

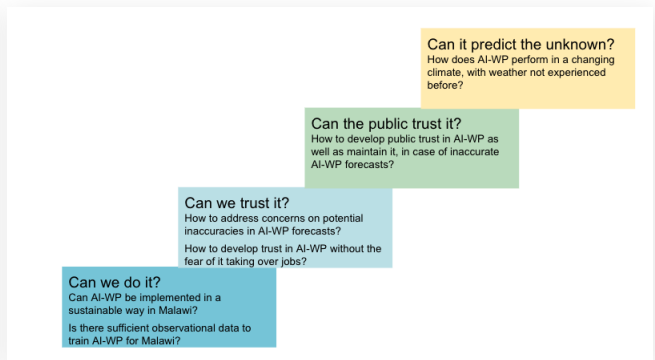
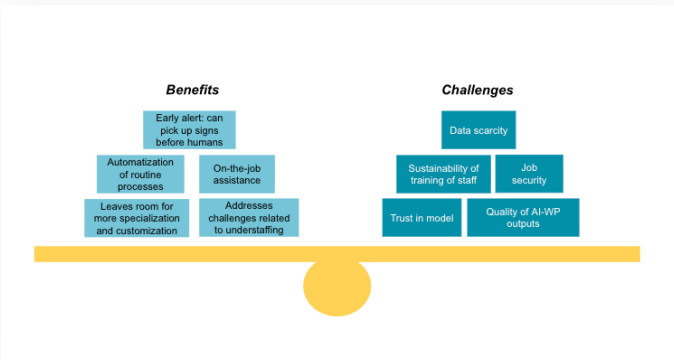
# Advancements in AI-based weather forecasting are a double-edged sword: many perceived benefits, but also challenges

## Democratizing Weather Forecasting in Least Developed Countries through AI-Based Weather Prediction: Insights from a Pilot Project in Malawi

**Background:** The AI for EW4All pilot project in Malawi started in April 2025. The project is supported by the World Meteorological Organization's (WMO) Climate Risk and Early Warnings (CREWS) Initiative. MET Norway, in collaboration with ECMWF and the Department of Climate Change and Meteorological Service (DCCMS) in Malawi, is undertaking this ambitious pilot project to assess how AI can benefit Malawi's weather forecasting value chain. In close collaboration between all three partners, the pilot project is building an AI weather prediction system customised for Malawi.

**Main takeaway:** To ensure that the AI-WP built for Malawi can be useful and integrated into DCCMS operations, discussions were held from the very beginning with DCCMS forecasters on their expectations regarding AI-WP.

**Important considerations:** Insights from DCCMS forecasters revealed considerations and necessities beyond just the technological advancements AI-WP offers, stressing the need for a holistic perspective to ensure its successful uptake.



### Methods

1. Interviews
2. Focus groups
3. Storyboarding

**2**

**3**

**Next steps:** The results from the pilot project were launched during the *Panel – AI for weather forecasting: closing the digital divide with AI?* at the WMO Ex-Congress in October 2025. Since then, DCCMS has been working to evaluate the AI-WP system in its operational context. Workshops and further training are planned over the course of 2026, in collaboration with MET Norway and ECMWF.



Rør Skårin, MET Norway Director General, exchanging the Forecast-in-a-Box with Lucy Whitfield, DCCMS Director, at the WMO Ex-Congress. Photo credit: WMO



Learn more here:  
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