

INNOVAR

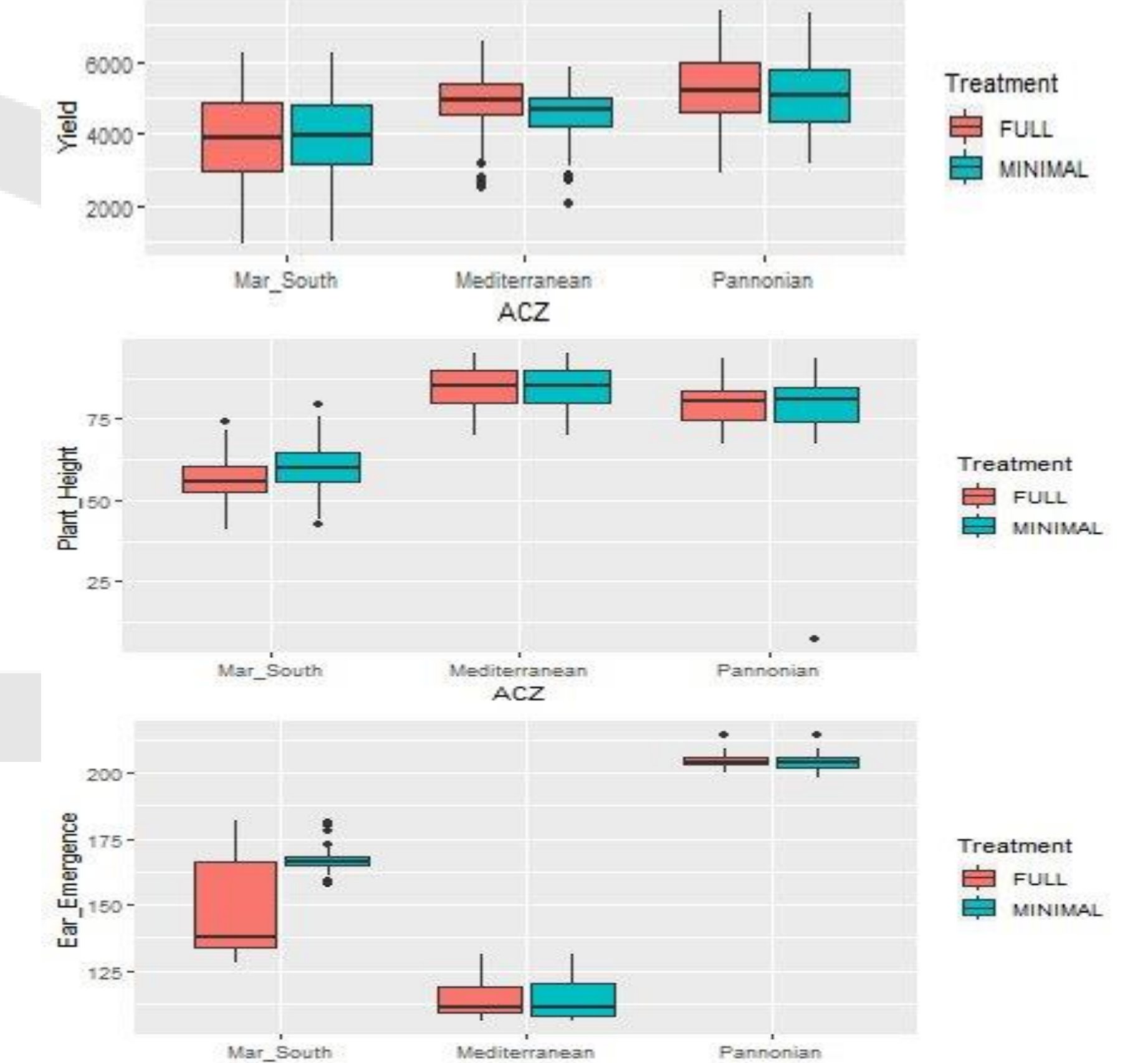
