed clean-up operations clearing such debris and ghost nets. He got an opportunity to connect with the Tide Turners Plastic Challenge (TTPC) spearheading Young Biologists' Association and leading the team. It was gruelling work, diving into the depths to retrieve masses of non-biodegradable waste.

During a particularly memorable reef clean-up, he and his team, people of all ages and backgrounds, hauled enormous amounts of plastic from the ocean floor. It was sobering to be confronted starkly by the scale of the problem. Lakshan's commitment to the ocean didn't end with clean-ups. As a Dive Ambassador, he began mentoring young conservationists about the challenges of ocean conservation.

"Every small stretch of ocean floor cleared is a big victory in an immense fight."

- Lakshan Ranasinghe

Preventing Plastic Pollution is a Citizen Science initiative that aims to improve our understanding of plastic pollution from source to sea using a catchment based approach. Be part of this initiative, make your contribution.



Once, when a young diver was overwhelmed by the task and hesitated during his first clean-up dive, Lakshan understood the youth's trepidation. "We're all in this together," he said gently, "The ocean needs all of us."

Now as a veteran in the reef cleaning team, Lakshan spends much of his spare time educating and advocating and cleaning the ocean. He is also seeking sustainable solutions to prevent pollution at its source. But every stretch of ocean floor he helped clear was a victory, strengthening Lakshan's purpose.





05

## ALL THAT IT TAKES TO GET FISH BACK IN MITHI RIVER



Aaquib Shaikh, a young man from Mumbai, transitioned from aspiring mechanic to a team leader in the River Mithi Rejuvenation Programme, initiated by Afroz Shah, an Indian lawyer and environmental activist. In 2018, while walking near the river, Aaquib witnessed local legislators and community members cleaning the river. Inspired, he and his friend Amari took up to cleaning of the river.



Mithi River, one of four rivers flowing through Mumbai, has suffered severe pollution primarily from single-use plastics, reducing its role as a natural storm drain and contributing to flooding. It also directly discharges waste into the Arabian Sea. Shah recognized Aaquib's potential and trained him to educate the community about environmental issues. Aaquib and his team conduct a door-to-door campaign, reaching around 100,000 people to raise awareness about waste segregation and littering. A remarkable 70-80% of households now segregate their waste.

To sustain the improvements, they focused on reducing waste generation by nudging people to use cloth bags. As buying frequently in smaller quantities is one of the underlying reasons for extensive use of plastic bags, they are helping communities in buying goods in bulk packaging—which not only works out to be economical but reduces plastic waste. Similarly they have a programme called Veg Power, where they buy vegetables directly from Agricultural Produce Market Committee (APMC) at much lower price. Additionally, their Fami Freedom Programme educates women on using reusable sanitary products like cloth pads or silicone cups instead of non-recyclable pads.



💡 Did you know that small urban rivers can contribute substantially to plastic export to the oceans?

It is estimated that 82 million tons/year of plastic waste is mismanaged, of which 5.8 million tons/year end up in rivers.



Living near Mithi River Filter Pahada (called so, as trees are being planted along the riverbank to enhance water quality through natural filtration), his ultimate goal is to restore the 18 km river so that it can support aquatic life and provide clean water for local communities through their active engagement.



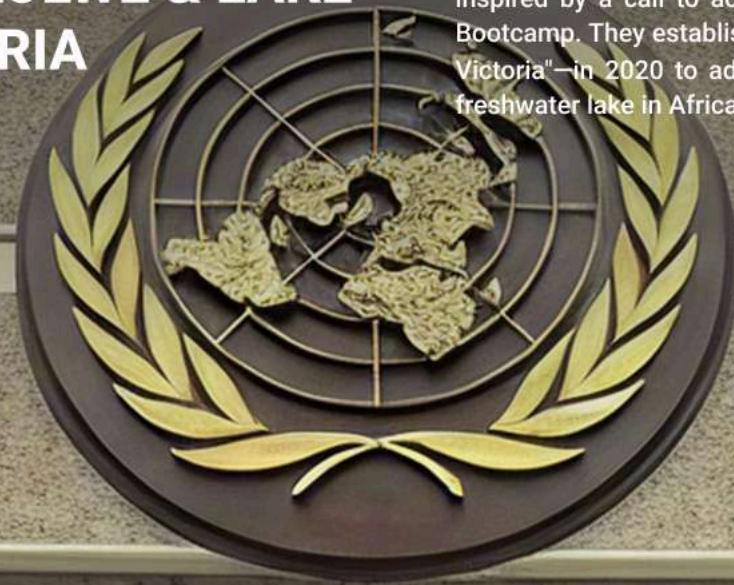


06

## OSIEPE SANGO: GUARDIANS OF NAM LOLWE & LAKE VICTORIA

In Kenya, on the shores of Lake Victoria, known as Nam Lolwe to the Luo people, lies Kisumu—a vibrant, bustling city alive with the hum of markets and fishing boats.

