The GEF Small Grants Programme

COMMUNITY ACTION GLOBAL IMPACT

BUILDING AFFORDABLE SCHOOL STRUCTURES USING PLASTIC BRICKS MADE FROM PLASTIC WASTE TO PROMOTE ZERO PLASTIC WASTE IN SIERRA LEONE

Project No : SLE/SGP/OP7/Y2/CORE/CH/15/10/2021/17

Grantee: eWomen Sierra Leone

Location: Makeni, Bombali District

SGP Contribution: USD $20,000

Cash Co-Financing: USD $ 0

In-Kind Co-Financing: USD $13,911

Project Duration: 12 months

Number of people served: 1,140

Focal area: Chemicals and Waste

BACKGROUND

Makeni the regional headquarters of the Northeastern Province in Sierra Leone is faced with a serious waste management crisis due to inadequate infrastructure and poor law enforcement or complete absence of waste management policies. The situation is further compounded by limited innovation, low involvement of young people in waste management efforts and insufficient funding for sustainable waste solutions.

Community-level plastic waste collection or transit points are unavailable and the capacity for plastic recycling practices such as conversion into plastic bricks and other products are limited. Additionally, there is a pressing need for widespread environmental awareness campaigns to inspire behavioural change and create green job opportunities. Established to tackle Sierra Leone's growing waste management challenges, eWomen Sierra Leone a CBO initiated this project aimed at addressing the pressing environmental and social challenges in Makeni City through innovative and sustainable approaches.

FUNDING SUPPORT

eWomen Siara Leone received an initial support of USD 5,000 as a planning grant from GEF Small Grant Programme in 2018. Their pilot project focused on empowering NEET (Not in Education, Employment, or Training) youth through social enterprise initiatives including waste management, bakery, tie-dye, and female-operated "keke-taxis."

Following early successes, the organization secured additional SGP funding of USD 20,000 in 2021 to implement a project titled "***Building Affordable School Structures Using Plastic Bricks Made from Plastic Waste to Promote Zero Plastic Waste in Sierra Leone***".

This intervention gained national traction leading to national and international recognitions.

PROJECT ACTIVITIES

1) Construction of Eco-Friendly School Infrastructure using innovative plastic bricks made from recycled plastic waste.
2) Community and Stakeholder Sensitization Campaigns to educate them on the importance of achieving zero plastic waste and fostering environmental responsibility.

3) Promotion of Plastic Recycling Initiatives boosting local engagement in sustainable waste management.
4) Empowerment of Youth as Zero Waste Ambassadors to lead advocacy efforts, educating peers, and promoting sustainable habits within their communities.
5) Environmental Clean-Up and Waste Management Impact.
6) Creation of Green Jobs and Livelihood Opportunities.

IMPACTS

1. Development of Eco-Friendly Playgrounds:

The project funds supported the construction of one eco-friendly playgrounds by using waste materials including waste tires. The Playground was established at Sierra Leone Church Primary School in Rogbaneh Community, one of the largest primary schools in Makeni City. The playground serves as a safe recreational space for over 1,000 children thus demonstrating how waste materials can be repurposed for community benefit. The school formed a Nature Club with 24 pupils (12 girls and 12 boys) who undertake periodic awareness raising and environmental sanitation/cleaning with 3 trash bins introduced in the school. The project supported trees planting and beautification with 8 flowerpots in the school vicinity. Furthermore, 5 education seminars were organized for teachers and school pupils.

2. Cleanest Community Competition:

The project introduced the first-of-its-kind "Cleanest Community Competition" in Makeni City which had seven administrative wards as competitors (with at least 35 community members each). The wards included Wusum, Rogbaneh, Market, Maslasci, Teko, Banana, and Mayanka. The competition promoted cleanliness, environmental stewardship, and community innovation whereby plastics waste was converted into useful products. The competition also promoted the formulation of action plans with sustainable solutions for local challenges on waste management and environmental conservation. The plastic waste collected were recycled into eStones that are now utilized for paving of school compounds and sidewalks for a reasonable cost. This has led to 7 business opportunities generating income and employing over 150 youths.

3. Training and Capacity Building:

The project provided trainings to beneficiaries of the Cleanest Ward Competition and formed 3 groups with different essential skills to transform waste to wealth. As an innovation, the project adopted and modified the traditional weaving equipment to one that can weave plastic waste into clothing designs to produce several products like back packs, shopping bags, mats, jackets and many more. Also, the project empowered two ladies as Okada Riders and registered them with the Okada Riders Union at Baana Ward being the first females in Makeni to be involved in Okada Riding.

4. Support for Community Innovations:

The competition has generated innovative solutions including Wusum Ward's waste collection and Rogbaneh's manual tricycle for plastic waste collection. These have led to the establishment of the business start-up ideas like "Dear Plastic" dedicated to the Zero Plastic Waste Campaign in Makeni City and its surroundings and "iDesigns Sierra Leone" which focuses on transforming waste into fashionable products.

iDesign

IMPLEMENTATION STRATEGY

The Cleanest Community Competition engaged youth groups from seven administrative wards in Makeni Cty, empowering them with skills to create opportunities from waste (waste-to-wealth and zero waste campaign) and other challenges. Each ward received two large bags made from waste materials and two EcoTrikes (manual tricycles made from scrap metals and bicycle parts) to aid in the collection of plastic waste. Instead of directing their plastic waste to municipal waste collections, these wards have successfully recycled their wastes since 2022 amounting to around 15 tons.