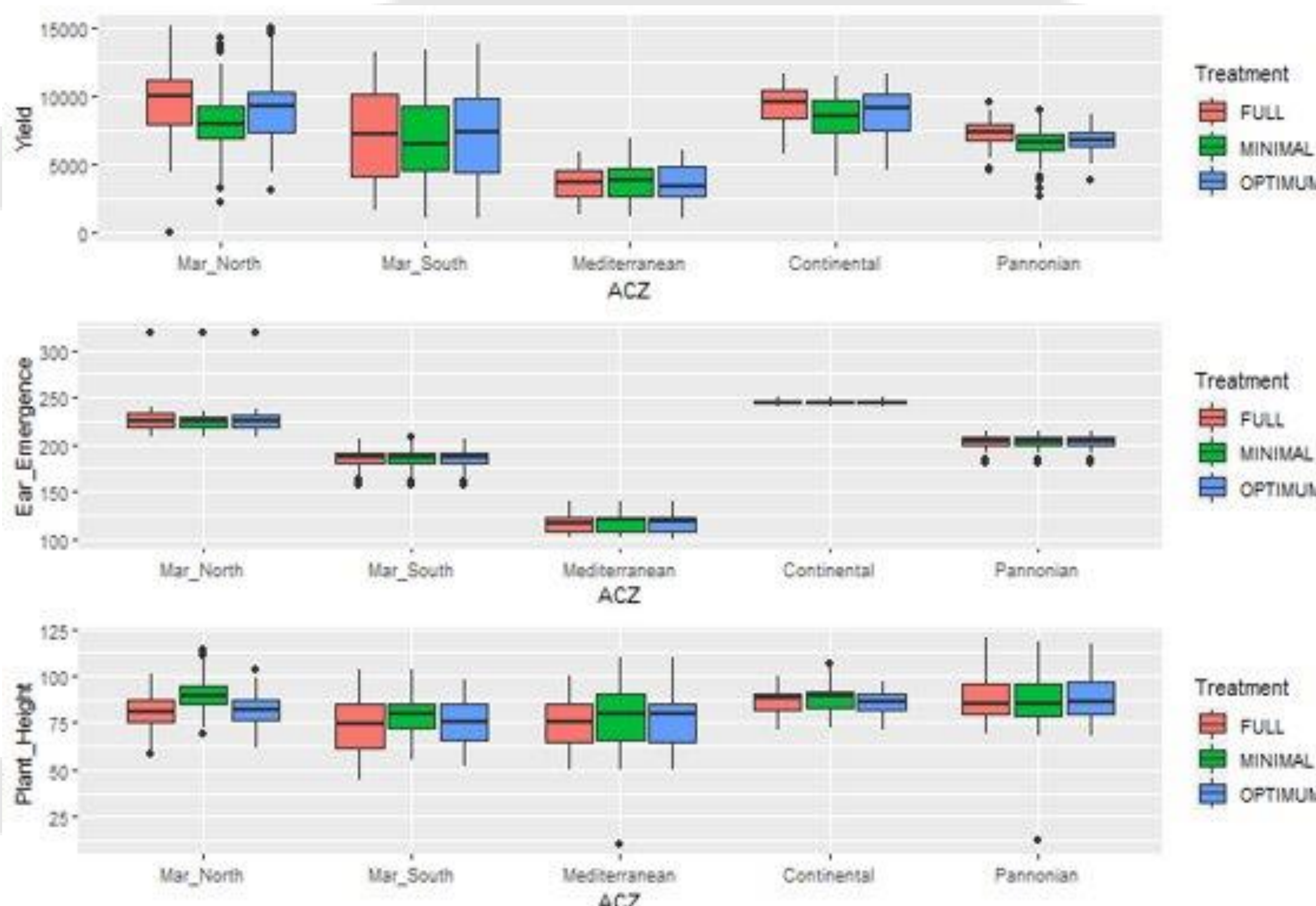
Emerging Results



