



USAID META-EVALUATION OF GRAND CHALLENGES KNOWLEDGE PRODUCT  
**TAKING INNOVATIONS TO SCALE THROUGH USAID'S  
GRAND CHALLENGES**



USAID's meta-evaluation of the Grand Challenges for Development (GCs) was commissioned to enable systematic reflection on ten years of experience and to generate an actionable evidence base to build future programming. One area of enquiry for the meta-evaluation was how innovations have been supported to scale. This briefing paper sets out key learning on this topic, for those both inside and outside of USAID who manage GCs.

GCs are programs that mobilize governments, companies, and foundations around specific developmental or humanitarian challenges. Through these programs, USAID and public and private partners bring in new voices to solve developmental problems. GCs source new solutions, test new ideas, and scale what works by awarding grants and using additional tools to provide targeted technical assistance support to a wide variety of actors from many countries. The establishment of GCs signaled a shift away from large bilateral and multilateral agencies, aid organizations, and private voluntary organizations and towards non-traditional actors such as the private sector, civil society organizations, academic institutions, and local partners.

GCs harness new technologies and collaborative partnerships in support of entrepreneurship, collective problem solving and new approaches. They enable USAID to foster innovative solutions by mobilizing its convening power to leverage funds and resources of other agencies, testing a range of solutions to identify those with highest potential to succeed at scale, supporting commercialization, operating with a higher tolerance for risk, enabling flexible use of funds through milestone-based funding mechanisms, and supporting different stages of innovation.

## WHAT IS SCALING?

GCs define stages of innovation and pathways to scale differently but all broadly follow the pathway shown in Figure 1. Scaling is the process of extending, replicating and/or adapting an innovation to reach more end users or customers (including those who are harder to reach), and/or more geographies and markets. There are many good examples of how GCs have supported innovations to accelerate their transition from concept through early adoption to wide-scale adoption.

## HOW DO GCs SUPPORT SCALING?

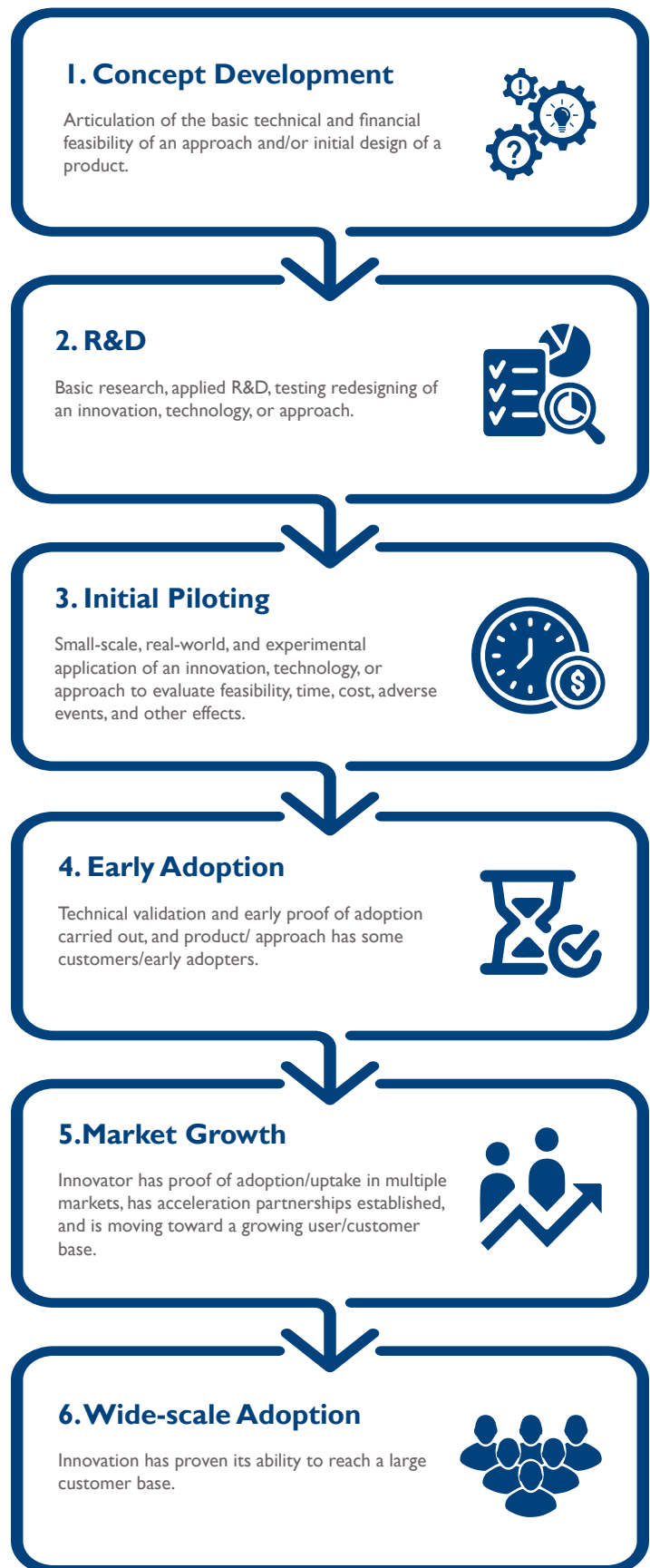
GCs identify those innovations that have the potential to reach scale and provide acceleration support to help them move along the innovation pathway to scale. The term 'acceleration' indicates that these strategies will speed up growth and impact. Acceleration support includes diagnostics, technical assistance, mentoring and training, delivered through business support, workshops, mentoring and brokering and facilitating networks and partnerships. The most effective models offer personalized support on a one-to-one basis and do not just rely on generic support delivered to groups of grantees. Innovators also find opportunities for peer-to-peer exchange of experiences and learning particularly beneficial.

