

Your CEPAMS Newsletter -September 2023

What is CEPAMS?

CEPAMS stands for Centre of Excellence for Plant and Microbial Science and is a collaboration between three world-leading laboratories:

Center for Excellence in Molecular Plant Sciences (<u>CEMPS</u>) in Shanghai Institute of Genetics and Developmental Biology (<u>IGDB</u>) in Beijing John Innes Centre (<u>JIC</u>) in Norwich

CEPAMS group leaders are affiliated with CEMPS or IGDB. Their labs are housed in either in Beijing or Shanghai. However, CEPAMS group leaders also have the privilege to conduct their scientific research in JIC, to cooperate with JIC faculty, and to attend internal academic meetings at JIC.

The CEPAMS collaboration is built on a strong history of scientific links between JIC and the Chinese Academy of Sciences. It's aim is to work together to produce excellent plant and microbial science for the global public good.

In this newsletter we showcase the outstanding science, and celebrate the collaboration, engagement and outreach of our scientists.

Professor Dame Caroline Dean, Co-director CEPAMS

Events Coming Up

September <u>Seminars at CEMPS</u> (Shanghai)

September <u>Seminars at IGDB</u> (Beijing)

September

11-13 October

7-9 November

18-20 March 2024

Friday Seminars at JIC (Norwich Annual Science Meeting (Norwich)

TSL Autumn Symposium (Norwich)

CEPAMS Symposium (Hainan, China)

CEPAMS Publications



Gao et al. Nodule inception activates gibberellin biosynthesis genes during rhizobial infection.

<u>Kameoka et al</u>. Dienelactone hydrolase like protein1 negatively regulates the KAI2-ligand pathway in *Marchantia polymorpha*.

<u>Lin et al</u>. The regulation of chromatin configuration at agamous locus by LFR-SYD-containing complex is critical for reproductive organ development in Arabidopsis.

<u>Liu et al</u>. A high-resolution genotype—phenotype map identifies the *TaSPL17* controlling grain number and size in wheat.

<u>Liu et al</u>. Uncovering the transcriptional regulatory network involved in boosting wheat regeneration and transformation.

Mashiguchi et al. Activation of strigolactone biosynthesis by the dwarf14-like/karrikin-insensitive2 pathway in mycorrhizal angiosperms, but not in arabidopsis, a non-mycorrhizal plant.

Zhang et al. Epigenetic regulation of nitrogen signaling and adaptation in plants.



CEPAMS Symposium 2024

The 2024 CEPAMS Symposium will be in Sanya YaZhou Bay Resort, Hainan, China on 18th to 20th March.

Following last year's virtual meeting, there are now several exciting new UK/China collaborations emerging. The meeting in Hainan is another opportunity for scientists to reinforce those collaborations and initiate new ones.

Hainan is a wonderful location (think Hawaii!) and many non-CEPAMS scientists are also likely to be there as it is the time of year for field experiments (and many Chinese scientists use that location for their field experiments).

If you are a JIC or TSL Group Leader, please save the dates in your diary now and indicate your intention to join us in Hainan to Roger Berwick.



Conferences, Seminars and Projects

Several of you have been presenting, or are planning to present, at conferences and seminars.

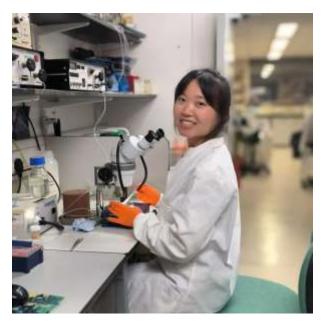
- JIC scientist <u>Dr Jie Li</u> (above picture) presented to IGDB and CEMPS on *Unlocking Nutrition Potential: A novel and sustainable route to* nutritional security.
- Dr Xiangdong Fu, Dr Fei He and Dr Fei Lu organised a workshop at IGDB in Beijing on Crop Breeding and Artificial Intelligence. The all-day event took place in June with over 20 speakers and 200 attendees.
- In August Dr Fei He attended the <u>Annual Meeting of the Chinese</u>
 <u>Society for Plant Pathology</u> in Taian, China and gave a talk on <u>Mining R-Avr gene pairs in wheat powdery mildew via biGWAS</u>.
- Also in August, Dr Fei He attended the 11th conference of wheat genomics and molecular breeding in Hefei, China and presented on The potential application of Al in wheat breeding.
- In September Dr Hiromu Kameoka will be at <u>The 6th international</u>
 <u>Molecular Mycorrhiza Meeting</u> in Cambridge UK. He will be presenting
 his research on *Plant-derived compounds that induce symbiotic* responses in AM fungi.



Collaborations

CEPAMS scientists have been busy collaborating with scientists around the world. Including:

- Dr Fei He gained invaluable experience putting together a joint proposal for funding with JIC scientists Prof. Cristobal Uauy, Dr Yusheng Zhao and Dr Yiliang Ding.
- Dr Hiromu Kameoka will be in Norwich in September discussing, among other things, specialised metabolites of AM fungi with JIC Group Leaders.



A CEPAMS Student Experience at JIC

From March to August 2023, Fuyu Li, a CEPAMS student from Jeremy Murray's group, undertook a placement at John Innes Centre to work on her PhD research project involving the study of high-affinity nitrate transporters in plants. Click here to read about Fuyu's amazing experiences in her own words...

Share your science

We'd love to celebrate your science in the CEPAMS newsletter. Please <a href="mailto:e

- Recent events you've been involved in.
- Awards that you or colleagues have received.
- Podcasts or seminars you have given.
- Virtual events you have attended or would like to be advertised.
- Interactions with external people on your science and projects.
- Industry interactions and collaborations.
- Articles you have published.