ENHANCING CO-PRODUCTION IN CLIMATE SERVICES PROJECTS

Lessons from the WISER programme for project implementers

KEY MESSAGES

- The WISER programme has demonstrated the added value of shifting co-production of climate services towards a more immersive approach

- Projects that took a more immersive approach to co-production demonstrated additional relational and learning benefits, resulting in outcomes that appear to be more valuable than the development of a final product/output alone

- There is potential for more immersive elements of co-production to be considered in each step of the project lifecycle: from project design, to project implementation and project legacy

- To enhance co-production going forward, project implementers need to consciously design and implement more immersive co-production processes that are strategic, inclusive, equitable and flexible

GLOSSARY

CO-PRODUCTION:
The process of working together to combine the knowledge of two or more actors who think in different ways in order to create new knowledge or ways of working to address societal problems.

IMMERSIVE CO-PRODUCTION:
Emergent, iterative and flexible processes where a broad range of actors are deeply involved, and people with different knowledge and experiences come together fluidly throughout the co-production process.

CONSCIOUS FACILITATION:
A carefully designed process that creates a safe and inclusive space to allow everyone to be heard equally. It requires acknowledging that there are multiple ways of seeing the world.

WISER
Weather and Climate Information Services for Africa

Fund Manager:
Met Office

Supported by:
UKaid
from the British people

OUTLINE OF WISER AND THE LEARNING PROCESS

The Weather and Climate Information Services for Africa (WISER) programme aims to increase the resilience of African people and enhance economic development in response to weather and climate-related shocks. Funded by the Foreign, Commonwealth and Development Office (FCDO) and fund managed by the Met Office UK, WISER's goal is to improve the generation and use of weather and climate information across the Sahel and East Africa. Phase 2 of the programme was implemented from 2017 to 2021 through 12 projects. The aim was to develop new and improved climate services for regional, national and sub-national use, based on the specific needs identified through co-production approaches, and to enhance the capacity and capability of regional and national weather and climate service providers.

The programme Fund Managers organised an internal online learning event from 26th to 29th April 2021 to distil key learning from the design, delivery and results of projects and the programme overall. The event was attended by 90 participants from the 12 WISER Phase 2 projects. The participants ranged from scientists/producers, practitioners/intermediaries, researchers/knowledge managers, decision-makers/users, and donors. The event reflected on four thematic areas of learning to inform future project and programme design for weather and climate information services:

1. Programme functions
2. Approaches
3. Climate service and products outcomes
4. Programme/project impacts

1 INTRODUCTION

The focus of this brief is to provide recommendations for those implementing climate services co-production activities (e.g. researchers, practitioners or governmental bodies) on how these activities can be enhanced going forward by drawing on lessons from the WISER programme. Learning around the critical elements for strengthening co-production in climate services projects was consolidated at a programme-level learning event held at the end of the WISER programme. The event provided an opportunity for donors, researchers and practitioners involved in WISER to critically reflect on co-production in WISER-funded climate services projects in East Africa and the Sahel.

While co-production was core to the WISER programme, the learning from the WISER partners reflected that the nature and scale of co-production that took place in WISER should be considered the minimum required for effective climate services. There is scope to significantly enhance co-production by moving towards processes that are more inclusive, immersive and flexible. While more immersive forms of co-production require more time and resources, the evidence points towards considerably strengthened climate services as a result.

2 THE CURRENT STATE OF CO-PRODUCTION PROCESSES

In the context of climate services, it is recognised that co-production (particularly between scientists and stakeholders/decision-makers) is critical in ensuring that climate services are designed and communicated in a way that best serves decision-makers. However, despite widespread agreement that co-production of climate services is necessary, there remains an array of approaches to co-production. These range from predominantly pre-defined, static, consultative processes to those that are more emergent, iterative and flexible (see Figure 1).

Consultative approaches constitute the minimum requirement for co-production of climate services. The aim of a consultative process is to determine stakeholder needs in terms of climate variables or statistics required, the most useful time and spatial scales, and presentation/communication of the final climate services product. These

processes require the least amount of investment in time and resources but can result in the stakeholders feeling undervalued and/or lacking ownership of the process. Additionally, in many cases the resultant product or service can fall short of expectations as a deeper understanding of the decision context is missing. Conversely, fully immersive co-production consists of sustained, inclusive, trust-based and equitable partnerships in co-developing a final output/product. This approach requires a greater investment in time and resources. However, as the learning from WISER confirmed, the projects that employed a more immersive approach to co-production resulted in stronger learning, relationships and networks in support of effective climate services. These additional relational and learning benefits resulted in outcomes that appear to be more valuable than the development of a final co-produced product/output alone. Based on these learnings, the WISER partners agreed that a shift away from consultative approaches towards a more equitable, inclusive and immersive approach to co-production is imperative if we want a step change in delivering effective climate services.

