# Planning school workshops to co-create the energy transition

#### **Brief abstract**

For our larger project, students will develop a school workshop on the energy transition and a sustainable economy of the future. Students of natural and social sciences will collaborate to design tasks and material that reflect the complex interactions of people, nature, technology, and society.

## Name of supervisor(s)

Prof. <u>Beate Seibt</u>, Social Psychologist Associate professor <u>Marianne Zeyringer</u>, Energy systems modeller Postdoc <u>Karin Fossheim</u>, Political scientist

#### Preferred background of candidate(s)

Master studies in social, educational or natural sciences with a specialization in climate change mitigation, adaptation or the energy transition. Experience with web development is an advantage, but not a prerequisite.

### Number of available projects

This is one collaborative project for 2-4 students.

## Preferred project period

Flexible.

#### Background of the project

The offered project is part of a larger funded project delivering and evaluating school workshops in Norway. With these workshops, we will answer the question: What energy systems do young Norwegians envision for their future? The workshops will use design-focused learning activities to foster systems thinking and envisioning a renewable-energy based future. Integrating serious games will allow us to quantify where in their local environment students could or not imagine wind turbines and what amelioration options can lift barriers. We will sample different regions in Norway and base the workshop cases on interviews with stakeholders about regional plans and options. The planned research is twofold. 1. We will evaluate the impact of participating in 5-day workshops through pre- and post-questionnaires. We expect the intensive and creative work on regional climate change mitigation through renewables to increase understanding and empowerment regarding climate solutions, and more positive attitudes about wind farms. 2. Based on the workshop generated results, we will develop GIS layers for different social acceptance scenarios and use those in an energy systems model for Norway, to design possible future energy systems as envisioned by young people. From these, we derive recommendations for planning procedures as well as parameters, and provide them to relevant stakeholders. This collaboration between psychological and technological research groups thus allows the integration of feasibility and desirability of energy solutions, combining technical parameters for options with social parameters for choices.

## Outline of project work including expected outcomes/deliverables

You will work in a small group of students to develop teaching materials, concepts and content for a 5-day workshop for adolescents aged 16-18 on climate change mitigation, the energy transition and the sustainable economy of the future. In doing so, you will work towards answering the following questions (This is a preliminary list, the final list will be co-designed with the stipend holders):

- What is important for the adolescents to learn about climate mitigation, the energy transition and the world we should be trying to build with them?
- How can these contents be delivered in an engaging, interactive way?
- What illustrations, videos, quotes, art works etc. help deal with these issues, increase grasping the topics and engaging with them in a creative way?
- Which tasks that workshop participants work on can help achieve these goals?
- What can we learn from the adolescents about their outlooks, wishes, ideas?
- How can we support them in working towards their ideas for a sustainable future?
- How can we measure how the workshops impact the participants?
- What problems can arise during workshop delivery and how can we deal with them?
- What schools, regions, municipalities would be good to sample for this pilot study?

You will deliver your results in the form of a report plus a website with embedded material and interactive elements. This will form the basis for the material to be used during the workshops.

There will be a possibility of continuing as a research assistant in the project, helping with implementing and delivering the workshops.