

Research Project Assistant / Master Thesis

(With remuneration – 4-month student research grant)

Call for applications

Carbon budgets to guide fair allocation of emission reduction: extensions for consumption- and extraction-based considerations

Description

National and regional emission reduction targets (such as the NDCs within the UNFCCC framework) are increasingly discussed in relation to fairness considerations that lead to different allocations of a global carbon budget to countries and regions (Steininger et al. 2016 and Williges et al. 2022). So far, the international discussion and literature on fair budgets and pathways almost exclusively focuses on the UNFCCC emissions accounting principle, production- or territorial based emission accounting. Yet, fairness requires considering other emission accounting concepts as well, in particular consumption-based and extraction-based emissions. A recent claim for such extension is made in Robiou Du Pont et al. (2025).

Objective

Develop a framework for including consumption- and extraction-based emissions accounting in the criteria we consider when assessing fairness of allocation of emission reduction targets, emission pathways and international financing of emissions reductions. Apply these new accounting approaches to example cases of a global carbon budget and assess implications for key case countries.

Method

Conceptual and data base work.

Qualification

- Enrolled in master program in Environmental Systems Science, or Sustainable Development, or Circular Economy, or Global Studies, or a comparable study program.
- Initial experience in empirical and data work.
- Solution-oriented, creative, independent and reliable way of working.

We offer

- Master thesis with remuneration (research grant for Master thesis).
- Collaborative research with the international research community.
- Project start at your availability, with a duration of 4-6 months.
- Thesis in English (preferred) or German.

If you are interested, and have further questions, contact: karl.steininger@uni-graz.at or keith.williges@uni-graz.at

Application: Submit your interest (with short motivation letter, CV, grade reports) by **March, 5th 2026** to robert.lackner@uni-graz.at, indicating “Application Carbon Budget Analysis” as subject of the mail.

Looking forward to applications for collaborative work on a core international policy topic!

Karl Steininger, Wegener Center