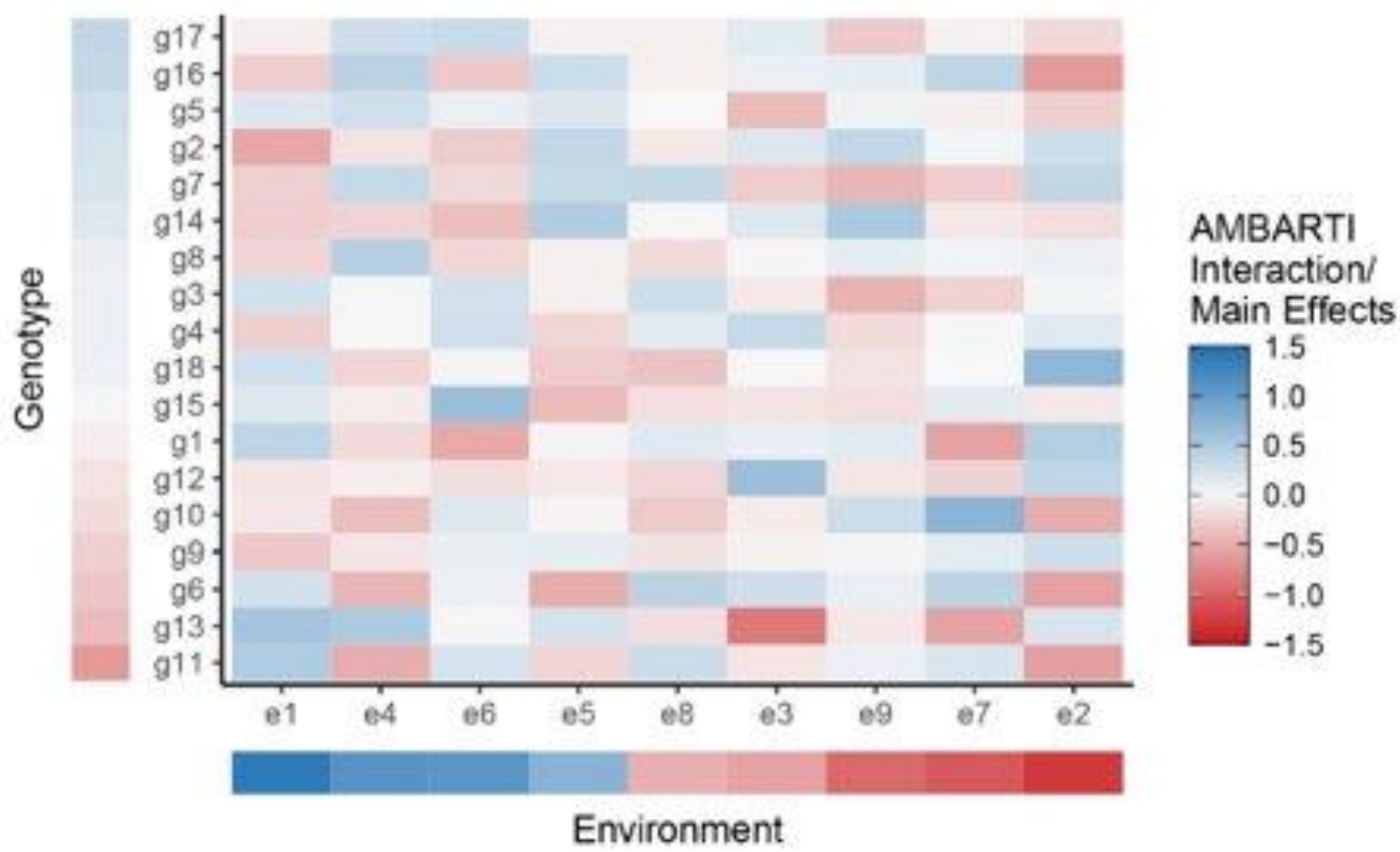
THIS PROJECT HAS RECEIVED FUNDING FROM THE EUROPEAN UNION 'HORIZON 2020 RESEARCH AND INNOVATION PROGRAMME UNDER GRANT AGREEMENT N. 818144

