

Innovators Bootcamp 2025

Sustainability Report Partnerships for a Resilient Future





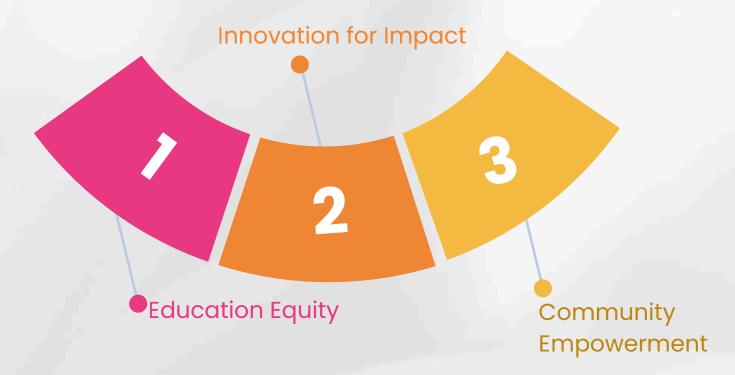
"This Sustainability Report underscores Tukuze Afrika Foundation's commitment to advancing inclusive STEM education, fostering innovation, and building community partnerships. By addressing current and emerging ESG priorities with accountability, we aim to create lasting value, empower communities, and contribute to a more sustainable and equitable future."

Executive Summary

The 2025 Tukuze Afrika Innovators Bootcamp, Exhibition & Awards, held under the theme "From Ideas to Impact," was a landmark event advancing inclusive, hands-on STEM education for over 12,000 students across Meru and Tharaka-Nithi counties. This Sustainability Report outlines the tangible outcomes, strategic alignment with the UN Sustainable Development Goals (SDGs), and our long-term vision to expand access to innovation across Kenya's underserved communities.

Our Vision for Sustainability

Tukuze Afrika Foundation envisions a future where every child, regardless of background, has the tools to solve real world problems using STEM. Our sustainability approach is built on three core pillars:



We aim to bridge gaps in STEM access, particularly among girls and rural students,

while fostering a pipeline of young innovators and future entrepreneurs.

Materiality Matrix: Key Areas of Impact

Stakeholder Concern	Strategic Priority	Alignment
Equitable access to STEM education	High	SDG 4, SDG 5
Youth unemployment & job skills	High	SDG 8, SDG 9
Gender equality in innovation	High	SDG 5
Environmental education and innovation	Medium	SDG 13
Local economic development	Medium	SDG 9

This simplified matrix reflects feedback from our students, teachers, volunteers, and sponsors on what matters most in terms of outcomes and priorities.



Program Overview and Reach



As part of our commitment to climate action (SDG 13), we conducted a carbon footprint

analysis of our 2025 program logistics. One key activity was the school outreach journey spanning 1,300 kilometers across Meru and Tharaka-Nithi counties. Through this initiative, we consumed 130 litres of petrol, resulting in an estimated 300.3 kilograms of CO_2 emissions (based on the IPCC standard emission factor of 2.31 kg CO_2 /litre).

We recognize the importance of monitoring and reducing our carbon footprint and are

exploring carbon offset strategies such as:

- Tree planting with participating schools
- Partnering with local green initiatives for carbon credits
- Prioritizing low-emission travel for future programs

This assessment forms part of our continuous improvement in sustainable event planning and environmental accountability.

- Inclusive participation: Junior Secondary students and girls led some of the most impactful innovations.
- Innovations addressed local sustainability challenges: water scarcity, climate resilience, waste management, and agriculture.
- Continued mentorship through STEM Clubs and follow-up school visits.
- School-based STEM clubs actively engage students throughout the year.
- **Top 10 projects advanced into an incubation program** supported by Meru University.

Alignment with Global Standards GRI Standards Reference

GRI 102-14: Statement from senior decision-maker (Founder's message

GRI 103:

Management approach for SDG-focused education initiatives

GRI 203-1: Infrastructure investments and services supported (STEM Clubs, Bootcamps)

Impact Alignment

Programs for upgrading employee/volunteer skills (teacher training, mentorship)

SDG 4

Quality Education:

Weekly STEM Club sessions, Bootcamp training,

SDG 5

Gender Equality:

Girls-led innovations and inclusive participation.

