

## **Synergies and trade-offs between climate action, economic inequality and gender equality: a case of study for the textile sector**

Nowadays, the compatibility of economic, social and environmental objectives is one of the main social challenges as assumed in various international commitments (SDGs of the United Nations 2030 Agenda, Paris Agreements). Furthermore, institutions themselves recognize that this transition may be accompanied by frictions in labour markets and negative impacts on certain regions and groups. In this line, gender equality is presented as a key objective of just transition policies.

Moreover, this ecological transition occurs in a context of high intersectoral and international interdependence, the era of the called global value chains. This context imposes conditions and opportunities for the generation of income and employment with different impacts on sectors, regions and individuals. Consequently, understanding the trade-offs and synergies between the impacts of climate change and considerations of equity and justice (such as gender inequality) is of the utmost importance for economic, social and environmental policy decision-making.

As a consequence, the proposed research focus on the integration of economic, social and environmental dimensions for the design and evaluation of policies that contribute to a just ecological transition.

Concretely, a multisectoral and multiregional model is developed, as it consists on a powerful tool for economic, social and environmental analysis. It allows to incorporate vectors of physical magnitudes, e.g. water, emissions or employment, that illustrate which emissions are associated with each sector and how some sectors employ amounts of men and women to satisfy a demand that could be on the other side of the world. Thus, this methodology shows the interrelations and responsibilities existing among sectors and countries worldwide.

Our current research has been focus on the textile sector as it is considered to be key when explaining recent trends in female employment worldwide. Consequently, it is now proposed to continue this social extension for environmental assessment. While the previous model was extended to implement male and female jobs and wages by sector and country using and linking data from ILO and EORA databases, it is our aim to continue its extension with data of water use and pollution also from EORA, to further work with the current sample of the world economy that consists of 189 countries, 26 sectors of economic activity and the period 1991-2019.

This field of research is relevant in terms of social responsibility because countries should not deny the impact that their activity, for example as consumers, as over other countries well-being or, in this case, over gender inequality and environmental preservation. Furthermore, the models and indicators developed attempt to serve as a basis for the design and evaluation of scenarios of progress towards a just and sustainable transition and, therefore, are in line with the SDGs of the United Nations.

These two extensions of the MRIO models for the world economy, are the ones aimed to be presented during the Summer School.