## A regional assessment of land-based carbon mitigation options: Bioenergy, reforestation, forest management

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Professorship for Land Surface-Atmosphere Interactions



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## **BLIZ** – Interactions between society, land use and biodiversity in Bavaria until 2100 – a bayklif project





**Biodiversity** tipping points



Tipping points in limnic systems



Land use and multifunctionality



Uncertainty and risk in system models



Social-ecological transformations and acceptance We take a glance into the future...

(ger: Blick in die Zukunft, abb. BLIZ)

**Examine** & tipping points **model** the impacts of climate change on ecological & socio-economic systems & their interactions

**Scenarios** of possible developments in Bavaria

Identify

possible

**Discuss &** assess the scenarios with stakeholders

The collaborative research project (6 groups, 4 universities) has started in 2018.

**Evaluate** Develop uncertainties economically

adaptation & management strategies

Communicate to stakeholders

First results can be found here and in the following slide.

**Dynamic** 

models



ORIGINAL RESEARCH 🔯 Open Access 🕲 🕦

A regional assessment of land-based carbon mitigation potentials: Bioenergy, BECCS, reforestation, and forest management

Andreas Krause ⋈, Thomas Knoke, Anja Rammig

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Do you want to have a closer look at the study?

Read it here



Do you want

to find out how

carbon storage

under climate and

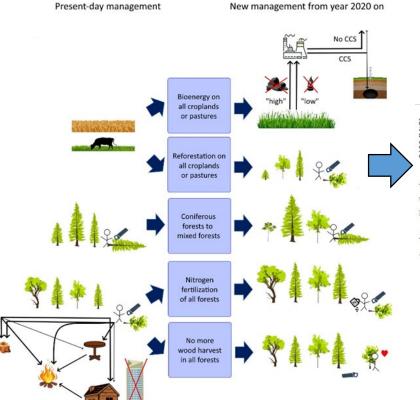
land-use change?

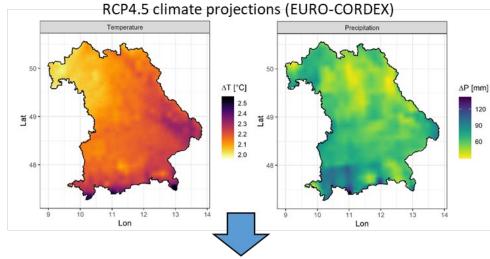
Shiny app here

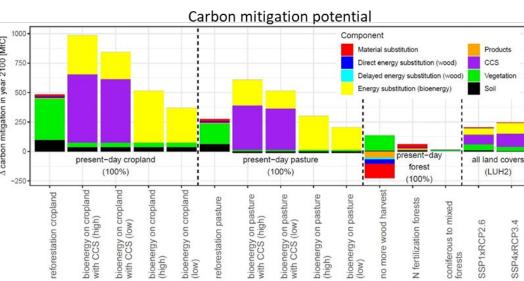
Have a look at our

may change

## Land-use scenarios







Krause A, Knoke T and Rammig A (2020): A regional assessment of land-based carbon mitigation potentials: bioenergy, BECCS, reforestation, and forest management, Global Change Biology Bioenergy