CONSULTATIVE   **IMMERSIVE**

PRE-DEFINED, STATIC, CONSULTATIVE   EMERGENT, ITERATIVE, FLEXIBLE

FIGURE 1   Spectrum of co-production approaches

Source: 'Co-production in African weather and climate services' (Carter et al., 2019)

3   TRANSITIONING TOWARDS AN IMMERSIVE APPROACH TO CO-PRODUCTION

The following sections provide specific in-practice learning and targeted recommendations emerging from the WISER learning event that are aimed at supporting a shift in co-production processes to a more immersive approach. These recommendations are presented sequentially through the project life cycle, from designing immersive co-production approaches to implementation and, finally, to considerations for leaving a positive legacy from co-production.

3.1   Designing immersive co-production processes

The success of any project begins at the design stage. Therefore, it is critical to plan climate services projects more deliberately and inclusively. Allowing sufficient time to build trusting relationships with all project partners and stakeholders is key to ensuring this inclusivity. An important part of building this trust is honesty about what can or cannot be achieved in the project and what each partner/stakeholder is able to offer towards project objectives. Importantly, the WISER experience has shown the importance of establishing these relationships before project funding has been secured, in order to ensure the establishment of an equitable partnership and to align the project design with in-country requirements and planning processes. WISER projects that were deliberately aligned with the strategic needs of the focus country, sector or National Meteorological and Hydrological Service (NMHS), such as the WISER support to the IGAD Climate Predictions and Applications Centre (ICPAC) project, (see Case Study 1) had more success in developing sustainable climate services interventions.

ALIGNING PROJECT DESIGN WITH IN-COUNTRY REQUIREMENTS

The WISER support to the ICPAC project (**W2-SIP**) was designed based on a need that emerged during two previous WISER pilot projects from 2016 to 2018:

1. Strengthening Climate Information Partnerships – East Africa (**SCIPEA**)
2. Enhancing National Climate Services (**ENACTS**)

These projects highlighted the need to further strengthen regional capacity for climate services in East Africa. As a result, W2-SIP had the specific aim of strengthening the capacity of ICPAC, relevant regional stakeholders and NMHSs in the East Africa region. Capacity development was centred on improving the delivery of actionable weather and climate information services through co-production and user engagement. The project resulted in a transformational change in ENACTS maproom-related capacity/expertise at ICPAC, which allowed ICPAC to expand the maprooms across the region and bring ICPAC's forecast process in line with the World Meteorological Organisation's (WMO) recommendations. Similarly, capacity development has enabled stakeholders to be better equipped to interpret and use climate services.

A cornerstone to building inclusive and equitable partnerships is ensuring that each partner is adequately and equitably resourced to support effective engagement. Therefore, there is a need to strategically consider and, where appropriate, budget for the involvement of in-country partners (such as NMHS staff) and societal stakeholders (such as government or municipal staff or community leaders) in the project planning stages. Co-production processes can be time-intensive, so in-country partners and stakeholders cannot be expected to dedicate a significant amount of time to the project without compensation for either their time or expenses (whichever is appropriate).

3.2 Implementing immersive co-production processes

From the start, it is important to instil a culture of inclusivity and transparency in the project through regular consciously-designed engagements and sustained communication across all project partners and stakeholders, such as that achieved through the Developing Risk Awareness through Joint Action (DARAJA) project (see Case Study 2). While seeming less a basic requirement of co-production, many previous co-production projects (particularly those focused on a consultative approach to co-production) have failed to adequately embed sustained engagement and appropriate communication processes into their projects, including discussions about the sustainability of any interventions implemented.

A core purpose of sustained engagement is ongoing learning and reflection. While it is important to have a clear direction for the project, it is also key to remain flexible to changing the project direction or outputs in response to learning and reflection. These potential changes in direction may challenge or diverge from initial assumptions or targets, but the ability of the project to respond to these changes is critical to producing a service product that provides real and sustained value.

Part of the culture of inclusivity is the ability of the project team to embrace the reality that valuable knowledge is held by every actor in the co-production process (whether they be scientists, practitioners, community members or policy makers). There should be no hierarchy of knowledge, and every person involved in the co-production process should contribute understanding and experience. Therefore, there should be an explicit acknowledgement that co-production is about learning from one another to develop holistic understandings as well engendering trust and ownership of the process.