SDG 9

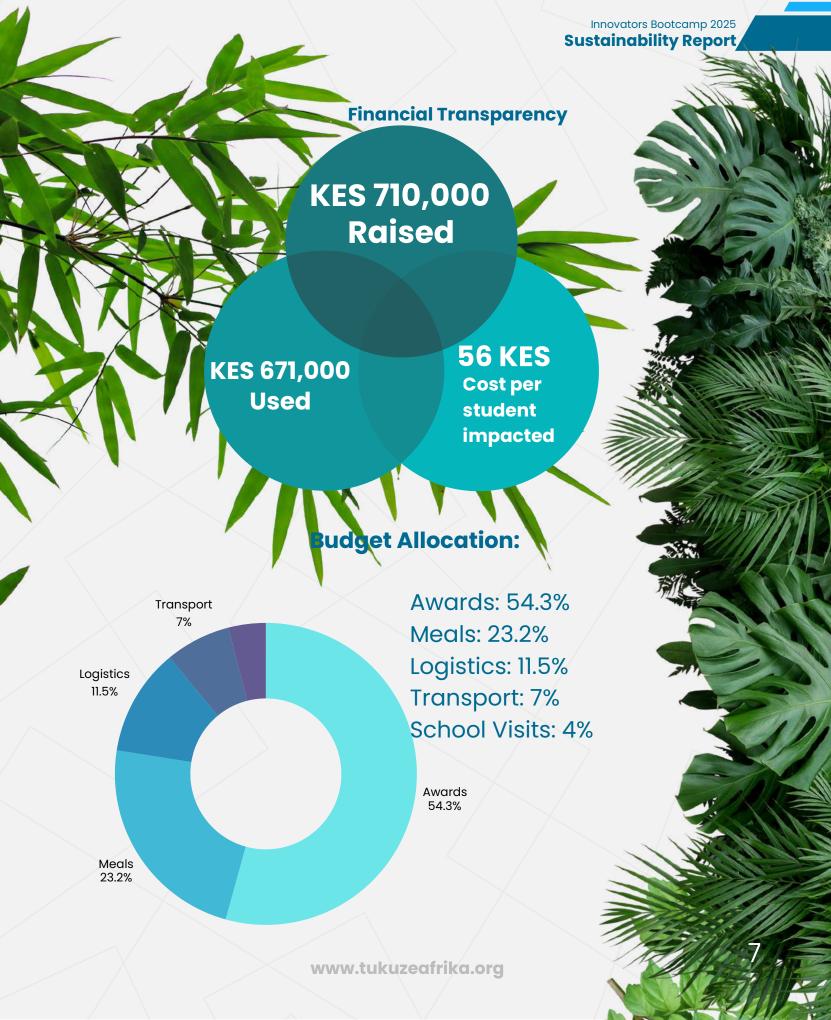
Industry, Innovation, and Infrastructure:

Projects with commercial potential in agriculture and automation.

SDG 13

Climate Action:

Innovations like the Dry spell Detector and Smart Poultry Feeder.



Governance & amp; Implementation

Our Monitoring, Evaluation and Impact Assessment Committee ensures program quality

and accountability. Key volunteers and virtual contributors drove coordination across all

event phases, with Meru University and IEEE mentors providing technical guidance.

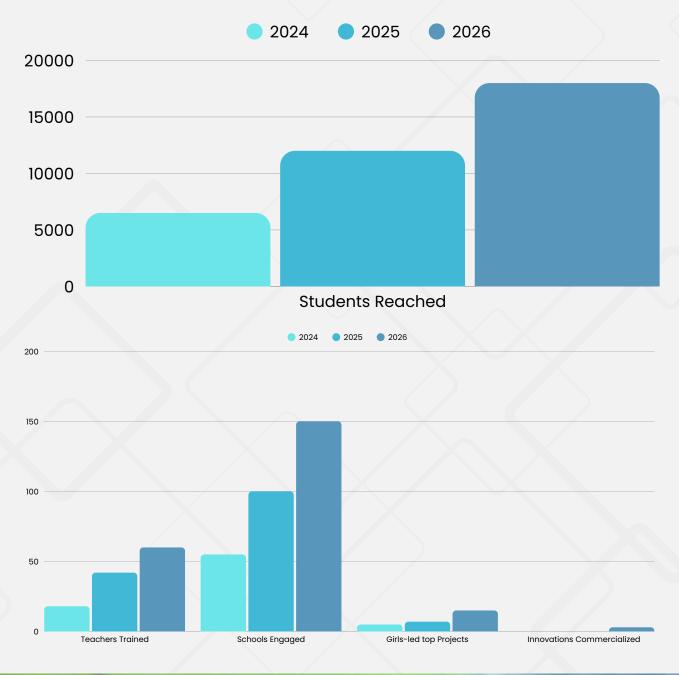
Governance Structure Includes:

- □ Founder-led team with dedicated program leads
- ☑ Volunteer and facilitator training programs
- ☑ Oversight from local education partners and university experts

Challenges and Mitigation

- Resource constraints: Solved through strategic partnerships and in-kind support.
- 🛮 Teacher gaps: Addressed with training and internship-based teaching support.
- ☐ Limited infrastructure: Overcome through low-cost prototyping and mobile resources.

Indicator	2024 (Baseline)	2025 (Achieved)	2026 (Target)
Students Reached	6,500	12000	18000
Teachers Trained	18	42	60
Schools Engaged	55	100	150
Girls-led top Projects	5	7	15
Innovations Commercialized	0	0	3



Stakeholder Engagement

Tukuze Afrika places high value on stakeholder input to inform our programming and

sustainability strategies. Engagement mechanisms used in 2025 included:

Feedback Forms: Distributed to teachers, students, and volunteers after the Bootcamp and STEM exhibitions.

Mentorship Check-ins: Regular virtual and in-person sessions with mentors to assess impact.

School Visit Reports: Facilitators and volunteers collected qualitative data during outreach.

Partner Consultations: Strategic calls and review meetings with university and partners.

WhatsApp Group Polls & Engagement: Active channels with educators, club patrons, and youth representatives.

This feedback loop ensures that programming remains responsive, inclusive, and grounded in the realities of the communities we serve.

























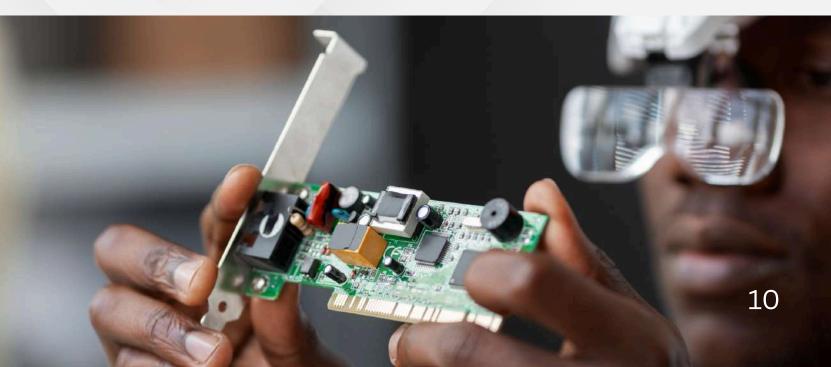














Expand to additional counties.

Launch structured STEM calendar: STEM Week, PRISMA Awards, Internship-based Teacher Program.

Commercialize top 3 student innovations.

Deepen partnerships with funders, tech institutions, and incubators.

Conclusion

The 2025 Tukuze Afrika Innovators Bootcamp and Exhibition marked a meaningful step

in our journey toward empowering youth through STEM, innovation, and community-

centred engagement. While our resources and operations remain grassroots, the impact

of our work across environmental awareness, social inclusion, and educational equity

continues to grow.

Looking ahead, we are committed to strengthening our sustainability practices and

reporting standards. As part of this growth, we are exploring alignment with internationally recognised frameworks such as ISO 26000 (Social Responsibility), ISO

14001 (Environmental Management), and ISO 20121 (Sustainable Events). These will help guide us in building structured, transparent, and globally aligned systems for future

initiatives.

This report serves not only as a reflection of our current efforts but also as a foundation

for more sustainable, inclusive, and innovative programming in the years to come.

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