## WHAT WORKED WELL?

### WE DON'T HAVE THE ANSWER BUT THE INNOVATOR MIGHT

The GC model of open innovation is about supporting the innovators on their pathway scale. Many innovations may have been tested in the US or another country but need to be adapted to the local context. The innovator is responsible for driving adoption of the idea, but the GC supports them to do so, for example through strengthening the capacity and skills of the innovating organization and enabling their access to the ecosystem, including investors, and government.

**Figure 1: Innovation Pathways to Scale as defined by Powering Agriculture: An Energy Grand Challenge for Development**



## UNDERSTAND THE LOCAL CONTEXT BY DEVELOPING LOCAL RELEVANT PARTNERSHIPS

The GCs have been particularly successful at stages 3-5 in Figure 1. This is because the GCs are better positioned to support innovation, through acceleration services and other interventions, to being ready to scale rather than achieving scale (stage 6), a stage which often requires a longer-term commitment of finance from investors and engagement with government.

Support for scaling is not just about providing grantees with finance and business training but about supporting them to engage effectively with the innovation ecosystem of potential partners and investors. Effective engagement with the host government is also critical for those innovations oriented towards public service delivery, for example in health or education.

### SAVING LIVES AT BIRTH: GRADIAN'S INNOVATIVE UNIVERSAL ANAESTHESIA MACHINE

Gradian's project aimed to equip and train staff in 33 hospitals in four provinces of Zambia with the Universal Anesthesia Machine, the world's only internationally certified such device designed to work without electricity and medical oxygen. Gradian targeted local and national Government, not only as a policy partner but also as a potential customer for their products. The team identified relationship building with Government and alignment with national strategies as critical to their success.

### ALL CHILDREN READING: A GRAND CHALLENGE FOR DEVELOPMENT (ACR GCD) - SUPPORTING eKITABU AND THE SCALING OF IMPROVED LITERACY

As the digital revolution spread across Africa, more and more devices were being supplied to schools yet growth in hardware was not being matched by useful and accessible learning content. It was this situation which led to the creation of eKitabu in 2012. eKitabu is geared towards harnessing the potential of digital, to build literacy in contexts with limited access to infrastructures such as power and connectivity.

Established in the US but based in Kenya, eKitabu offers over 350,000 e-books plus digital content to 14 African countries through an app and e-library that are usable offline and apply open standards. eKitabu has developed video storybooks for literacy and has brought digital content to more than 1,500 schools across all 47 counties of Kenya and 13 African countries.

