GSMA

ClimateTech

The challenge

Climate change is the most pressing challenge facing humankind. The impact is global but low- and middle-income countries (LMICs) are disproportionately affected. Systematic and swift action to address climate change is essential.

At most, we have less than **eight years** to keep global warming below **1.5°C**

Our purpose

Unlocking the power of digital technology in LMICs to enable their transition towards a low-carbon and climate-resilient future

The opportunity

Digital solutions are uniquely positioned to drive climate action by:

— Mitigating the primary driver of climate change by reducing greenhouse gas emissions

— Building resilience towards the impacts of climate change for the most vulnerable communities

— Driving sustainable use, management and protection of natural resources and the environment in areas exposed to climate stressors

How we build climate resilience in LMICs

Anticipate

— Improving access to, and use of, weather and climate information

— Supporting disaster preparedness and early warning systems

Adapt

— Supporting farming, forestry and fishing sectors adapt to an evolving climate pattern

— Diversifying economic and livelihood options

Absorb

— Improving economic stability and reducing financial risks

— Building defences to withstand climate shocks

Mitigate

— Improving access to, and use of, clean and renewable energy

— Building and supporting circular economies

What we do

Our climate initiatives leverage technology to improve climate resilience, mitigation and adaptation strategies.

We use research, insights, evidence and best practices to drive opportunities for digital innovation

We catalyse partnerships between government, mobile operators innovators and service providers

We fund and support innovative solutions to climate problems

Our work focuses on engaging and impacting three key groups:

Vulnerable communities

Private sector

Public sector

We work directly with key stakeholders to unlock longer-term impact through:

— Sharing insights and evidence

— Strategic advisory support

— Technical assistance

— Increasing access to services

— Capacity building and training

Government

Start-ups / Innovators

Mobile Operators

Funding Partners

NGOs

Our scope includes digital solutions for:

Waste management and circular economy

Natural resource management and forestry

Agriculture

Managing water provisioning

Energy

Disaster preparedness and response

Transport, mobility and logistics management

Improving the delivery of climate finance

Climate change education and awareness

Climate change impact on vulnerable groups in LMICs

Insights and resources

Our content covers a range of topics, across multiple areas:

Natural Resource Management	Climate Finance	Plastics & Circular Economy	Climate Innovations	GSMA Climate Hub
AgriTech	Humanitarian Innovation	Urban Resilience	Industry Trends in Climate Technologies	GSMA Renewable energy dashboard

Access ClimateTech resources here:

The GSMA Innovation Fund for Climate Resilience and Adaptation

In 2021 the GSMA, **UK Foreign, Commonwealth & Development Office (FCDO)** and the **Swedish International Development Cooperation Agency (Sida)** announced the launch of The GSMA Innovation Fund for Climate Resilience and Adaptation.

The objective is to help accelerate the testing, adoption and scalability of digital innovations that enable the world's most vulnerable populations to adapt to, anticipate and absorb the negative impacts of climate change.

→ The first round of funding was awarded in 2022, and 12 successful organisations from across Africa and Asia were selected. They will receive between £100,000 and £250,000 in grant funding, technical assistance and dedicated support from the GSMA in their journey to scale.

→ Applications for the second round of funding opened in 2023 for start-ups from selected countries in Africa, Asia, Latin America and Eastern Europe. The new cohort will be announced by the end of 2023.

Key impact figures*

14
Grants awarded

Grants span across themes such as:

- Plastics recycling

- Agricultural advisory and financial risk management

- Fisheries

- Weather analytics and early warnings and more...

*Figures as at October 2023

Programme milestones

Catalysing climate action for a low-carbon and climate-resilient future

2019 The ClimateTech programme was launched at the GSMA.

2020 - 2021 Published the programme's first landscape report exploring the role of digital and mobile-enabled solutions in addressing climate change.

Established evidence on the use of digital technology in natural resource management, followed by a deep dive into mobile participatory forest management opportunities in Kenya.

2021 Leveraged insights from our research on "Digital Dividends in Plastic Recycling", 'awarded grants to two plastic organisations (Soso Care and Recircle) as part of the GSMA Innovation Fund for Digital Urban Services to test the use of digital technologies in circularity.

