

COST Action CA18111 "Genome Editing in Plants"

Online lecture series

Date: September 28, 2022 – 4 PM CEST

(Upcoming lectures: October 26, November 31, 2022; 4 PM CEST)

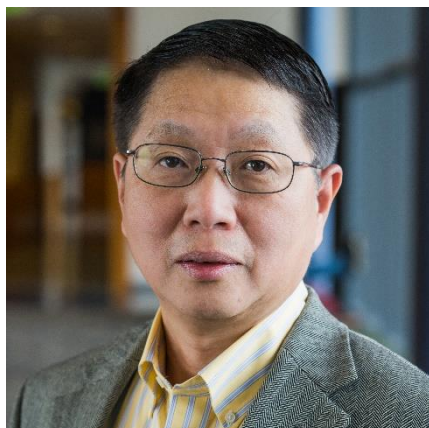
Speaker 1



Dr. Jochen Kumlehn – Division of Cell Biology and Biotechnology, Research group Plant Reproductive Biology, IPK Gatersleben, Germany

Title: Cas Endonuclease Technology in Cereals - Targeted Mutagenesis and Approaches to Higher Precision

Speaker 2



Prof. Yinong Yang - Department of Plant Pathology and Environmental Microbiology, Huck Institutes of the Life Sciences, Pennsylvania State University, USA

Title: CRISPR/Cas-enabled Genome Editing, Precision Breeding and Disease Diagnostics

About Dr. Jochen Kumlehn

Dr. Jochen Kumlehn is head of the Division of Cell Biology and Biotechnology and the Plant Reproductive Biology research group at the Leibniz Institute of Plant Genetics and Crop Plant Research (IPK) Gatersleben in Germany. He received his diploma in Agricultural Sciences and Plant Breeding at the Martin-Luther-University of Halle in 1988, and his doctorate at the Technical University of Berlin in 1994. He has worked as post-doc at the University of Hamburg at the Centre of Applied Plant Molecular Biology for 6 years. In 2001, he eventually went to the IPK Gatersleben. He has been teaching Plant Biotechnology at the Martin-Luther-University of Halle since 2010.

The work of his team is particularly devoted to the research area of plant reproductive biology and the development and employment of enabling technologies, with the improvement of crop plant performance being the overarching research goal. The Kumlehn lab's technological platform comprises methods of genetic engineering and the generation of true-breeding plants originating from haploid cells for the cereals barley, wheat, rye, triticale, maize as well as for some dicots. The employment of Cas endonuclease technology is based upon the recently developed modular, highly versatile CasCADE vector system. In cereals, the group has developed plants resistant to pathogenic viruses and fungi, modified in plant architecture, spike and grain morphology as well as improved in food quality. Currently running projects aim at developing genome editing with improved precision, elucidating mechanisms of cereal domestication, establishing resistance to pathogens as well as optimizing nutrient uptake and allocation.

About Prof. Yinong Yang

Yinong Yang is a Professor in the Department of Plant Pathology and Environmental Microbiology and the Huck Institute of Life Sciences at the Pennsylvania State University. He received a PhD in Plant Molecular and Cellular Biology from University of Florida and conducted postdoctoral research in the Waksman Institute of Microbiology at Rutgers University. Over the past thirty years, he has been primarily worked in the areas of molecular plant-microbe interactions and genome editing. His recent studies focus on the improvement and application of CRISPR/Cas technologies in plant and microbial genome engineering, crop breeding and disease diagnostics.

How to join the lecture session?

You can register for this online lecture session by submitting your name and email here: <https://forms.gle/p8QThieuKajwJo658>

A link to join the session will be sent to you later in August.

Program of upcoming online lecture series

October 26, 2022 – 4 PM CEST

Prof. Dan Voytas, Department of Genetics, Cell Biology and Development, Center for Precision Plant Genomics, University of Minnesota, USA

Dr. Concetta Licciardello, Consiglio per la ricerca in agricoltura e l'analisi dell'economia agraria (CREA), Centro di ricerca Olivicoltura Frutticoltura Agrumicoltura (OFA), Italy

November 30, 2022 – 4 PM CEST

Prof. Neal Steward, Centre of Agricultural Synthetic Biology, University of Tennessee, USA

Prof. Sadiye Hayta, John Innes Centre, UK