

FABRE TP Challenge Session at EAAP 2022

Animal farming 4.0: the role of Big Data in animal breeding

With increasing societal and climate challenges, animal farming production must adapt to the demand for animal products in a sustainable and animal welfare-friendly manner. Advanced technologies such as sensors, cloud computing, machine learning, and artificial intelligence can significantly generate tonnes of data and change the scope and organisation of animal breeding and farming. Availability of real-time data, forecasting and tracking information can lead to automated and autonomous farm operations that can change the way we both produce and consume in the near future. Better efficiency and management and also more transparency are expected but also the privacy of breeders and farmers will be impacted. With funding bodies placing more and more emphasis on the open-access publication of both results and original data, discrepancies may arise between the needs of the funding source and the project partners.

Moreover, new technologies are also beneficial for improving animal breeding traits and helping to explore new ones. With advanced technologies, we can increase our understanding of complex animal systems through deep phenotyping. Advanced technologies ultimately provide us with the tools to breed more efficient animals with increased animal welfare and sustainability. Yet, to do so, enormous amounts of data are available.

Do you know what technology there is available to collect this data, and to whom is it accessible? Which data is really important for breeding? How and by whom is it collected? Who stores it, and more importantly, who owns this data and is it shared with any third parties?

FABRE TP organises this challenge session to engage with research, academia, and the private sector in a discussion on the growing role of Big Data in livestock production and the challenges for breeding companies and research. For this session, FABRE TP has invited speaker from across all species and different sectors, from Researchers to Experts of the private sector. We look forward to seeing you in Porto!