Trials across Europe covering core VCU, drought, organic, durum, and DUS trials. These trial locations have been divided into 5 agro-climatic zones (ACZs): Continental, Pannonian, Mediterranean, Maritime South, and Maritime North.

VCU trials at 16 sites across Europe for three consecutive years. Standardised VCU protocol based on those collected from partner countries. Trials assess the impact of plant protection products, drought and organic practice on varietal performance across the EU in a range of environments.

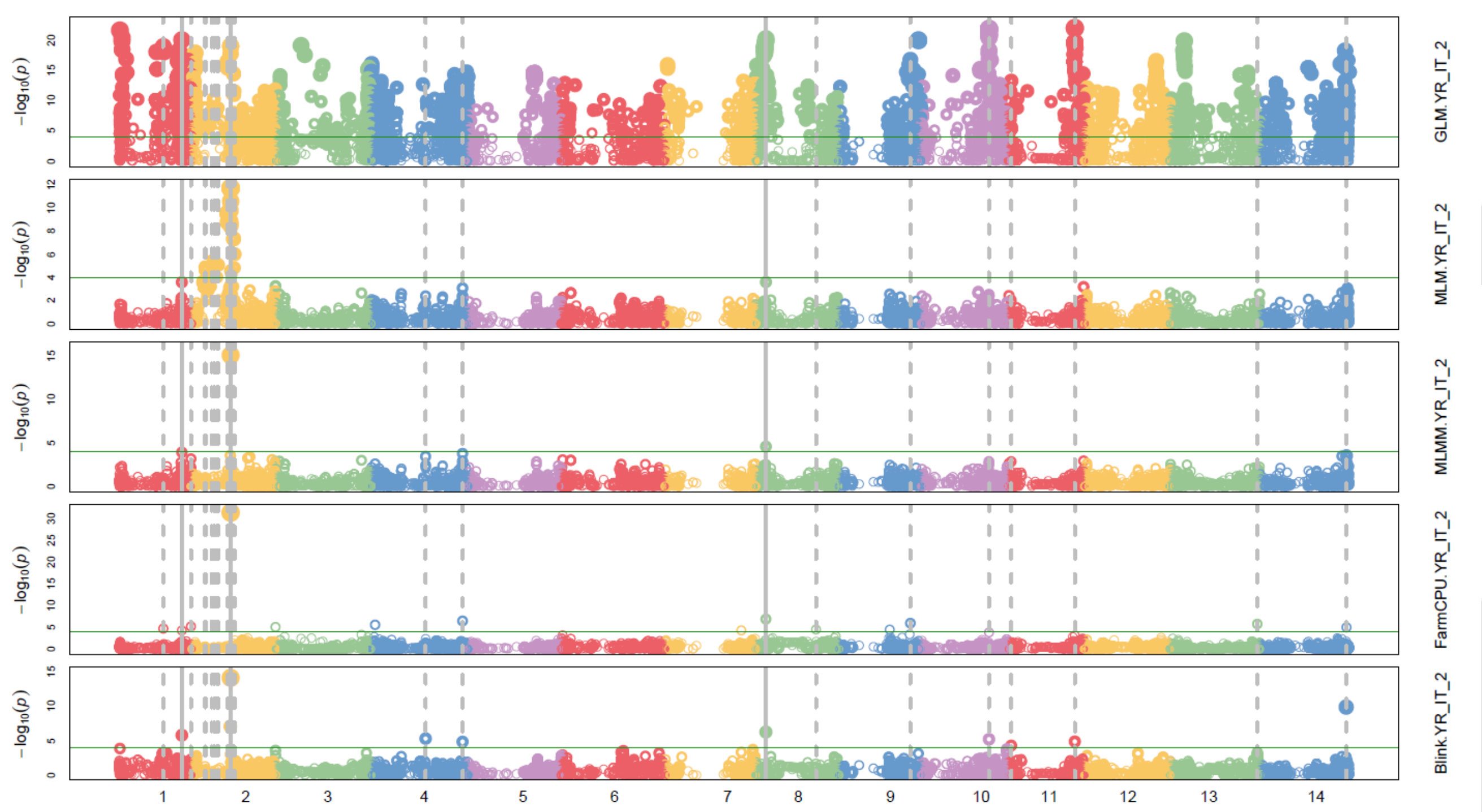
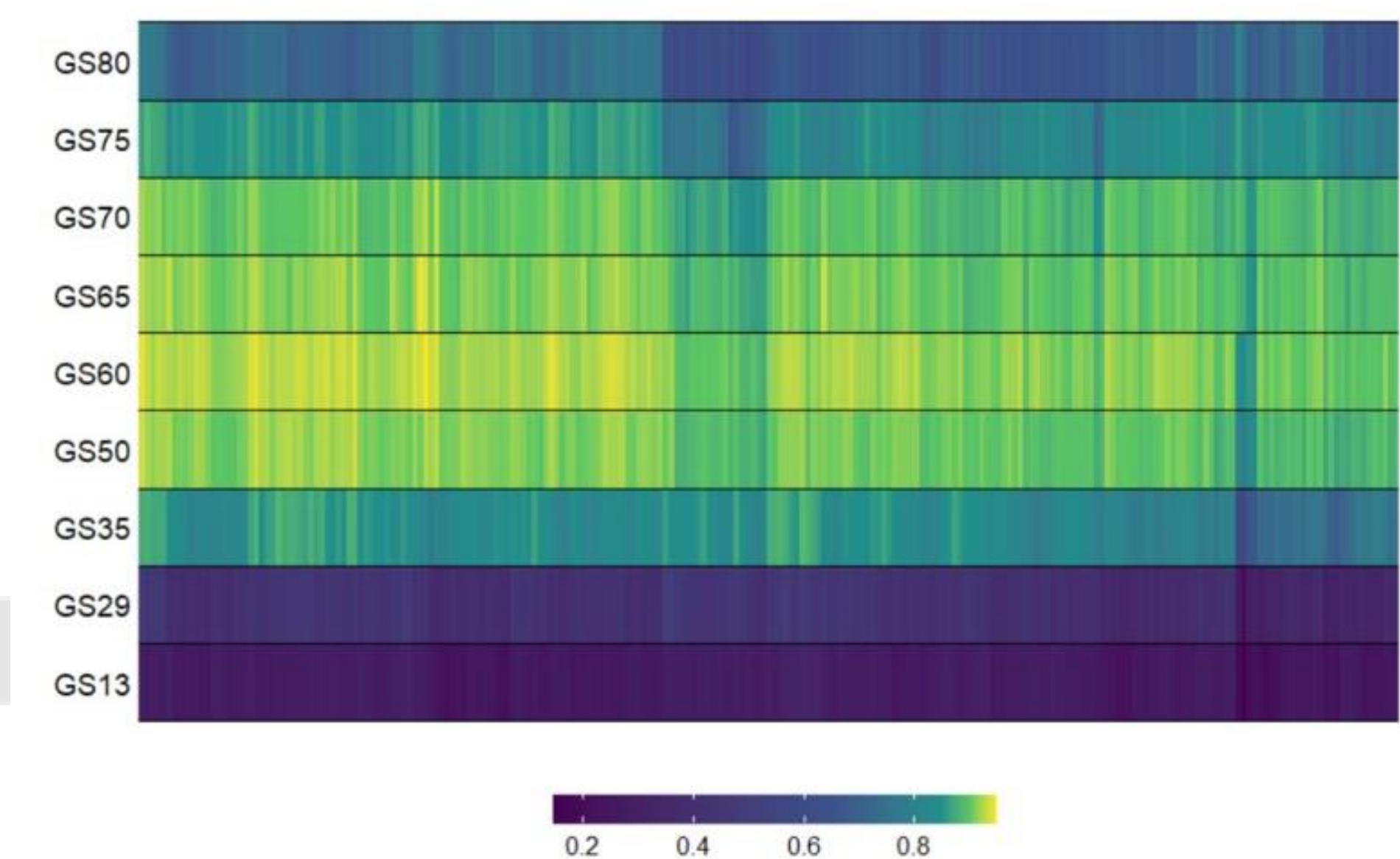