Launched the first round of the GSMA Innovation Fund for Climate Resilience and Adaptation providing £2.28 million to 12 organisations in grant funding.
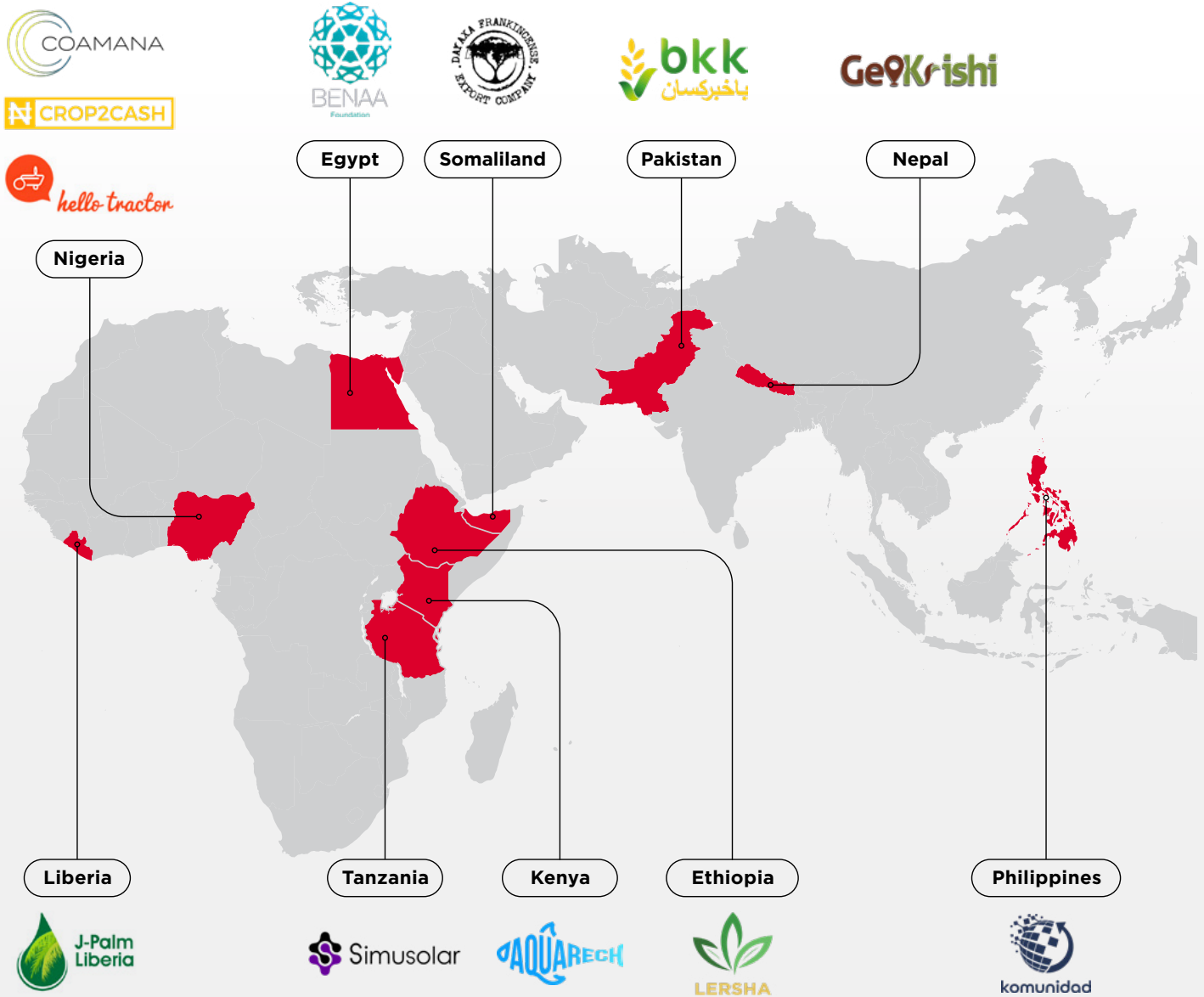
2022 - 2023 Launched flagship report exploring the role of mobile and digital technology in accessing and delivering climate finance in LMICs.

Continued to deepen the evidence base on the barriers and incentives to digital solutions which can empower. Indigenous peoples and local communities

Launched the second round of the GSMA Innovation Fund for Climate Resilience and Adaptation, focused on supporting under-explored and high impact climate solutions which received almost 600 applications.

Driving innovation through GSMA grants to start-ups across Africa and Asia

Aquarech: Improving fish farmer productivity, enabling market access and creating an inclusive aquaculture value chain using mobile technology and Internet of Things (IoT) sensors.

BaKhabar Kissan (BKK): Strengthening agricultural productivity and planning for climate-vulnerable farming communities through the provision of hyperlocal weather information and enabling access to agricultural expertise through digital platforms.

BENAA: Supporting water resource management using IoT to help convert wastewater into irrigation water for small farms in rural Egypt.

CoAmana: Improving agricultural productivity and helping farmers to manage financial risks related to drought in Nigeria through a digital marketplace for farmers to access markets, purchase drought-resistant seeds and access information on best practices and financial services.

Crop2Cash: Supporting farmers facing drought conditions in Nigeria to adapt their farming practices through climate-smart farming content and manage financial risks through their digital marketplace, connecting farmers to high-yield, drought-resistant maize seeds via USSD.

Dayaxa: Creating a regenerative model for positive social, ecological and economic change by working with farmers in Somaliland to harvest sustainable produce, achieve fair pricing and improve day-to-day living standards for farmer communities, seeds and access information on best practices and financial services.

GeoKrishi: Assisting smallholder farmers in Nepal adapt to climate stressors and adopt climate-smart agricultural practices through digital learning content and advisory services.

Hello Tractor: Improving planning and preparedness for farming communities facing unpredictable rainfall patterns in Nigeria, by using weather and historic tractor service demand data to model and optimise tractor service provision.

J-Palm: Transforming the sustainability of wild palm oil through access to ecological information for local harvesters, as well as mobile blockchain technology for improved traceability.

Komunidad: Upgrading communities' capacity to respond to disasters in the Philippines with a typhoon early warning system and weather analytics platform designed to help the local government plan and prepare for hazards more efficiently and accurately.

Lersha: Digital service for smallholder farmers that provides advisory content on climate-smart agriculture solutions, weather information and facilitates access to agri-credit and agri-insurance.

Simusolar: Supporting fishers in securing livelihoods, adapting to weather changes and sustaining fisheries management through IoTenabled productivity and activity tracking equipment.

Working with us

To achieve our programme's mission, we build mutually beneficial partnerships that help bring innovators, tech solution providers, industry organisations, mobile operators and donors together with the aim of supporting climate action.

Here's how you can partner with us

Work with us and collaborate with private and public sector stakeholders, as well as mobile operators.

Develop and share insights and thought leadership on climate action.

Co-host events and webinars and engaging in joint advocacy efforts.

Are you driving climate action solutions in LMICs?

Contact us:
climatetech@gsma.com

For more information about the GSMA ClimateTech programme visit:

gsma.com/climatetech

GSMA