Siblings Michelle and Jeremy Muchilwa, 14 and 12 then, were inspired by a call to action from the Ocean Heroes Global Virtual Bootcamp. They established Osiepe Sango—Luo for "Friends of Lake Victoria"—in 2020 to address plastics pollution defiling the largest freshwater lake in Africa.



They learnt from their mother Millicent and mentor Dr. Chripine Nyamweya of the Kenya Marine and Fisheries Research Institute the complexity, and the need for both community and systemic interventions. In just four years, Osiepe Sango created a dedicated community space—a hub, in what is considered to be East Africa's largest street market—where the young come together to strategize, train, and innovate.

They launched initiatives like "Water You Waiting For?" School Groups, Scouts, Girl Guides, and Rovers led clean-ups, campaigned for policy enforcement, and educated market traders on the lake's plight.

Performances by the Amazon Theatrx Ensemble weave storytelling with an urgent call to action. Voice of Sango, was performed at the Kenya International Theatre Festival in 2023, sharing Kisumu's environmental battle on a national stage.

The Intergovernmental Negotiating Committee (INC) is a significant initiative established by the UN to develop a legally binding international instrument aimed at addressing plastic pollution globally.



By 2023, Osiepe Sango had mobilized over 600 young people, urging decision-makers to enforce Kenya's National Sustainable Waste Management Act of 2021. Their commitment earned the siblings the Princess Diana Award.

Michelle, now 18 and a student at the African Leadership Academy, recently represented TTPC and Planeteers at the United Nations, International Negotiating Committee (INC-3) in Nairobi. Jeremy, now 16, develops practical innovations for plastic collection, such as WALTER—an autonomous plastic detection and collection system. Both founders remain actively involved with Osiepe Sango, expanding its reach to safeguard Lake Victoria.





07

## SATYA'S CLEAN-UPS: SMALL & FIRST STEPS FOR A GIANT LEAP TOWARDS A PLASTIC- FREE WORLD



Satyabrata Samal grew up in Brahmanigaon, a sub-district close to Cuttack, Odisha, India, where the Mahanadi River flows into the plains and disperses into several channels before reaching the Bay of Bengal. Unfortunately, plastic waste is pervasive in the area—found in villages, along riverbanks, and on beaches. The absence of effective waste management systems has led to the widespread practice of burning plastic, which contributes to air pollution as well.



Witnessing the extensive plastic waste around him made it difficult for Satyabrata to remain indifferent. His enthusiasm grew when he was introduced to the Tide Turners Plastic Challenge (TTPC), which offered a platform and a structured approach for making a tangible difference.

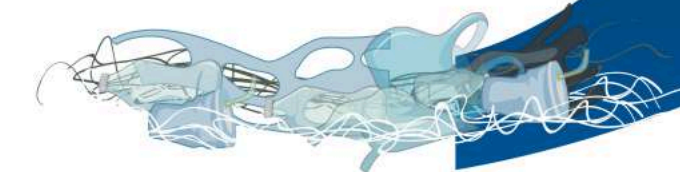
Recognizing the need for collective action, Satyabrata rallied like-minded individuals to create large-scale change. He and his volunteers collected used cement bags from construction sites for plastic collection. Through word of mouth and social media, they successfully organized over 650 campaigns, resulting in an impressive removal of six tons of plastic. These clean-up events became symbols of hope as they tagged government officials and municipalities on social media, inspiring others to participate.

One of their notable achievements was the clean-up of Shikharchandi Hills in Bhubaneswar, a small biodiversity hotspot that had been burdened with plastic waste. Satyabrata also popularized plogging—jogging while picking up litter—in the region and on the hills.



"I envision a ripple effect, where the actions of young people will inspire others to join the fight against plastic pollution."

-Satyabrata Samal



He founded the Sattvic Soul Foundation that organizes plogging events and awareness campaigns aimed at reducing plastic pollution. His technical background aids in understanding the complexities of waste management systems, allowing him to devise effective strategies for community engagement and environmental advocacy.







## UNITED FOR CHANGE COLLECTIVE EFFORTS FOR PLASTIC POLLUTION



08

## NO BARRIERS TO PLASTICS ACTION



The Tide Turners Plastic Challenge (TTPC) joined hands with Sparsh Drishti Badhit Girls and Boys Government Schools in Lucknow, the Blind People's Association in Ahmedabad, and NAB India Centre for Blind Women & Disability Studies in Delhi, an all-women school committed to ensuring that blindness does not limit a woman's aspirations or potential. Through interactive learning with tactile experiences, women were introduced to various facets of plastic pollution, learning to differentiate between single-use plastics (SUPs) and non-SUP items, identify different grades of plastic by touch and feel, and decipher the Grade Cycle Mark on products. A specially designed "Touch and Feel" activity was developed to enhance the understanding of visually impaired students on the impact of single-use plastics.



