The BIG, the Small, the Unexpected

– Perspectives of Breeding Research –

6th CiBreed Fall Workshop
October 7 & 8, 2025
Von-Siebold-Str. 6
Lecture Hall L01 and L02
37075 Göttingen

Scientific Program

Registration from 12:30   *Tuesday, October 7, 2025*

	Welcome and Opening
13:00-13:15	*Stefan Scholten* (Managing Director of CiBreed), *Thomas Lübberstedt* (Iowa State University, Speaker of CiBreed Scientific Advisory Board)

SESSION 1	**The environment matters**	
	Chair: Dennis Kamelin, University of Goettingen, Crop Plant Genetics	
13:15-13:45	*Salma Balazadeh* University of Göttingen, Molecular stress physiology of plants	*Endophytic Flavobakterium Enhances Root Hair Plasticity and Plant Resilience under Drought*
13:45-14:15	*Daniel Tolhurst* University of Edinburgh, The Roslin Insitute, Edinburgh Innovations, The Royal (Dick) School of Verterinary Studies	*Making big data better: leveraging known and latent environmental covariates for breeding high performing stable genotypes*
14:15-14:35	*Marie F. Bellersen* University of Goettingen, Animal Breeding and Genetics	*The influence of a Nitrogen and Phosphorus reduced feeding on different traits categories in pigs*
14:35-14:55	*Markus Müller* University of Goettingen, Forest Tree Breeding and Forest Genetics	*GWAS and landscape genomics identified genomic candidate regions for drought adaptation in European beech*
14:55-15:15	*Kingsley O. Ibeabuchi* University of Goettingen, Crop Plant Genetics	*Genome-wide association mapping reveals genetic loci underlying phenotypic variation in early root vigour improvement induced by osmopriming in Brassica napus L.*

15:15-16:00	**Poster session and coffee break**

16:00-17:30	**Science Slam**
	Moderation: Johanna S. Schlüter, University of Goettingen, Breeding Informatics

19:00	**Dinner and Science Slam Awards at the restaurant "Bullerjahn"** (requires separate prior registration)

Wednesday, October 8, 2025

SESSION 2	**It's all about data**	
	Chair: Henri Laugel, University of Goettingen, Plant Breeding Methodology	
08:30-9:00	*Amanda Chamberlain* Agriculture Victoria and La Trobe University, Centre for Agribioscience, Victoria, Australia	**Long read sequencing; A new frontier in genetic data for livestock (online)**
9:00-9:20	*Johanna S. Schlüter* University of Goettingen, Breeding Informatics	*Genomic Solutions to Metadata Challenges: a Case Study on the 1000 Bull Genomes Project*
9:20-9:40	*Johan Zicola* University of Goettingen, Crop Plant Genetics	*RNA on the Move: Vesicles Shuttle Small RNAs in* Zea mays *pollen*
9:40-10:00	*Clemens Hacke* University of Hohenheim, Crop Biodiversity and Breeding Informatics	*Prediction of Seed Hilum Color in Soybean*
10:00-10:20	*Yang Wang* University of Goettingen, Crop Plant Genetics	*A high level of heterosis for root growth is associated with the relaxed regulation by small RNA in* Brassica napus *L.*

10:20-11:15 Poster session and coffee break

SESSION 3	New breeding targets and species	
	Chair: Marie F. Bellersen, University of Goettingen, Animal Breeding and Genetics	
11:15-11:45	*Nadine Austel* Julius-Kühn Institute Berlin, Institute for Ecological Chemistry, Plant Analysis, and Storage Protection	**Chemical ecology as key to identify new plant traits mediating insect resistance in oilseed rape and sugar beets**
11:45-12:05	*Henri Laugel* University of Goettingen, Plant Breeding Methodology	*Faba Bean: particular population composition, exceptional opportunities for breeding*
12:05-12:25	*Lientje Haake* University of Goettingen, Biotechnology and Reproduction of Livestock	*Evolution of Sperm Sexing: From Origins to Innovation*
12:25-12:45	*Nora-Fabienne Paul* University of Goettingen, Functional Breeding	*Transcriptomic characterization of missense mutations in the fibrinogen alpha chain gene in a cellular model for chicken amyloid arthropathy*
12:45-13:05	*Hanna Habermann* University of Goettingen, Biotechnology and Reproduction of Livestock	*Effects of heat stress on the developmental characteristics of bovine embryos*

