

IMPROVEMENT OF ECOSYSTEM HEALTH & WATER QUALITY BY IMPLEMENTING A SOURCE TO SEA BASED APPROACH TO TACKLE MARINE LITTER IN FIVE PRIORITY RIVER SYSTEMS IN KWAZULU-NATAL, SOUTH AFRICA









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Project Background

Overall Objective

To reduce the impacts of litter on the freshwater, coastal and marine environment by implementing river basin wide interventions to recover land-based and riverine based litter, thereby reducing marine litter flows, and reducing litter generation at source.

Specific Objectives

- 1. Investigate areas of litter concern/hotspots (esp. in poorly serviced/unserviced/underserviced areas) along each of the 5 priority rivers.
- **2. Deploy litter recovery resources**, including increased clean up efforts, to recover litter from the identified priority rivers, including the deployment of 5 litter interception devices (one in each river).
- 3. Monitor and evaluate (characterise) the types and quantities of litter collected in the 5 rivers, including an assessment of the microplastics in the freshwater system.
- **4. Identify and implement at least 1 low-cost waste management intervention** (such as waste sorting and recycling) in one community per priority river.
- **5. Undertake educational activities and awareness raising campaigns** (to schools & communities within the hot spot areas) around litter prevention from land-based sources.
- **6. Undertake a review of the project** with a view to potentially replicate to other coastal areas in South Africa.









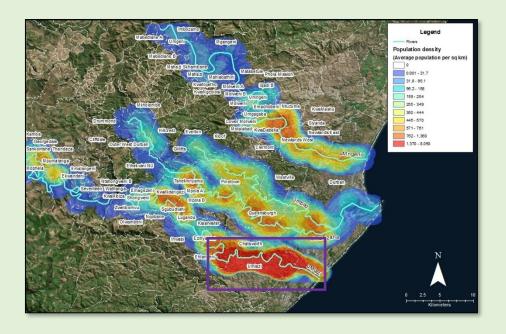


Project Background

Project location

- eThekwini Metropolitan Municipality (Durban),
- Rivers to be targeted:

uMngeni River into Durban North Beach; uMlazi River into Cuttings Beach; uMbilo River into the Durban Bay; uMhlatuzana River into the Durban Bay; and aManzimnyama River into the Durban Bay.



Key project partners

- eThekwini Municipality (Environmental Planning, Solid Waste Management, Natural Resource Management)
- DFFE Working for the Coast Programme (recruitment of workers to collect litter)
- Swedish Agency for Marine & Water Management (building experience to implement the International Source to Sea Practitioner's Guide)
- Plastics SA (provision of technical advice on recycling)
- Sustainable Seas Trust (training of project beneficiaries in litter monitoring)
- Durban Partnership Against Plastic Pollution (provision of local knowledge)
- Various other NGOs (supporting litter recovery & community outreach)













Key Planned Activities

- Identify and map litter hotspot areas along each of the 5 priority rivers.
- Develop a deployment & management plan for 5 litter booms, including arrangements for litter removal and recovery.
- Compile monthly litter collection and characterisation reports as well as a microplastics prevalence report for the priority rivers.
- Deploy one low-cost waste management intervention per hotspot community near each selected river.
- Develop a communication strategy to assist with awareness raising campaigns in schools outreach programmes and communication with civil society & other stakeholders.
- Conduct at least 1 community awareness raising event, at least 1 schools outreach activity and 1 electronic media coverage of marine litter and waste management per year.
- Undertake training of government, community, civil society and private sector stakeholders in various critical skills.





Key Achievements

- Screening study conducted on plastic pollution flows within the Umngeni River catchment (in collaboration with the Swedish Agency for Marine & Water Management).
- Internal consultation held with the DFFE Branch: Environmental Programmes to identify modalities for recruiting workers to conduct the litter recovery operations ongoing.
- Consultation held with eThekwini Municipality and DFFE GIS specialist to identify & map litter hotspots along the remaining 4 rivers ongoing.
- Consultation held with Durban Solid Waste (DSW) Department to identify existing outreach & awareness interventions with schools and communities in the area.
- Consultation held with the DFFE's Research Directorate to conduct the microplastics assessment a dedicated micro-plastics laboratory has now been established within the DFFE as the implementing partner (sponsored under the Commonwealth Marine Litter Project).
- Initial consultation held with some project partners to discuss areas of collaboration & support (Sustainable Seas Trust, The LitterBoom Project).
- A dedicated Project Coordinator has been appointed on a 2-year contract and will commence duty on 1 December 2021 (South Africa to co-fund salary by 42% of the overall cost).





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- COVID 19 pandemic and national lockdown in 2020 and part of 2021:

 restricted certain types of public activities & caused temporary suspension of the Working for the Coast Programme.
- Appointment of the Project Coordinator was a protracted process (more than 90 applications received).
- Project Coordinator appointment required special approval according to internal prescripts:
 - Advertised on 1 March 2021
 - Shortlisting conducted on 19 April 2021
 - Interviews held on 25 June 2021
 - Approval by Director-General granted on 30 September
 - Successful candidate to start on 1 December 2021
- Since most activities in the SSFA are yet to be achieved, as they depend on the Project Coordinator commencing duty, South Africa supports submission of an application to the Implementing Agency to extend the demonstration project to 2023.