Additionally, a school for deaf and hard of hearing students in Lucknow participated in awareness activities, with teachers guided to use sign language to effectively communicate key messages about plastic pollution and its consequences. These engagements discussed the larger problem of plastic overuse, ways to reduce it, and the need to adopt environment-friendly solutions. The youth chose to turn to advocacy for social change to make a tangible difference in their communities. It began with pledging to "refuse single-use plastics" and spreading awareness among peers and other visually impaired people about the plastics challenge. They ensured waste was responsibly managed and segregated before disposal in their on-campus café. Cloth bags and reusable bottles were adopted. Although colour-coded bins posed a challenge, they found ways to overcome it by seeking support from friends, family, and community members.

### 💡 Did you know?

Did you know that you can make an informed choice regarding plastic use and disposal, using the Grade Cycle Mark or Resin Identification Code?

Look for the number ranging from 1 to 7 in the Möbius loop which consists of three chasing arrows forming a triangle, categorizing plastics based on their resin type and recycling properties.

Trivia: Gary Anderson, a 23-year-old student at the University of Southern California, designed the iconic recycling symbol in 1970 during the first Earth Day celebrations. The symbol consists of three chasing arrows forming a Möbius loop.

Participation in TTPC has planted the seeds of sustainable thinking in these young women. They envision a future where environmental awareness is inclusive, driven by community efforts, and fueled by each person's responsibility to protect the environment.

Their story serves as a reminder that environmental action transcends barriers, and everyone wants to be the change and see the change!





09

## SPECIAL ABILITIES, SPECIAL ACTIONS TO TURN THE TIDE AGAINST PLASTIC WASTE



Young athletes, over 100 of them, with special abilities from Special Olympics Bharat (SOB), Delhi, embarked on addressing plastic pollution. It all began with the Tide Turners Plastic Challenge (TTPC) — “Know Your Plastics” workshop, where they learnt the consequences of single-use plastics, and wanted to act.



At the SOB's National Youth Summit, 107 unified pairs (athletes with and without disabilities) and 33 mentors from states understood the impact of single-use plastics, devised a strategy to participate actively — each athlete with special ability was supported by a peer through a buddy system. They reached out to communities, using their annual outreach sports event, Pratishtha. In local parks, athletes and visitors participated in football matches, kicking balls at plastic bottles set up as targets to symbolize their stand against single-use plastic waste. They encouraged citizens to take a pledge to refuse single-use plastics by making hand impressions with coloured paint on a canvas.

80 youth joined the TTPC Youth Advocacy Session supporting youth-led sustainability efforts. Yashika Bhatt and Khushi Grover represented SOB at TTPC National Youth Summit 2024 and the Youth Consultation on International Youth Day.

SUPs detract the aesthetic appeal of and access to playgrounds by creating unsafe conditions. Plastics can discourage families, children, schools, and communities from utilizing them.

Many sports icons began their journeys in local playgrounds that serve as foundational environments where children develop their skills and passion for sports. Plastics can discourage families, children, schools, and communities from utilizing neighbourhood playgrounds.

The youth of SOB have a powerful message for the world: it takes everyone, united in purpose, to lead and act for a cleaner, plastic-free planet. Inspired by Nelson Mandela's words, “It always seems impossible until it's done,” they demonstrate that only collective and inclusive action can turn the tide against plastic pollution.





## DIET AGRA'S COMMITMENT TO ENVIRONMENTAL STEWARDSHIP

The District Institute of Education and Training (DIET) located in Ashok Nagar, Agra, Uttar Pradesh, India is part of a network of government-run teacher-education institutions, focused on primary and secondary teacher-training and resource development. Agra is a well-known city as millions visit the Taj Mahal. Solid waste and plastic pollution are significant problems that the city faces. River Yamuna and other water bodies are filled with plastic waste and drains are clogged. It is a problem that needs people's attention.



Environment Education activities carried out by the DIET demonstrate how prospective teachers could be trained to address challenges such as plastic pollution and prepare them to promote collective action in the region.

DIET Agra's Eco Club, led by master trainer Dr. Manoj Kumar Varshney seized the opportunity to join the TTPC. When classroom trainings failed to evoke enthusiasm of the trainees, a clean-up campaign was conducted on banks of River Yamuna which motivated the trainee teachers, especially girls.

Dr Varshney saw the potential of integrating Plastics Challenge in Socially Useful Productive Work (SUPW), to bridge the gap between theoretical knowledge and practical application while engaging trainee teachers in meaningful activities that could benefit both individuals and the community. This integration not only promoted practical involvement but also allowed for the assessment of students' academic performance during practical examinations.

To tackle the persistent issue of plastic pollution, we must prioritize low-cost strategies that promote pro-environmental behaviours through effective teacher training and curriculum integration, alongside economic incentives and technical solutions.



This approach incentivized trainee teachers—250 of them launched a series of initiatives to raise awareness on single-use plastics, organize clean-up drives, distribute paper bags, perform street plays and reach out to 150 schools to spread the message of harms of single use plastics.

Encouraged by DIET's reach, nearby institutions have taken similar steps to amplify the message. Integrating Plastic Action in the curriculum is a way to prepare future teachers to address plastic pollution in their practice.