13:05   Poster awards, closing remarks, and farewell

*** END of the WORKSHOP ***

For CiBreed members, Executive Board and Scientific Advisory Board only:

- 13:45-15:00 CiBreed General Assembly in L01

For Executive Board and Scientific Advisory Board only:

- 15:15-17:00 CiBreed SAB+EB Meeting

POSTER SESSION

1	*Marie F. Bellersen* University of Goettingen, Animal Breeding and Genetics	*The influence of a Nitrogen and Phosphorus reduced feeding on different traits categories in pigs*
2	*Victor Chano* University of Goettingen, Forest Tree Breeding and Forest Genetics	*Genotype-specific defense responses define tolerance and susceptibility to ash dieback*
3	*Zain Shabaz* University of Karachi, Department of Botany	*Applying root-endophytic Bacillus strains improves the growth of the oil crop* *canola (Brassica napus L.) under salt stress*
4	*Hieu Cao* University of Goettingen, Forest Tree Breeding and Forest Genetics	*Unveiling the Genetic Potential of* Fagus orientalis *Lipsky for Climate-Resilient Forestry*
5	*Giang Vu* University of Goettingen, Forest Tree Breeding and Forest Genetics	*Genome-Wide Epigenetic Regulation Supports Climate-Adaptive Growth in Douglas-fir*
6	*Kingsley Onyinye Ibeabuchi* University of Goettingen, Crop Plant Genetics	*Genome-wide association mapping reveals genetic loci underlying phenotypic variation in early root vigour improvement induced by osmopriming in* Brassica napus *L.*
7	*Akram Abdolmaleki* South Westphalia University of Applied Sciences & University of Goettingen, Breeding Informatics	*Seed Coating with Superabsorbent Polymers (SAPs): Transcriptomic and Physiological Responses to Drought in Rapeseed*
8	*Andrés Delgado* Instituto de Recursos Naturales y Agrobiología de Sevilla (IRNAS-CSIC), Department of Biogeochemistry, Plant and Microbial Ecology	*Herbivory-induced cytosine methylation as a source of resilience traits in cereal relatives*
9	*Msibi Kholiwe* University of Goettingen & Norwegian University of life Sciences, Animal Breeding and Genetics	*The Role of Microbiota in Sustainable Animal Breeding under Climate Change*
10	*Mudashiru Akanji* University of Goettingen, Animal Breeding and Genetics	*Investigating the Genetic Background of Umbilical Hernia and Potential Improvement Through Genomic Selection (BrokenPig)*

11	*Quentin C. Burandt* University of Goettingen, Agricultural Entomology & Plant Breeding Methodology	*The role of epidermal bladder cells of quinoa (Chenopodium quinoa) in defense against herbivorous insects*
12	*Anna Tabea Mengen* University of Hohenheim, Institute of Crop Sciences, Physiology of Yield Stability	*Comparing phenotyping systems for salinity tolerance in quinoa (Chenopodium quinoa) across phenological stages*
13	*Bright Enogieru Osatohanmwen* University of Goettingen, Plant Breeding Methodology	*2NPLGBM: A genomic model that merges the strengths of classical and machine learning methods in genomic prediction*
14	*Muhammad Imran Khan* South Westphalia University of Applied Sciences & University of Goettingen & PMAS-Arid Agriculture University	*Genetic Diversity and Selection Signatures in Murciano-Granadina and Beetal Goat Breeds: Elucidating Adaptive Mechanisms in Challenging Environments*
15	*Jeremias Götz* University of Goettingen, Forest Tree Breeding and Forest Genetics & ISOGEN GmbH & Co. KG	*Assessment of the physiological plasticity and genetic variability of Scots pine (Pinus sylvestris L.) at its western distribution limit under climate change conditions*
16	*Qianfei Zhu* University of Giessen, Department of Agronomy and Crop Physiology	*Optimization of Genomic Predictions Using Genome-Wide Association Studies*

Workshop Organizing Team

Prof. Dr. Stefan Scholten
Dr. Liane Schulz-Streeck
Ayse Caglier-Yücesoy
Marie Bellersen
Johanna Sophie Schlüter
Dennis Kamelin
Henri Laugel
Alexandra Weigt

Albrecht-Thaer-Weg 3
D-37075 Göttingen
Phone: +49-(0)551-39 25720
CiBreed@uni-goettingen.de