CASE STUDY ②

DEMONSTRATING THE VALUE OF REGULAR ENGAGEMENTS, SUSTAINED COMMUNICATION AND INCLUSIVITY

The Developing Risk Awareness through Joint Action (**DARAJA**) project aimed to improve climate resilience by increasing the access and use of climate information by residents of informal settlements in Nairobi (Kenya) and Dar es Salaam (Tanzania). To achieve this, regular engagement processes were undertaken between the project team (including the NMHS) and the residents of the informal settlements. These engagement processes were designed to incrementally build trust relationships through inclusivity, equitable partnership, a shared understanding of the problem and a common goal.

One example of an inclusive engagement process in DARAJA was a two-day workshop that was held between the NMHS and informal settlement residents. During the workshop, all participants were able to share insights based on their collective experiences. For instance, a collaborative exercise enabled the sharing of different terminology used by each participant in order to gain a shared understanding of terminology amongst the project partners and stakeholders.

Through regular communication and feedback loop processes between the community and the NMHS, the informal settlement residents were able to gain a better understanding of the available weather and climate information products. In its turn, through learning from the community, the NMHS was able to align forecasting services with community needs so that forecasts were tailored and actionable for the community.

As a result of the project, there has been a demonstrated increase in the use of weather and climate services from the informal settlement residents, who now express a sense of ownership in the process of informing decision-relevant forecasts for their community.

SPECIAL CONSIDERATIONS FOR CO-PRODUCING WITH NMHSs

More information on the role and capacity of NMHS can be found in the accompanying WISER brief, 'Creating accessible and sustainable climate services through capacity development of NMHS'.

Many NMHSs in Africa operate within the confines of restricted budgets and resource deficiencies. Given these constraints, the WISER learning event yielded specific recommendations that relate to working with NMHSs as project partners.

These learning points include the following:
- Involve the NMHS in planning for the project so that it aligns to the strategic direction of the NMHS and is feasible within other institutional constraints. It is especially important to secure senior NMHS management buy-in for the project so that any resulting products can be planned for and streamlined into the strategic planning of the NMHS.
- Allocate sufficient budget within the project design for NMHS personnel involvement and infrastructure development, recognising the financial and human resource constraints they operate under.
- If including an element of NMHS capacity development, focus on holistic capacity rather than solely on scientific/technical capacity. This includes a focus on business skills, project management, organisational development and technical capacity to maintain infrastructure. All these skills underlie the sustainability of implemented climate services interventions.
- Support the NMHS in demonstrating the socio-economic benefit of climate services and user engagement processes. This provides a basis from which to make a business case for additional national government funding for climate services.

3.3. Ensuring a positive legacy from immersive co-production

More immersive co-production processes tend to leave a positive legacy because they create real ownership, trust and value, and they strengthen relationships across science and society. This means it is more likely that any resulting product will continue to be used by partners after the initial funded engagement activity. However, this assumes that there is sufficient thought put into the sustainability of partnerships and the interventions that have resulted from these partnerships. The positive effects of strengthened partnerships can be easily lost through poorly planned dissolution of partnerships at the end of the project. When partnerships suddenly end with no resolution process, the damaging results can include a breakdown of trust between partners, an unwillingness to work together again and a lack of buy-in for products resulting from the project.

While it is often not possible (nor necessary) to maintain project relationships in the same form post a project collaboration, it is necessary to formulate a clear and transparent agreement about the legacy of the partnership and ownership of project results, including partner responsibilities after the project ends, in order to ensure sustainability of outputs. Ongoing transparency and respect amongst project partners are key to fostering a positive legacy from any partnership.

RECOMMENDATIONS

RECOMMENDATIONS DURING THE DESIGN PHASE

Build trusting relationships with partners that leverage existing partnerships, manage expectations, are transparent and promote a collective understanding of roles:

Sufficient time must be allocated during the project design phase to identify and reach out to potential project partners, particularly in-country partners and societal stakeholders (such as municipal officials, NMHS staff, community leaders etc). It is particularly beneficial to build on existing partnerships where possible. Building trust requires project implementers to be clear with all partners about potential funding constraints, what is possible during the project and how each partner can contribute to project objectives. It is also important to manage expectations at this stage, in case the project proposal does not successfully obtain funding. To ensure that relationships remain productive, project implementers should be transparent about what each partner can expect to gain from the activity including, for instance, academics' expectations of publications, authorship and intellectual property. If beneficial, this planning stage can also be used to develop memorandums of understanding between each of the project partners and stakeholders, or to obtain letters of support that outline the role of each of the partners and stakeholders.