## SELF-EMPLOYED WOMEN'S COMMUNITY IS MINDFUL OF THE PLASTIC PROBLEM

The Indian Academy for Self-Employed Women (IASEW), also known as SEWA Academy, is based in Ahmedabad, Gujarat, and focuses on empowering women from the informal sector who earn a living through wage labour or by running micro-enterprises. The Academy provides education, training, and capacity-building opportunities aimed at enhancing the dignity and welfare of self-employed women workers, who lack regular employment benefits.



As informal sector workers, plastic waste/ SUPs may be the last thing on their mind but the Academy wanted its members to be aware about issues around solid waste—as waste had an impact on their health, on their habitats and in their work. It was introduced to the TTPC. Sapna Raval and a group 20 women pursuing diverse livelihoods—home-based workers, agricultural workers, photographers, tailors, mehndi artists, doormat makers, and meena karigars (artisans skilled in embellishing fabrics)—participated in the three trainings. They learnt about the detrimental effects of single-use plastics and quickly understood the urgency of raising awareness within their communities.

With a commitment to education and community engagement, SEWA Academy employed relatable pedagogical approaches. Participants created informative posters which they displayed in their communities. They composed songs in their language—

A must-win battle for drastically reducing SUPs is the participation of individuals and communities in saying NO to plastic bags, straws, cutlery, water bottles, and consumer-packaged-goods.



gujarati—to communicate the importance of saying no to single-use plastic and adopting environment- friendly alternatives. The Academy developed radio programmes on various aspects of plastic waste for narrowcasting to communities, and encouraged communities to take tangible actions to reduce plastic use.

The Academy reviewed waste management practices on its campus and established a waste segregation system. Communities achieved a reduction of approximately 5.5 kg of waste per month. Awareness can provide a head start to foster attitudes to make informed decisions and take responsible actions towards the environment, irrespective of the circumstances.





12

## THE SOCIAL CHALLENGE OF SINGLE USE PLASTIC

It is ironic that while we value clean cities, we often view rag pickers as antisocial elements and a source of embarrassment. As waste continues to grow, an increasing number of youth turn to rag picking as a last resort to escape poverty and marginalization.

Many of these young individuals come from broken or impoverished families and face various health hazards and injuries in their work. Harsh realities of life drives many to substance abuse.



Youth conducted sessions for younger peers within the centre/ created wall murals on the issue of waste and plastics.

The TTPC emphasizes the ethical imperative for society to reduce single-use plastics, which constitute a significant portion of waste streams, disproportionately affecting rag pickers. This approach focuses on addressing the root causes of increasing waste rather than merely treating its symptoms.

The Tide Turners Plastic Challenge (TTPC) and the Society for Promotion of Youth and Masses (SPYM), a non-profit organization sat down with youth to discuss plastics challenge. Many had only seen plastic as a means of survival, but in these workshops, they learned about different types of plastic and the health and environmental impacts of unmanaged waste.





## VOLUNTEERING FOR A PLASTIC- FREE KERALA



The Kerala State Scout and Guide Fellowship (KSSGF) is a voluntary organization promoting the values of scouting and guiding among the people of Kerala, India. Since 2020, it has been actively raising awareness and taking action against plastic pollution in the region.

A key step in mobilizing over 2,000 volunteers, including youth and tribal communities, for clean-up drives was the availability of the Tide Turners Plastic Challenge (TTPC) toolkit in Malayalam language. KSSGF has conducted numerous clean-up events with the support of Malaya tribal communities, who are closely connected to the region's forests.



KSSGF has focused its efforts around Mangalam Dam and Forest in Palakkad District, as well as Snehatheeram Beach in Thalikkulam, Thrissur District. This is achieved through collaborations with the Kerala Forests & Wildlife Department, local governments (Gram Panchayats), supported and amplified by members from the World Malayali Association, students, social workers. Capacity-building initiatives have empowered youth and community members to take leadership roles in clean-up drives and promote sustainable practices. By recognizing outstanding contributions, KSSGF has motivated participants to remain committed to environmental conservation.

💡 Did you know that Plastic chemicals like phthalates, plasticizer, stearic acid and so on have a tendency to get bio accumulated? Let's protect Ecologically sensitive areas (ESAs) from such harm.



During these efforts, significant quantities of plastic waste—including bottles, wrappers, and packaging—were collected and handed over to the Material Collection Facility (MCF) of Thalikkulam Gram Panchayat and Haritha Karma Sena units for recycling.

Movements like KSSGF's can be sustained through localization, community engagement, and strategic partnerships while empowering individuals to engage in long-term environmental actions.







# TIDE TURNERS

## TRANSFORMING SYSTEMS



The National Cadet Corps (NCC) programme of the Ministry of Defence, Government of India, cultivates leadership, discipline, and patriotic fervour among 1.5 million youth with the rigour of a basic military training. The Puneet Sagar Abhiyan, launched on December 1, 2021, aims to restore the pristine condition of water bodies by tackling plastic pollution.



