

# Integrating research-based insights into Wikipedia pages for shaping climate action

Debananda Misra  
Indian Institute of Technology Delhi  
University College London, UK

Karin Lindsjö  
Lund University, Sweden

## Abstract

We propose to investigate how wikipedians can engage with universities and university researchers to integrate climate science research into existing wikipedia pages or create new ones. Our goals are to increase the relevance and usage of wikipedia pages for climate action, and to promote the use of wikipedia by the university researchers for the public engagement of science. We plan to collect data by organizing Editathons involving university researchers in climate science areas in India.

## Introduction

Despite the progress in climate sciences by universities globally, significant localized efforts are needed to direct and utilize the same for actionable solutions (UNDP, 2015). One of the challenges for this is the low climate science awareness and the absence of research-based insights in communities learning and practices (Kim, 2012). Wikipedia can be a unique platform to overcome these challenges by bringing together university researchers and local communities. The integration of research-based insights into wikipedia can make the pages richer and more dynamic. It can also encourage more researchers to edit wikipedia pages.

Situated in the context of climate science research in universities, our proposed study aims to develop an initial framework for the engagement of wikipedia and university

researchers. The framework will include capabilities, legitimation sources and mechanisms, and arenas and actors to operationalise the engagement. We will explore the following questions:

1. How can university researchers engage with wikipedia to integrate research-based insights into wikipedia pages?
2. What are the tensions and conflicts faced by wikipedians to engage with university researchers, and vice-versa, and how do they resolve such tensions?
3. What individual, organizational and systemic capabilities are needed for the above?

**Date:** We plan to begin the study by July 1, 2024 and conclude the project in a year.

## Related work

Our research is situated within the literature on the public engagement of universities. Researchers have highlighted that public engagement of science by universities is perceived as an undertaking that supports and ameliorates institutional competitiveness (Watermeyer and Lewis, 2018). In particular, studies (see Weerts and Sandmann, 2010) have shed light on 'boundary spanning roles' that can advocate for service learning/other civic programs among university researchers. However, less academic attention has been focused on sites of engagement between publics and science outside of the policy setting and as

such, we know little about the rationales, agendas and activities that are in operation in these newer spaces ([Stilgoe et al., 2014](#)).

Our work will advance the literature by shedding light on how researchers work within complex institutional environments to produce community-based knowledge and how Wikimedia can legitimize public engagement of science.

## Methods

The study will examine the above questions in the context of climate science research areas carried out in universities in India and by working with wikipedians who work with communities whose livelihoods are at risk due to climate change.

We propose to organize five [Editathons](#) bringing together Wikipedians and university researchers. Each Editathon will focus on a specific climate science area (e.g., air pollution, geo hazards, and agriculture). Prior to the Editathon, wikipedians will go through a workshop to learn about the basics of research and how to infer research insights, using the framework of [UCL's Citizen Science Academy](#).

Through participant observation, we will observe and identify the barriers faced by researchers and wikipedians. We will follow up our observations with in-depth interviews and focus groups with the participants.

## Expected output

We will present the findings of the study in the [Society for Research into Higher Education Conference 2024](#) in the UK. Besides, we plan to have **two publications** in academic journals.

Through the Editathons, we will create approximately **30 enhanced or new wikipedia pages** on climate-related topics. We will also

organize a **consultation forum** in India to showcase the pages to government officials and civil society organizations. We will publish a **practice brief document** with guidelines for researchers to engage with wikipedia.

We will develop a **second phase research proposal**, expanding the study to East Africa (where the second author has expertise in).

## Risks

One potential risk of the study is too few researchers willing to participate in the study. Universities in India known for climate science work, such as IIT Bombay and IISc Bangalore, are located in places far from regions that are impacted by climate change. This can create challenges to organize the Editathons.

## Community impact plan

We have had some initial conversations with Praveen ([User:PDas](#)) and Runa ([User:Runab](#)) Wikimedia Foundation Team in India, and we plan to work with them to identify researchers and wikipedian for the study. Initial conversations indicate the [Centre for Internet and Society](#) and [IIIT Hyderabad](#) to be potential partners.

The proposed showcase will be organized at IIT Delhi to sensitize policy makers and civil society organizations to rely on wikipedia for information related to climate action.

## Evaluation

On the academic quality dimension, the project can be evaluated by its potential to make significant contributions to the field of public engagement of universities, evidenced through peer-reviewed publications.

On the dimension of community impact, evaluation can include participation in the

Editathons, extent of scientific insights introduced in existing Wikipedia pages, and perceived usefulness of the enriched Wikipedia pages.

## Budget

At this stage, we anticipate a total budget with the following break up

- Salaries for researchers: \$20,000
- International travel and stay: \$10,000
- Local travel and field trips: \$5,000
- Editathons, workshops and events: \$11,000
- Institutional overheads: \$2,000

## Prior contributions

Dr. Misra has been a practitioner of societal engagement and impact of universities for over a decade. As an academic, he has contributed to these fields through his publications in leading international journals and has also participated in multi-site and multi-disciplinary grant proposals.

Dr. Lindsjö has studied sustainable agricultural intensification and has extensive field work experience in Malawi, Tanzania and Zambia. In previous research, she has worked closely with local researchers and has a large network among universities in these countries. She is also well experienced in presenting data through stakeholders' workshops.

## References

Kim, H. S. (2012). Climate change, science and community. *Public Understanding of Science*, 21(3), 268-285.

Stilgoe, J., Lock, S. J., & Wilsdon, J. (2014). Why should we promote public engagement with science?. *Public understanding of science*, 23(1), 4-15.

UNDP. (2015, November 15). *Community action to address climate change*. UNDP. <https://www.undp.org/publications/community-action-address-climate-change>

Watermeyer, R., & Lewis, J. (2018). Institutionalizing public engagement through research in UK universities: perceptions, predictions and paradoxes concerning the state of the art. *Studies in Higher Education*, 43(9), 1612-1624.

Weerts, D. J., & Sandmann, L. R. (2010). Community engagement and boundary-spanning roles at research universities. *The Journal of higher education*, 81(6), 632-657.