Align project design to in-country requirements, planning processes and past and current projects/interventions:

At the outset of design, review strategic planning documents and previous needs assessments. Alternatively, engage with a wide variety of in-country partners and stakeholders to understand their priorities and needs. It is also crucial to gain a good understanding of past projects so that a new project/intervention builds on lessons learned or outcomes

achieved. Engaging senior management and/or gaining high-level buy-in should be an important focus if the outputs of the project are aligned to the formalised strategic planning processes. This type of engagement can significantly improve the sustainability of any intervention beyond the project lifetime.

Budget for in-country partners and stakeholders, with consideration for different needs:

The budget should be collaboratively designed based on the needs of all project partners, including in-country partners and societal stakeholders. Costs might range from personnel costs (where appropriate) to those associated with involvement in engagement events (such as *per diems* and travel costs). In cases where the funding instrument does not allow for in-country partner/stakeholder remuneration, the early development of in-country relationships and the demonstrated value of the project to their strategic needs can be leveraged to design a project that is feasible within funding constraints.

RECOMMENDATIONS DURING THE IMPLEMENTATION PHASE

Plan for regular consciously-designed engagements and sustained, flexible communication:

At the start of the project, project leads should formulate a flexible communication protocol that can be revised regularly, which outlines the various forms of communication in the project. This communication protocol should be designed in collaboration with all project partners and stakeholders to ensure that all communication mechanisms are suitable for everyone (e.g. limitations due to poor internet bandwidth) and include everyone involved in the project. In implementing the communication protocol, there should be provision for more formal, regular, consciously-facilitated, in-person and virtual partner and stakeholder meetings throughout

the project lifecycle. These meetings should have a strong focus on reflecting on progress, emerging problems or barriers, and on identifying direction changes and shifting objectives, thus facilitating flexibility. Similarly, less formal communication techniques (e.g. project briefings, newsletters, virtual discussion forums) should be used in parallel.

Create new norms amongst partners that promote a culture of inclusivity through co-produced principles and mediating power asymmetries:

Commitment from project leadership is key to instilling a culture of inclusivity. A culture of inclusivity ultimately requires project partners to embrace new ways of working that recognise the value of knowledge from each of the actors in the co-production process. At the start of the project, project leads should develop an agreed (and documented) set of principles for working together in an equitable and inclusive manner. Power asymmetries should be mediated during engagements, which might require employing the skills of an external facilitator who is sensitive to the contextual power dynamics.

Allow for reflection, learning and project flexibility in order to co-develop outputs that are responsive to contextual needs:

Build flexibility into project implementation and gain early commitment from project partners, societal stakeholders and funders that valuable project outcomes will be allowed to emerge based on contextual needs. Project implementers should budget for, and implement inclusive processes for, regularly assessing, reflecting on and monitoring project progress, as well as assumptions and targets. This will allow good time to make adjustments where required and to communicate and agree any necessary changes with the funders. Where the project is part of a programmatic initiative, the donor or fund manager should allocate time and resources to continuously share and learn from other similar projects at regular intervals throughout the programme implementation.

RECOMMENDATIONS FOR ENSURING LEGACY

Agree on a project partnership legacy plan early on, with all partners:

Collaboratively develop a plan for partnership legacy. The information included in this plan will depend on the partners but could include, *inter alia*, principles of collaboration following the end of the project, information on how project work might be acknowledged in future endeavours, as well as ideas about the ways in which project work might be taken forward. In some cases, a formal Memorandum of Understanding (MoU) can be developed between partners that outlines the formalities for ongoing or future engagements.

Albert Mwanyasi interviews an elderly female pastoralist. Source: Diana Njeru 2019

4 FINAL THOUGHTS

Each co-production process will be different, depending on the partners involved, the project's objectives and implementation contexts. However, the climate services community is starting to identify several key principles that support effective co-production of climate services, including those in more immersive co-production such as inclusivity, flexibility and equity. The WISER programme has shown that a shift towards more immersive co-production is needed for improved climate services. It has also shown that more conscious inclusion of in-country stakeholders throughout the project lifecycle is imperative, as are the resources to support more immersive engagement processes with societal stakeholders. It is important that the field of climate services continues to learn from the successes and challenges of each project that is implemented.

ENDNOTES

Carter, S., Steynor, A., Vincent, K., Visman, E. and Waagsaether, K. (2019) 'Co-production in African weather and climate services. Second edition. Manual, Cape Town: Future Climate for Africa and Weather and Climate Information Services for Africa. (https://futureclimateafrica.org/coproduction-manual/downloads/WISER-FCFA-coproduction-manual.pdf).

https://www.metoffice.gov.uk/about-us/what/working-with-other-organisations/international/projects/wiser/co-production

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