The NCC took up the campaign, focused on cleaning water bodies and coastal areas, striving for universal cleanliness. The boot camps and TTPC developed an understanding on the complex issue of single-use plastics (SUPs), its extent and dangers. A pivotal moment occurred when Cadets witnessed the Yamuna River in Delhi filled with plastic waste, reinforcing their mission to free water bodies and shores from plastic and other debris. The Cadets chose iconic locations like the India Gate in Delhi to perform Nukkad Nataks (street plays) for raising public awareness about SUPs.

After completing their training, Cadets returned to schools and colleges to share their insights, leading to the implementation of plastic-free initiatives. In the district of Ludhiana in Punjab, they engaged with local authorities to advocate for stricter waste management policies.



"Every citizen must protect and improve the natural environment, including forests, lakes, rivers, and wildlife."

-Fundamental Duties of citizens, Part IV-A, Article 51A(g), the Constitution of India



Each Cadet pledged to refuse SUPs, not only for themselves but also on behalf of their peers and families. Every clean-up and awareness drive fostered a culture of stewardship and the power of collective action for national development. Nation building through environmental action is a vital approach that integrates ecological sustainability with social and economic development.





## CHIEF MINISTER'S GREEN FELLOWS PROGRAMME TAKES ON PLASTICS CHALLENGE.

Environmental action fosters a sustainable relationship between humans and the environment. In Tamil Nadu, the Chief Minister's Green Fellows Programme empowers young people to specialize in environmental action, support the State government and District administrations, and mobilize collective action for various issues.



Chennai is particularly prone to flooding, largely due to clogged drains that fail to remove storm water—plastic waste being the culprit. Having faced the havoc, the government believed community level action would be a good place to start addressing the plastics problem. The Green Fellows joined the TTPC galvanizing collective action to combat the burgeoning plastic crisis.

The Green Fellows organized capacity building sessions in schools at the district level on plastic pollution, led clean-up drives in ecologically sensitive areas, and revived and integrated Manjappai with TTPC — customary practice of giving gifts/offerings to guests during celebrations in gift bag made of yellow-coloured cloth.

In Nagapattinam, motivated by the Green Fellow of the district, a local high school student Anika and a fisherman's son Rohan organized a beach clean-up, where volunteers collected over two tons of plastic in just one month. Recycling stations were also established in schools and public spaces to encourage waste segregation at the source.



To effectively address plastic waste, each tier of governance should develop unique strategies that eliminate plastic waste leakage and make at-scale waste management solutions work to increase plastic circularity.



Through awareness campaigns, workshops, and street plays in partnership with local leaders, the Green Fellows reached diverse audiences, from schoolchildren to senior citizens. The Tamil Nadu Green Fellows Programme serves as a powerful example of how subnational governments can effectively mobilize environmental action to address pressing issues like plastic pollution.





## SPOTLIGHT ON DIRECTORATE OF EDUCATION, DELHI

Plastic waste pollution has emerged as a formidable environmental crisis, gripping both national and subnational governments. The Plastic Waste Management Amendment Rules, 2021, introduced a ban on specific single-use plastic items in India.

The Directorate of Education (DOE), Delhi decided to implement the TTPC in schools of Delhi engaging students from grades 6 through 12. Eco clubs in 1500 schools joined the programme. The Department of Environment provides a grant of INR. 20,000 (USD 230) to each club to fund its activities.



Schools were trained and guided to carry out a variety of activities. Schools introduced a "Plastic-Free Campus" policy where the school community refused SUPs. Outreach activities included rallies, clean-up drives, and awareness campaigns motivating families and neighbours to shun SUPs, street plays, and organizing competitions.

A school organized an expert talk on the use of reusable menstrual products. Kamal Model Senior Secondary School transformed collected waste into eco-bricks for building benches. Schools displayed TTPC achievements to share Eco Club's accomplishments to highlight the salience of action. The DOE stood by its own example of not using SUPs—it printed standees on canvas instead of flex.

To quote renowned educationist, Krishna Kumar who said, in the context of curriculum (the totality of student experiences that occur in an educational process) that it "is related to our perception of what kind of society and people we are, and to our vision of the kind of society we want to be." Kumar, K. (2008). What is worth teaching, Orient Blackswan?

The plastic waste problem of Delhi, like in most Indian cities, is multifaceted—growing tonnage, high loads of single-use plastics, ineffective segregation practices, landfill overuse, and insufficient public awareness. Plastic waste is a problem of problems!



The observation highlights the crucial link between curriculum development and societal values, emphasizing that education should reflect humanity's aspirations for a sustainable future. The Directorate of Education's work in addressing Plastic Challenge stands as a shining example of educational excellence.





## SPOTLIGHT ON SHER-E-BANGLA NAGAR GOVERNMENT GIRLS HIGH SCHOOL AND ITS STUDENT- LEADERS

Three eighth-graders from Sher-e-Bangla Nagar Government Girls High School in Dhaka, which has 2,100 students, are working to eliminate single-use plastics from their school and community. After participating in an online training programme with the TTPC, they were ready to implement their plans when schools were closed for over three months due to a heatwave and political unrest. Instead of abandoning their initiative, they adapted and successfully convinced over 50 local households to reduce their use of single-use plastics.