ACR GCD supported three different eKitabu projects which promoted literacy using assistive technology and apps, through digital titles in Kenya and through sign language for deaf children in Kenya and Malawi. eKitabu has greatly benefited from the public-private partnership (PPP) model of ACR GCD with backing from USAID, the Australian Government, and World Vision. Such strong partnerships with the Government are key to success at scale, but the opportunity for private businesses to apply for ACR GCD grants was pivotal to the success and sustainability of eKitabu's prospects.



## CONSIDER THE PATHWAY TO SCALE FROM THE OUTSET, ESPECIALLY FROM THE USER'S PERSPECTIVE

### SECURING WATER FOR FOOD: ADAPTING SMALLHOLDER AGRICULTURE TO CLIMATE CHANGE AND SECURING EFFICIENT IRRIGATION FOR FOOD

Between 2013 and 2020, USAID with support from Sweden, the Netherlands and South Africa invested \$34.3M and provided acceleration support to promote solutions that enable the production of more food with less water, and/or to make more water available for food production, processing, and distribution.

Through its 40 supported projects, Securing Water for Food has impacted over seven million farmers and other customers. The new Water and Energy for Food GC continues the work of both Securing Water for Food and Powering Agriculture: An Energy Grand Challenge for Development.

It is the role of the GC only to support those innovations that have the prospect of reaching scale by moving along the pathway to scale (illustrated at Figure 1), and to regularly review the total portfolio of innovations, recognizing that some will fail while others have the potential to be a game changer. For Securing Water for Food (SWFF), the approach was to start with early-stage innovations that had a proven prototype, and to support them step-by-step through the innovation stages, or to stop support if the innovation was not performing according to the targets agreed.

More importantly, SWFF had a clear end objective of improved water/irrigation usage for agriculture, which drove the innovation support, and a mechanism to track the pathway of the innovation. There was a clear vision of the pathway to scale, and SWFF had the appropriate skills to decide whether and how to support early- to mid-stage projects and take these innovations to wider stakeholders to support their scaling-up. SL@B adopted a similar approach and from 2015 only supported the innovations that had proven potential to scale.

## PROVIDE LOCAL EXPERTISE THAT UNDERSTANDS THE CONTEXT

Effective acceleration support needs to be tailored to the specific characteristics of the context in which an innovation is being implemented. This requires a particular skill set and experience of the local market in order to build local partnerships and mobilize finance. Powering Agriculture an Energy Grand Challenge (PAEGC) is a good example of where greater attention to the local market context improved results. Each innovation was faced with a different set of local market barriers that needed a good understanding of the market ecosystem in order to support the innovation on the pathway to scale.

### TAKE INNOVATIONS TO SCALE BUT DON'T SUPPORT ACHIEVEMENT AT SCALE

The time required to take most early-stage innovations to scale should not be underestimated. This includes marketing solutions to attract funding and for some GCs, especially in health and education, to secure public partnership engagement. While there have been some notable successes at scale, particularly in Combating Zika and Future Threats (Zika), the GC instrument is more suited to supporting innovations along the pathway to scale and then leaving the longer-term implementation at scale to others. Other actors could include governments, particularly in the case of public services like education or health, or larger-scale donor programs or investors.

### THE WORLD MOSQUITO PROGRAM HAS SCALED SUCCESSFULLY

Beginning with GC funding (from Zika), and with further funding and leadership from the Bill & Melinda Gates Foundation and Wellcome Trust, projects have been developed in Vietnam, Indonesia, Colombia, Brazil and Australia. Their small small-scale pilot project in Colombia, covering about 40,000 people in about 3-4 km<sup>2</sup>, grew to a large-scale project covering two major cities and a population of 2.5 million people.

*'Without the USAID money, we probably wouldn't have scaled ... it allowed us ... to learn and scale in a small amount of time and to do scale-up on community engagement'*

World Mosquito Program Interviewee



### POWERING AGRICULTURE INTERVIEWEE

*'...it is important to move a venture's technology, market, and business model forward in parallel. Working to develop a technology in the absence of movement on the other two can be a "road to nowhere," where the technology exists without a viable path to market.'*

PAEGC Interviewee