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### EDITOR'S ADDRESS

Dear readers,  
We are happy to share with you the sixth issue of the newsletter devoted to the FAIRNESS COST Action.

Newsletters have the role of showing and spreading the Action's features and deliverables.

The sixth issue will introduce you with AgroMet School, WG4 meeting and Guidelines for micrometeorological measurements, quality control standards and data correction.

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## ABOUT FAIRNESS

The FAIRNESS action intends to improve standardization and integration between databases/sets of micrometeorological measurements that are part of research projects or local/regional observational networks established for special purposes (agrometeorology, urban microclimate monitoring).

Addressing identified challenges requires an effective transboundary network of researchers, stakeholders (extension services and environmental agencies, local authorities and ministries, SME) and civil society (specialized and general public) from Europe and beyond to identify and fill knowledge gaps, standardize, optimize and promote new environmental-tailored measurement and control procedures, enhance research effectiveness and improve dissemination.



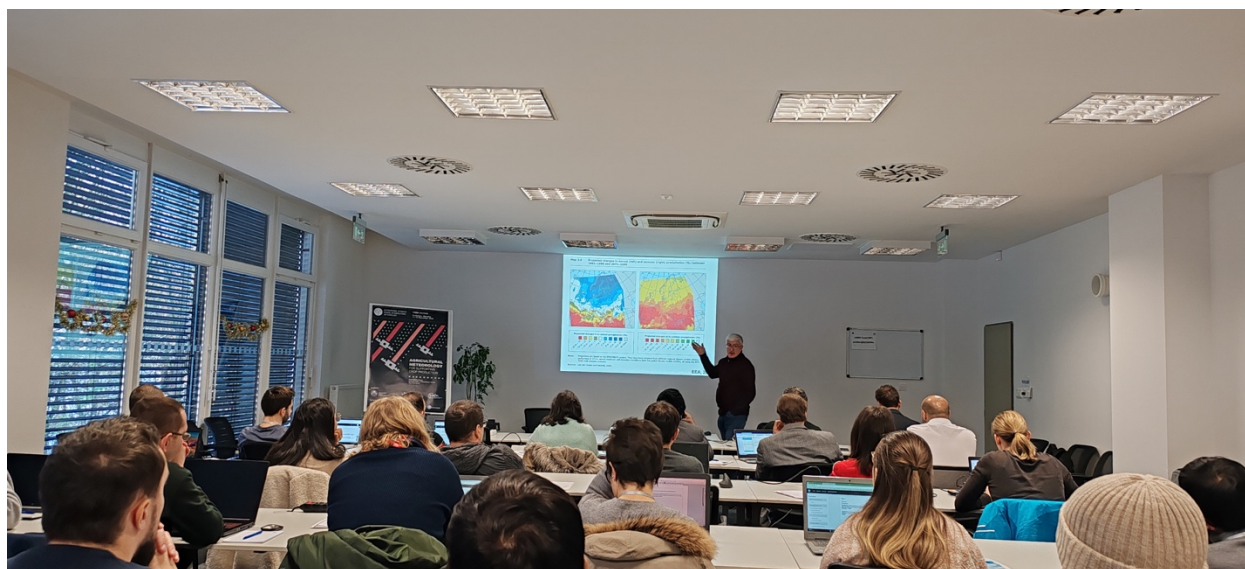
### AgroMet School

- Agrometeorology, the development of new information, knowledge, and innovative tools -