Youth groups trained in sensitization and community engagement skills have conducted door-to-door campaigns covering over 1,500 homes and 12 communities. This effort encourage to utilize their organic waste for compost making. Key successes include functional agri-businesses, urban gardens, nurseries using organic manure, eco-friendly playground, furniture fabricated from waste tires, outdoor or sidewalk paved with eStones, back packs, shopping bags and eco-friendly menstrual pads produced from plastic waste.

A "cleanest competition" was declared among the wards, focusing on several criteria including, no burning of waste, commitment to stop littering, creating business opportunities from waste, establishing urban gardens to aid urban ecosystem restoration, beautification of households through tree and flower planting, collection of data for development planning, and innovative thinking to make their ward the cleanest.

The urban sustainability initiative focused on clearing illegal dump sites, recycling plastic waste into useful products, and turning organic waste into compost for crops, thereby promoting the food and agriculture sector. Additionally, the initiative promoted community sensitization on smart climate-friendly composting techniques.

SCALING UP AND REPLICATION

The Cleanest Community Competition, spearheaded by eWomen Sierra Leone, exemplifies innovative, cost-effective, and community-driven waste management solutions. By harnessing locally available materials, primarily waste, at no cost, the competition promotes sustainable practices and fosters community ownership. This initiative serves as a scalable prototype, showcasing affordable technologies that can be replicated in numerous communities where resources are abundantly available.

Moreover, eWomen Sierra Leone identified three impactful startups that emerged from the project, representing a significant return on investment. “iWaste” pioneers recycling techniques, crafting eco-friendly playgrounds, furniture, flowerpots, and other products from waste. Meanwhile, “iDesigns” specializes in transforming waste into fashionable goods, including backpacks, shopping bags, computer bags, travelling bags, rugs, jackets, caps, and many other stylish and fashionable items. “Dear Plastic” champions zero plastic waste initiatives and sustainable agricultural practices to combat climate change with its self-made EcoTrike (manual tricycle) as a brand. These startups have demonstrated the value of waste as a resource for wealth creation, employment opportunities and empowerment for youth and environmental stewards.

Combining entrepreneurship with the above initiatives presents a smart strategy for scaling up, as it attracts young people to use waste to create business opportunities leading to job creation. Furthermore, organizing pitch events with themes focusing on waste management with grants or financial rewards, will attract aspiring young innovators and entrepreneurs who need seed-money to invest in the opportunities. This approach will address waste problems and generate job opportunities to foster economic growth for the youth.

STAKEHOLDER PATICIPATON

eWomen Sierra Leone values collaborations with key stakeholders, including the Environment Protection Agency (EPA), Local Councils, young innovators, development agencies, UN agencies, and the private sector. These partnerships have been instrumental in the successes, such as the launch of the Cleanest Community Competition.

The organization has capacity for developing entrepreneurs and delivered capacity-building training. These efforts are integral to driving sustainable development and fostering innovation in Sierra Leone.

PROJECT HIGHLIGHTS

1. **Initiative Launch:** The project " **Building Affordable School Structures Using Plastic Bricks Made from Plastic Waste to Promote Zero Plastic Waste in Sierra Leone**" was launched with support from the UNDP Global Environment Facility, Small Grants Programme (GEF SGP).

2. **Eco-Friendly Playgrounds:** Development of Children's Playground at SLC Primary School, utilizing waste tires to create a safe and engaging space for children, showcased the potential of repurposing waste materials for community benefits.
3. **Community Engagement:** The Cleanest Community Competition was initiated, involving all seven administrative wards in Makeni City, fostering a spirit of cleanliness, environmental stewardship, and innovation among the communities.
4. **Skill Development:** Training sessions were conducted, focusing on data collection, waste transformation into valuable products, combating deforestation, strengthening local byelaws, and promoting leadership and youth participation.
5. **Waste Management Startups:** The competition spurred the creation of Wusum Ward's Waste Collection startup which developed efficient waste management practices within the community.
6. **Innovative Solutions:** Rogbaneh ward introduced manual tricycles for mobile plastic waste collection, enhancing the efficiency and sustainability of local waste management efforts.
7. **Dear Plastic:** The support and competition facilitated the establishment this startup dedicated to promoting the Zero Plastic Waste Campaign in Makeni City.
8. **Fashion from Waste:** Maslasci ward's iDesigns Sierra Leone emerged, transforming waste materials into fashionable products, demonstrating the creative and economic potential of recycling and upcycling efforts.

The supports from GEF Smll Grants Programme created the platform for eWomen Sierra Leone to breakthrough with numerous impactful initiatives drawing award and sponsorships both locally and globally as highlighted below:

- Won the EU-UNDP funded formalization project – Amount USD 40,000
- Won the Sierra Leone Economic Diversification Project grant of USD 70,000 in 2023, enabling the upgrade of its two offices into a Tech Hub and Entrepreneurship Support Creative Space.
- Received a GIZ grant of SLe 250,000 (USD 10,869), which facilitated the acquisition of land for establishing eWomen's proposed EcoWaste Innovation Hub.
- Garnered both international (Impact Plus USD 1,000) and national awards of SLe 70,000 (USD 3,043) for creating an eco-friendly trash bin from waste tires.
- Secured a contract of Sle 300,000 (USD 13,043) with Sightsavers to write a Comic Guide for Youth with Disabilities in Citizenship and Political Participation.
- Secured an award-winning Sle 50,000 (USD 2,173.9) by developing a manual tricycle, called EcoTrikes, to serve as mobile plastic waste collection points.