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An Chomhairle um Thaighde in Éirinn

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Introduction

Climate change is affecting cultural landscapes around the world. With the aim to **integrate community voices** and landscape-level perspectives into Climate Vulnerability Assessments (CVA), I am designing an **original and innovative CVA framework** that will enable the identification of the impacts and challenges climate change poses to **biocultural intangible heritage traditions at living cultural landscapes**.

Aims of my research

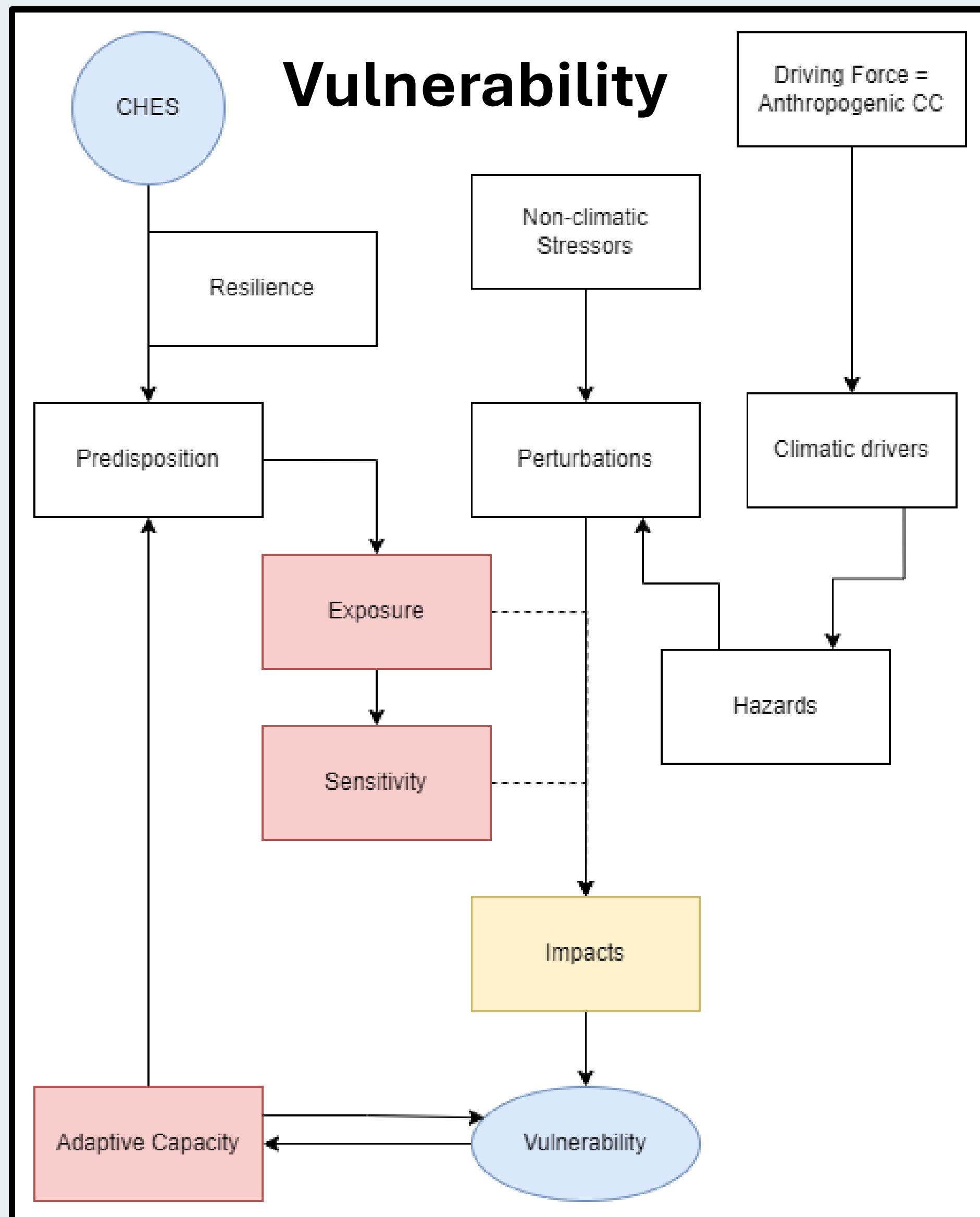
- Explore local community perspectives on climate change threatening their biocultural tradition
- Integrate these voices into both the outcomes of the CVA and its design process
- Identify transferable concepts that can contribute to climate change adaptation at other cultural landscapes threatened by climate change on a global scale

Methodology

- **Design** of a Climate Vulnerability Assessment (CVA) framework integrating landscape, biocultural tradition, and community
 - Based on current state of knowledge CVA concepts
 - Enable the identification of the impacts and challenges climate change poses to biocultural intangible heritage traditions at living cultural landscapes
- **Application** of my CVA framework to three climatically similar case studies in rural, marginalised areas with traditional, biocultural heritage threatened by and exposed to rapid climate change
 - Take a post-humanist approach that ‘zooms in and out’ to both consider the landscape holistically and amplifies community voices

Approach	Method	Goal	Analysis
Quantitative	Collate climate data (secondary research)	Establish threats from climate change	Descriptive statistics, hypothesis testing, regression analysis
Qualitative	Documentary research on climate action (secondary research)	Establish current policies and adaptation strategies regarding climate change	Description
Quantitative	Observational research	Collect information about hazards in the landscape	GIS mapping, network analysis, regression analysis, description
Qualitative	Semi-structured Interviews	Investigate community perspectives who have experienced the phenomenon	GIS mapping, descriptive statistics, thematic analysis, description

- Illustrating a paradigm shift in vulnerability research, key definitions are based on a dynamic understanding of the coupled human environment system (CHES) which utilises adaptive capacity to analyse why and how the system changes under current and future climate change
- What attributes of concern are present? What are the perturbations? How is the system affected? How can it be adapted?
- Subsystems of the CHES can have different vulnerabilities, hence considering the interconnections with the system as well as its wider context is key for my CVA



Case Study North-West Connemara

Utilising theoretical background research and existing science data for climate considerations, I identified points of interests. Currently, I am conducting observational research by analysing climate impacts on the landscapes in the field (see photos below). The next step is to conduct in-depth interviews with the local community and experts in relevant fields to reveal how they perceive climate change challenging their landscape and intangible heritage for a voice-centred approach that emphasises climate change impacts on community values and knowledge systems. With view to the future, I plan to present the CVA results to the local community to expand the transferability and applicability beyond a PhD project (e.g., possibly through a citizen science project).

North-West Connemara, Co. Galway, Ireland

- Identified Points of Interest based on research
- Sites and Monuments Record (NMS data points)
- Preliminary boundary of the case study area

I am currently identifying areas of similar landscape character to assess and map their vulnerabilities. An example can be an ecosystem such as the native oak woodland of Derryclare Nature Reserve, which is impacted by perturbations differently than the surrounding mountainous areas (Twelve Pins and Maumturks).