When schools reopened in September, an in-person Training of Trainers session was organized. Zareen, Tasnim, Shraddha, youth leaders, along with her classmates, Afsara Nawar and Nusrat Jannat Takwa, conducted 40-minute training sessions for students in other grades, effectively spreading their message. Soon they began training peers from other schools as part of their extracurricular activities.

They went on to collaborate with the Rotary Club of Ramna to lead a campaign at Dhaka Ideal Cadet School in Rayebazar. This initiative reached nearly 200 students and 20 teachers, providing hands-on training aimed at reducing plastic use.

Never underestimate the power of School action! It can stack environmental efforts by integrating sustainability into the curriculum and empowering students to lead impactful initiatives.



It all began with Ms. Syeda Jinnatun Noor's motto "আমি আমার বিদ্যালয় পরিষ্কার করবো, আমি আমার বিদ্যালয় পরিষ্কার রাখবো" which translates as "I will make my school clean, and I will keep my school clean". Senior Teacher Ms. Aparajita Roy introduced sustainable practices – water dispenser, reusable stainless steel tumblers, glass water bottles and cloth bags. Waste management was streamlined. One change led to the other. Collective action became the norm. Students started composting garden waste, they developed plans to green the roofs to ensure thermal comfort in the classrooms, cared for trees for in the school campus.

The school serves as an example of how commitment can drive change, address pressing environmental issues and build leadership competencies in students and contribute positively to their communities.





## MISSION LIFE— MAKING THOL LAKE, A RAMSAR SITE, PLASTIC-FREE

Thol Lake, located near Ahmedabad in the Mehsana district of Gujarat, is a wetland on the Central Asian Flyway (CAF), a major migratory route for birds that extends from the Russian Altai Mountains in the north to the Indian subcontinent in the south. This wetland, covering an area of 699 hectares, supports over 300 bird species, both resident and migratory.



Recognizing its ecological significance, Thol was declared a Wildlife Sanctuary in 1988 and a Ramsar Site in April 2021. Ramsar Sites are wetlands of international importance recognized for their biodiversity and ecosystem services.

Due to its proximity to a large city, Thol Lake has become a popular recreational destination, attracting visitors, higher in number than bird watchers and photography enthusiasts. However, the increase in visitors has led to a rise in plastic waste, posing a threat to the habitat along the CAF and detracting from the lake's natural beauty.

"Of 265 bird species recorded entangled in plastic litter, at least 147 species were seabirds (36 per cent of all seabird species), 69 species freshwater birds (10 per cent) and 49 land bird species (0.5 per cent)".



In response to this challenge, the Gujarat Environment Management Institute (GEMI) invited youth to participate in an environmental project aimed at cleaning up Thol Lake under Mission LiFE—India's flagship campaign launched at COP26 in Glasgow in 2021. On International Youth Day in 2023, 90 young participants were educated about plastic pollution before engaging in a clean-up drive. The effort resulted in the collection of 80 kg of plastic waste, highlighting the urgent need for action and prompting the Gujarat Forest Department to enforce stricter implementation of its plastic-free site policy established after Thol became a Ramsar Site.





## PLASTICS, GREEN AUDIT & LIFESTYLE CHANGES

The Sustainable Schools Initiative (SSI), a flagship programme of the Environment Agency Abu Dhabi (EAD) in the UAE, empowers students aged 11-18 to promote sustainability in schools and communities. The initiative focuses on critical themes such as air quality, water use, waste management, biodiversity, and climate change, emphasizing hands-on learning, critical thinking, collaboration, and lasting impact through four key components: the Green Audit, Eco-Club, Field Trips, and Train-the-Trainers.



EAD has partnered with the TTPC to eliminate single-use plastics from students' daily lives. This initiative aligns with the UAE's landmark decree banning six single-use plastic items and plastic bags. The challenge engaged environmental clubs from 20 public and private schools in Abu Dhabi, with a total of 150 schools participating in the 2020-21 academic year.

Through the Green Audit, it supported students to track consumption of packaged drinking water—a main source of single-use plastics and other SUPs like poly bags and single-use cutlery and make necessary lifestyle changes. Audits revealed a dramatic reduction in plastic use: among 239 students, poly-bag users decreased from 88 to 15, daily packaged water users dropped from 24 to two, weekly single-use cutlery users fell from 56 to nine, and packaged food users reduced from 14 to just one.

As of 2017, 1 million plastic bottles are sold every minute, globally.

Plastic audit is a good practice that institutions/Individuals should follow to identify the sources and extent of single-use plastic usage.



In total, 80 students reached the Champion level in the challenge, with 20 exceptional students recognized among 385 submissions. The following year saw an increase to 1,188 submissions, with 99 achieving Champion status.