Trial data from the first two years is showing some differences between the three treatment regimes. The highest differences were observed in Maritime North ACZ for yield, and some slight differences in yield in Continental and Pannonian.

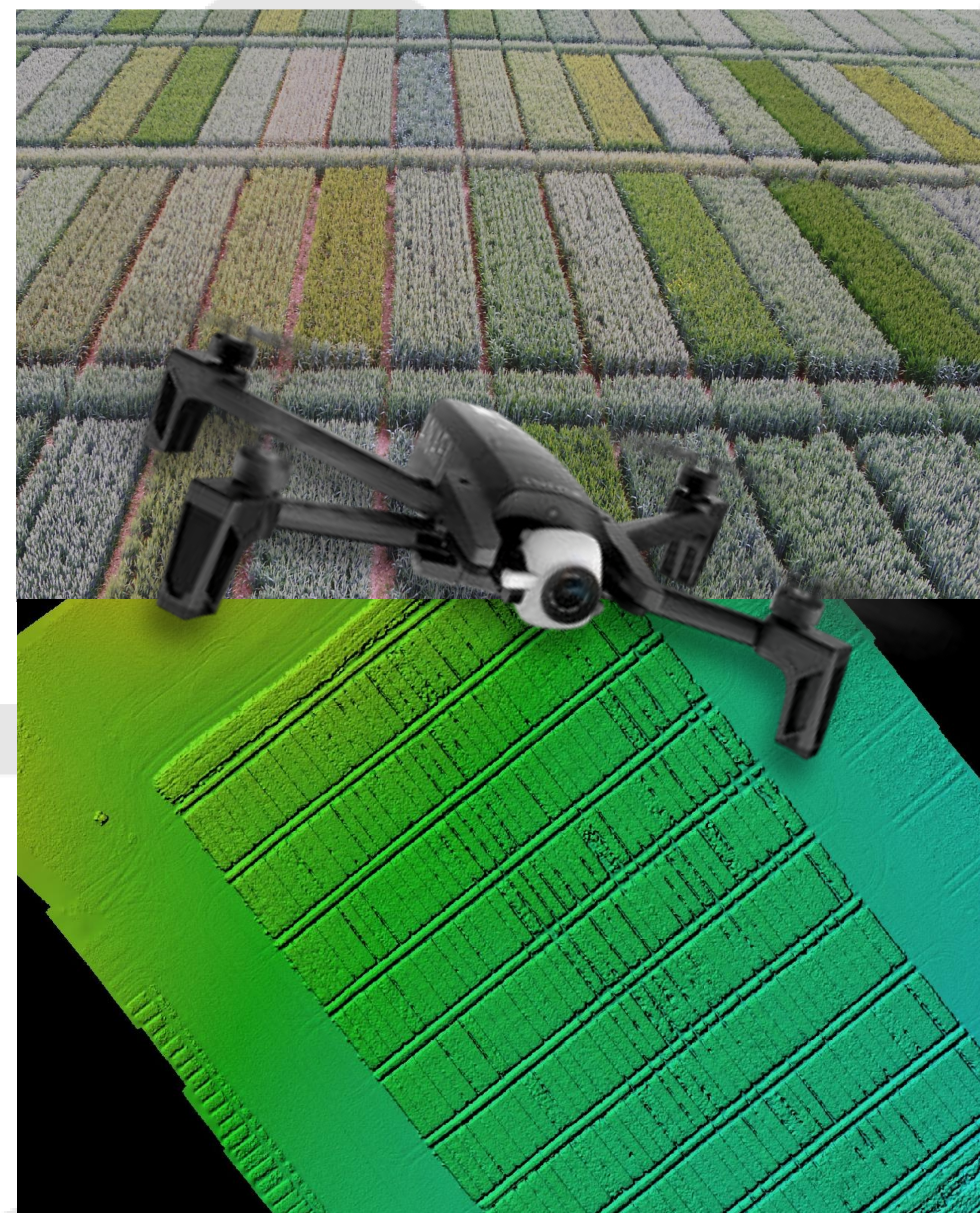


AMBARTI models how an attribute behaves in several environments. As this output has visual appeal it could be used in an app for farmers. NUIM are now trying to predict the performance of a genotype

NDVI output by HORTA



Existing and new genetic data for InnoVar varieties is combined with the phenotypic and phenomic data in genome-wide association studies to identify genomic loci and markers associated with DUS and VCU traits of interest.



Phenomic data is generated from the InnoVar trials using drones. Multispectral sensors capture more effective plant health and management data than tools used in the past. They can pinpoint nutrient deficiencies, identify pest damage, optimise fertilisation and assess water quality.



Our partners at ADAS have been working on a recommendation system to provide farmers with recommendations for the best performing varieties for their biotic and abiotic risk situation. A method based on Best Linear Unbiased Prediction (BLUP) models on the first year's trial data is being tested.