

Educational outreach techniques as a Science Communication strategy for an interdisciplinary research project

Jennifer Fandrich

Hamburg, Center for Earth System Research and Sustainability, Institut für Meereskunde, Germany
(jennifer.fandrich@uni-hamburg.de)

The interdisciplinary project „Energy Transfers in Ocean and Atmosphere“ aims to understand small-scale effects in Ocean and Atmosphere in order to improve existing climate models. Educational outreach as a form of Science Communication can be an effective strategy to inform the general public about the aims and results of research projects.

The collaborative project „Energy Transfers in Ocean and Atmosphere“ started in 2016 and is funded by the German Research Foundation. As part of the proposal an educational outreach program was implemented. In the project one main question to answer is: How exactly works the energy transfer between waves, eddies and local turbulences in the ocean and the atmosphere? Oceanographers, meteorologists and mathematicians from several institutions located in Hamburg, Bremen and Rostock want to get an answer to this question. They work closely together to develop energetically consistent mathematical models and thus enhance climate analyzes and forecast accuracy.

The use of different outreach tools e.g. explainer movies, info graphics, scrollytelling, a well-structured website as well as social media channels like Twitter are combined to one outreach strategy for this particular project in order to inform the interested public about the aims and results of the research project. These tools of science communication are very important and effective techniques for transferring knowledge from research to the general public. Complex topics like turbulence, overflow, eddies can be explained with these tools in an easy manner.

As one key part of the project the outreach program needs effective project management skills to raise public awareness for the work of scientists as well as research results. The project coordinator works as a interface between the scientists and the project manager of the agencies. To ensure a constructive communication process, it is helpful to use project management techniques from the private sector as well as the expertise of the scientists. Project managers from different creative agencies support the communication process. The challenge is to simplify the working processes of the scientists in order to explain the complex topics, so that everybody can understand it.

With an effective Science Communication strategy the project hopefully achieves to enhance the project outcomes and impact and start discussion or even collaborations with educational institutions, the private sector and the general public.