## **FUTURE REIMAGINED YOUTH SUSTAINABLE LIVELIHOOD SKILLING**



20

## MISSION TO REPLACE PLASTIC PLATES WITH LEAF PLATES



A group of 10 dedicated individuals from the Gond tribe in Nata Panchayat (smallest administrative unit of rural India) has taken on the pressing issue of plastic waste. Located in the Paraswada Panchayat Samiti of Balaghat district, Madhya Pradesh, India, this Panchayat is surrounded by dense forests and lies near the Wainganga River.

Discarded plastic accumulates in streams that merge with the river that carries it deep into the forest during monsoon rains, threatening fragile ecosystem. This concern sparked the formation of the group called "Shristi Samoh."



Having been oriented by the TTPC, Shristi Samoh members surveyed six villages to assess perception around plastic usage. It confirmed a significant dependency on plastic products particularly, use of plastic plates in social gatherings and eateries.

Even though a significant number of survey respondents acknowledged the dangers of plastics, none shunned the use of plastics. While the community uses eco-friendly leaf plates, bulk availability in a functional design may be a barrier.

With this insight, Seema Kumray and Lalita Kumray introduced pattal (pronounced 'puh-tahl') or leaf plates made by stitching together broad tree leaves like that of Sal that grows abundantly in the region. Young women from Bariyal Tola village, 25 of them, were trained to use a machine to press, shape, and mould Sal leaves uniformly for high-speed production. Transition to innovative design combined with speed gave the product a market edge.



Plastic plates, which make up a big part of the 5,600 tonnes of plastic waste generated in India daily serve can be replaced with leaf plates, and market readiness matters—meeting the needs of users in terms of design, at an affordable cost, in required quantities at all locations, all year round.



Education and awareness remain central to the group's mission. It educated 106 youth from five schools in Nata and Khalondi panchayats on plastic pollution.

Shristi Samoh plans to expand its market reach to eateries near Kanha National Park, a popular destination 30 km away that attracts a large influx of tourists. It is now on an unstoppable mission to replace Plastic Plates with Leaf Plates.





## KEEPING SEAS CLEAN AND SAFE LOST AT SEA, BROUGHT TO THE SHORES

Fishing gear, primarily composed of plastic polymers is problematic when "abandoned, lost, or otherwise discarded" (ALDFG) at sea. Also known as ghost gear, it comprises largely of gill nets, nylon and polypropylene ropes. Such derelict gear has extensive social, economic and environmental impacts. Unlike other plastic waste that enters oceans from coasts and shipping, ALDFG has a disproportionate impact on living marine resources through entanglement, ingestion, and ghost fishing (lost gear continues to catch and kill marine life).

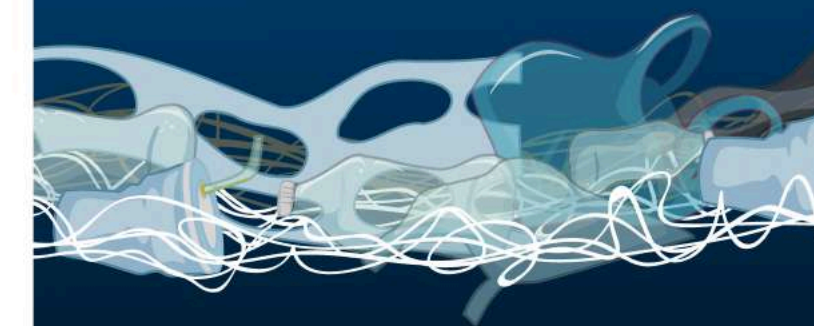


Ghost gear and plastic waste that they were pulling up was interfering with the catch of fishers of Mangamaripeta, a fishing village on the east coast along the Bay of Bengal under the Greater Visakhapatnam Municipal Corporation, in Andhra Pradesh. Plastic catch was a menace that was only growing.

The Tide Turners Plastic Challenge identified the efforts of young fishers who voluntarily were bringing back ghost gear. Once brought on to the shore, the gear lay abandoned, which the tourists and visitors' resented.

An expert taught 25 young women from the locality a unique weaving technique using jute ropes and ghost gear collected by fishermen to create utility products such as coasters, pen stands, and sling bags. This example demonstrates that achieving plastic circularity requires collaboration and an incentive mechanism, with significant potential for scalability.

- It is predicted that nearly 2 per cent of all fishing gear that is used becomes "abandoned, lost, or otherwise discarded" (ALDFG), annually.
- Over 640,000 tons of fishing gear is lost, abandoned or discarded in the ocean worldwide every year.



What stands out is that youth from a fishing community is taking plastic pollution seriously because they are feeling its impact on their livelihoods, surfacing the need for life-cycle approach in management of fishing gear. Awareness among the fisher youth is a ray of hope and will facilitate action as ALDFG remains a threat to sustainable fisheries and global food security.