Date: 11-15 December 2023

Venue: Slovak Academy Campus, Dubravská cesta 9

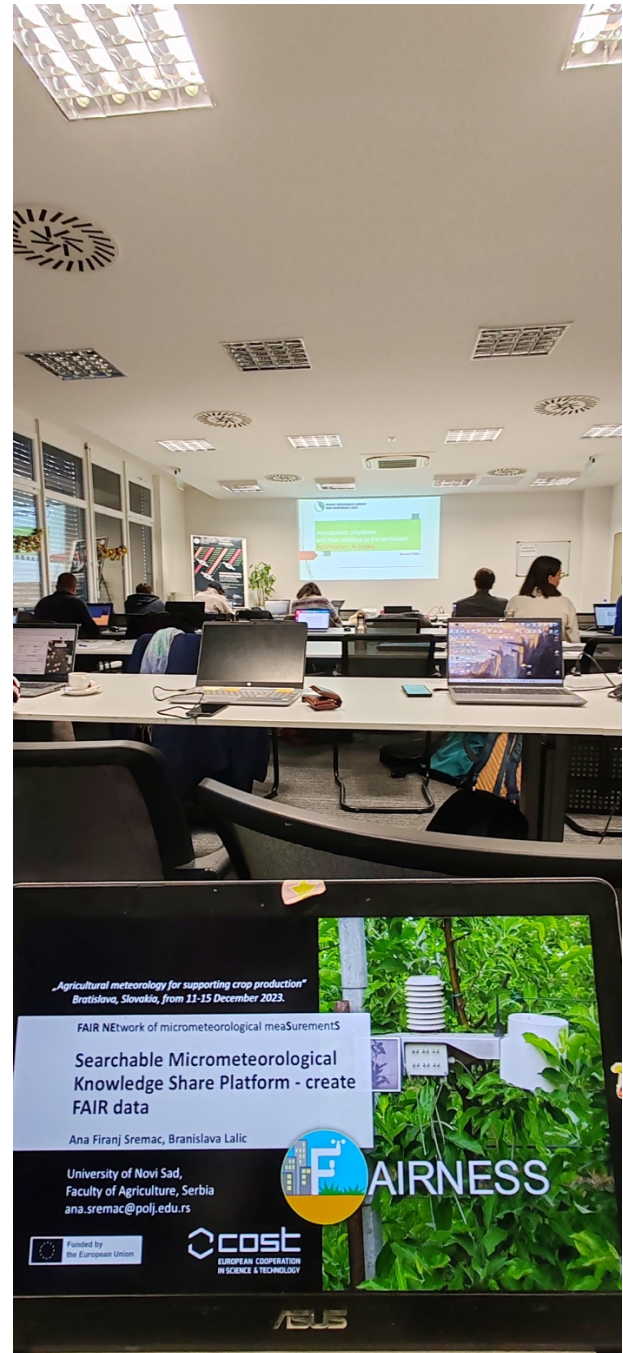
84005 Bratislava, Slovakia



The aim of the school was to facilitate participants in increasing their knowledge of scientific results and advanced technologies for agrometeorological analysis and monitoring, as well as the application of innovative tools for crop production in a climate crisis.

The school is organised as one-week classroom school with lectures, group discussions, and practical training sessions.

*Students and teachers of the course benefit from the Moodle platform through which educational material was shared and assessment procedures conducted. 30 students have successfully completed 3<sup>rd</sup> AgroMet School.*



Prepared by Ana Firanj Sremac

## Meeting in Bamberg

**The FAIRNESS WG4 Meeting about Guideline for future good practices in micrometeorological measurement methods, data assimilation and indices**

Date: 13-14 December, 2023

Venue: Bamberg, Germany



In the historic and picturesque city of Bamberg (Germany), gathering of “Guideline” authors took a significant step forward in shaping the future book. Organized by prof. Thomas Foken, the FAIRNESS WG4 meeting was dedicated to

analysis of ongoing activities, and already written chapters but it was not a routine assembly. It was a deep dive into the current state and future aspirations of micrometeorological measurements. Each chapter was meticulously reviewed ensuring that each segment of the book would serve its purpose effectively. The consensus on the structure and content of the book highlights the collaborative spirit and shared vision among contributors. It reflects a collective commitment to not only documenting current best practices but also to setting new standards that will guide future micro scale measurements.

Prepared by Branislava Lalić

## Guidelines for micrometeorological measurements, quality control standards and data correction

Within WG 4 of the FAIRNESS COST Action currently a guide for “beginners” for micrometeorological measurements for rural and urban applications is under work. Several authors already significantly contributed in writing on the various chapters. In December 2023 an editorial meeting was held in Bamberg, Germany for internal review of draft chapters and planning the further progress. The first fill draft should be finished by end of February 2024, available for a 2-month follow-up period of independent review.

So far it turned out that term “beginners”, which should be the target audience, is difficult to define. In that context, therefore, a stepwise introducing scheme is planned in form of a “preface” text, which should awake motivation or interest for early beginners (i.e. without much physical background) rather than for beginners with already basic physical knowledge which could enter directly to the main chapters. For that purpose, before the main chapter “Introduction” an orientation scheme will be presented, to guide readers directly to the needed information within the book.

The main chapters consist of 1) the Introduction, providing basic physical knowledge to be known, such as radiation,

energy and water fluxes and balance, measurement conditions (influence of vegetation, vertical gradients or horizontal variability), measurement and data management standards, basic technical options and economical considerations; 2) the Methodical recommendations, providing the basic details on the various specific rural and urban applications, such as for low and high vegetation, urban structures and specific methods such as transect or mobile measurements; 3) the Good practices for measurements of the single micrometeorological parameters, explaining why, where and with which technical methods should be measured, including providing the critical technical characteristics of sensors and 4) the Quality control and data recovery recommendations, providing guide for methods of data recovery or using alternative data sources.

The written text will be illustrated by figures and pictures, complemented by tables and a check list scheme will allow the reader to find easily and fast the information needed for a specific measurement task. Complementing a list of useful further-reading links and literature, a glossary will explain specific terms which occur within the text.

All together the Guide will contain between 200-300 pages in its final form and published as an open access (as well as hard copy) Springer book later this year. Further it is planned to be available in an interactive digital form in the Internet. We thank all the

contributors and willingness reviewers, without them the book would not be possible, and hope for further cooperation during the coming months of the finalization. Please send requests or comments to: [josef.eitzinger@boku.ac.at](mailto:josef.eitzinger@boku.ac.at).

Prepared by Josef Eitzinger, Branislava Lalić



# FAIR Network of micrometeorological measurements

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- **Areas of Expertise Relevant for the Action**
- Earth and related Environmental sciences: Meteorology, atmospheric physics and dynamics
- Earth and related Environmental sciences: Climatology and climate change

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- Earth and related Environmental sciences: Meteorology, atmospheric physics and dynamics
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## Keywords

rural micrometeorology, urban micrometeorology, climate change, measurement network, knowledge share platform



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