22

## PRO-ENVIRONMENT SKILLING



A group of 10 women, from Ghumasan Panchayat, in Mehsana District, Gujarat, India run Jalnidhi Gram Haat that sells cloth bags. They saw the potential of cloth-bag making because their own Panchayat turned into an eyesore with plastics littered along streets, open lands, and even on trees. Cloth bags were the solution to the problem.



Through TTPC they were provided Skill Development and Entrepreneurship training that honed their tailoring skills to produce cloth bags and market them to promote self-employment. The bags were made from old but intact saris and other apparel, established a 'bag center' that sold them quite cheap. They tasted success when they sold over 1000 cloth bags in just a few months not just in their Panchayat but outside too.

To get the community engaged for the transformation, the group organized meetings, discussing the detrimental effects of plastics. Their message was clear—by choosing reusable bags, users could help protect villages, towns and cities from plastic litter. The benefits of cleaner and healthier streets resonated with residents. Gradually, the community began to embrace the solution, encouraged by the quality and affordability of the alternative. With community participation, the once plastic-laden public spaces of Ghumasan were becoming free of plastic.

Not all cloth bags are created equal! To truly maximize their environmental benefits, it's essential to use them consistently and crafting them from recycled materials!



Their single aim was to wean users from plastic bags. They focused on cost and access barriers which ensured that people adopted cloth bags. Visible changes in the environment gave a positive push. The Jalnidhi group did one thing right—promoting cloth bags, even if it was a simple solution, with insight and persistence.





## BARTAN BANK— A BANK OF STAINLESS STEEL UTENSILS AND CUTLERY

Deenanath, a youth leader from Baundi Panchayat near the Ghaghra River in Bahraich, Uttar Pradesh, feels anxious seeing plastic littered on land and in the river. He understands the impact of pollution on aquatic life, having actively participated in conservation efforts for the Ganges River dolphin.

Deenanath and other like-minded youth from the village linked the rise in single-use plastics (SUPs) to weddings and community events, which have shifted away from reusable cutlery in both urban and rural areas. The large amounts of waste generated from these events often are dumped on land, in the river, or burnt, causing significant environmental harm.



Deenanath and friends joined the TTPC as they were quite concerned with plastic waste. They surveyed the quantity and type of SUPs being used during social events, the cost and disposal practice. They found five main types—plates, tumblers, bowls, spoons and forks were mainly used. For every 100 guests, 1000 units costing INR 3,500 (USD 40) would be spent.

In a workshop, they deliberated with experts on possible strategies that would lead to a reduction in the use of SUPs. After much thought, the group agreed upon setting up a Bartan Bank—loosely translates into a bank of stainless steel/metal cooking and serving utensils and cutlery— food plates, tumblers, dishes and spoons. Each member contributed some capital with matching contribution from TTPC to set up the Bartan Bank.

Let's bust this myth: Plastic recycling fails economically and environmentally. Rising fuel costs, toxic additives, and competition from new plastics hinder its viability. We must prioritize reducing plastic consumption instead.



Thus was born the Prakriti Mitra Bhoj Sewa Kendra, established under Skill Development and Entrepreneurship initiative aligned to TTPC objectives. The community could hire the utensils at a nominal cost. To make it a viable enterprise, two youth were trained on various aspects of making the enterprise economically viable. The Bartan bank today serves 7-8 villages in the vicinity.

Deenanath and friends showed that anxiety can be channelled into action, in finding a group with similar concerns, and together designing solutions like the Bartan bank.





# HOW ARE PLASTICS LINKED TO THE SUSTAINABLE DEVELOPMENT GOALS?

<b>1</b> NO POVERTY 	<b>2</b> ZERO HUNGER 	<b>3</b> GOOD HEALTH AND WELL-BEING 	<b>4</b> QUALITY EDUCATION 
<b>5</b> GENDER EQUALITY 	<b>6</b> CLEAN WATER AND SANITATION 	<b>7</b> AFFORDABLE AND CLEAN ENERGY 	<b>8</b> DECENT WORK AND ECONOMIC GROWTH 
<b>9</b> INDUSTRY, INNOVATION AND INFRASTRUCTURE 	<b>10</b> REDUCED INEQUALITIES 	<b>11</b> SUSTAINABLE CITIES AND COMMUNITIES 	<b>12</b> RESPONSIBLE CONSUMPTION AND PRODUCTION 
<b>13</b> CLIMATE ACTION 	<b>14</b> LIFE BELOW WATER 	<b>15</b> LIFE ON LAND 	<b>16</b> PEACE, JUSTICE AND STRONG INSTITUTIONS 
<b>17</b> PARTNERSHIPS FOR THE GOALS 	<p>The Sustainable Development Goals (SDGs) are 17 global targets adopted by all UN Member States in 2015 as part of the 2030 Agenda for Sustainable Development, aiming to end poverty, protect the planet, and ensure prosperity for all. Taking action against plastic pollution contributes to these goals by promoting environmental sustainability and responsible consumption. Every effort, no matter how small, plays a role in driving progress toward a more sustainable future—because even one person can make a difference.</p>		

## SUPPORTING PARTNERS



