

CURRICULUM VITAE

Zhen Wang, Ph.D.

303 Keim hall, Lincoln, NE 68583, USA

Email: zwang3@unl.edu

Education

Ph.D. Plant Biology

Institute of Botany, Chinese Academy of Sciences, Beijing, China

M.S. Plant Physiology

Jilin Agricultural University, Changchun, China

Employment history

Professor (2016 - 2022) Department of forage breeding and cultivation, Institute of Animal Science, Chinese Academy of Agricultural Sciences, Beijing, China

Research assistant professor (2015 - 2016) Department of Agronomy and Horticulture, University of Nebraska – Lincoln, Lincoln, NE, USA

Postdoctoral research associate (2008 - 2015) School of Biological Sciences, University of Nebraska – Lincoln, Lincoln, NE, USA

Postdoctoral research fellow (2006 - 2008) Department Molecular Plant Genetics, Max Planck Institute for Plant Breeding Research, Cologne, Germany

Research assistant professor (2004 - 2006) Key laboratory of Photosynthesis and Environmental Molecular Physiology, Institute of Botany, Chinese Academy of Sciences, Beijing, China

Received funding

1. Strategic Priority Research Program of the Chinese Academy of Sciences, No. XDA26030102-2
2. National Natural Science Foundation of China, No. 31772663
3. Central Public-interest Scientific Institution Basal Research Fund, No. 2017ywf-2d-3
4. Scientific Research Start-up Fund for Bright Scholars, the Chinese Academy of Agricultural Sciences, No. ASTIP-IAS-TS-14

Supervised students

Yanan Liu, Jie Kong

Public service

Reviewer: *Plant Cell Reports*, *Journal of Integrative Agriculture* and *In Vitro Cellular & Developmental Biology*

Guest Editor: *Genes* (the Special Issue on Mining the Excellent Functional Genes of Forage)

Selected publications

1. Xue Wang, Juping Wang, Huiting Cui, Weilong Yang, Bin Yu, Chi Zhang, Jiangqi Wen, Junmei Kang, **Zhen Wang***, Qingchuan Yang* (2022) The UDP-glycosyltransferase MtUGT84A1 regulates anthocyanin accumulation and plant growth via JA signaling in *Medicago truncatula*. *Environmental and Experimental Botany* 201, September 2022, 104972. (<https://doi.org/10.1016/j.envexpbot.2022.104972>)
2. Fei He, Ruicai Long, Chunxue Wei, Yunxiu Zhang, Mingna Li, Junmei Kang, Qingchuan Yang, **Zhen Wang*** Lin Chen* (2022) Genome-wide identification, phylogeny and expression analysis of the *SPL* gene family and its important role in salt stress in *Medicago sativa* L. *BMC Plant Biology* 22: (1) 295-307.
3. Lin Chen, Fei He, Ruicai Long, Fan Zhang, Mingna Li, **Zhen Wang***, Junmei Kang*, Qingchuan Yang* (2021) A global alfalfa diversity panel reveals genomic selection signatures in Chinese varieties and genomic associations with root development. *Journal of Integrative Plant Biology* 63 (11): 1937-1951.
4. **Zhen Wang***, Junmei Kang, Juan Armando Casas-Mollano, Yongchao Dou, Shangang Jia, Qingchuan Yang, Chi Zhang, Heriberto Cerutti* (2021) MLK4-mediated phosphorylation of histone H3T3 promotes flowering by transcriptional silencing of *FLC/MAF* in *Arabidopsis thaliana*. *The Plant Journal* 105 (5): 1400-1412.
5. Junmei Kang, Huiting Cui, Shangang Jia, Wenwen Liu, Renjie Yu, Zhihai Wu, **Zhen Wang*** (2020) *Arabidopsis thaliana* *MLK3*, a Plant-Specific Casein Kinase 1, negatively regulates flowering and phosphorylates histone H3 *in vitro*. *Genes* 11 (3): 345-355.

6. Puneet Paul, Balpreet K. Dhatt, Michael Miller, Jing J. Folsom, **Zhen Wang**, Inga Krassovskaya, Kan Liu, Jaspreet Sandhu, Chi Zhang, Toshihiro Obata, Paul Staswick, Harkamal Walia (2020) *MADS78 and 79 are essential regulators of early seed development in rice. Plant Physiology* 182 (2): 933-948.
7. Junmei Kang, Qiaoyan Zhang, Xu Jiang, Tiejun Zhang, Ruicai Long, Qingchuan Yang, **Zhen Wang*** (2019) Molecular cloning and functional identification of a squalene synthase encoding gene from alfalfa (*Medicago sativa* L.). *International Journal of Molecular Sciences* 20 (18): 4499-4515.
8. **Zhen Wang**, Xiaomin Wang, Bo Xie, Zhonglie Hong, Qingchuan Yang (2018) Arabidopsis NUCLEOSTEMIN-LIKE 1 (NSN1) regulates cell cycling potentially by cooperating with nucleosome assembly protein AtNAP1;1. *BMC Plant Biology* 18 (1): 99-110.
9. Chen Chen, Kevin Begcy, Kan Liu, Jingjing Folsom, **Zhen Wang**, Chi Zhang, Harkamal Walia (2016) Heat stress yields a unique MADS box transcription factor in determining seed size and thermal sensitivity. *Plant Physiology* 171 (1): 606-622.
10. **Zhen Wang**, Juan A. Casas-Mollano, Jianping Xu, Jean-Jack M. Riethoven, Chi Zhang, Heriberto Cerutti (2015) Osmotic stress induces phosphorylation of histone H3 at threonine 3 in pericentromeric regions of *Arabidopsis thaliana*. *Proceedings of the National Academy of Sciences of the United States of America* 112 (27): 8487-8492.
11. **Zhen Wang**, Shuping Xing, Rainer P. Birkenbihl, Sabine Zachgo (2009) Conserved functions of *Arabidopsis* and rice CC-type glutaredoxins in flower development and pathogen response. *Molecular Plant* 2 (2): 323-335.
12. Li Wang, **Zhen Wang**, Yunyuan Xu, Se-Hwan Joo, Seong-Ki Kim, Zhen Xue, Zhihong Xu, Zhiyong Wang, Kang Chong (2009) *OsGSR1* is involved in crosstalk between gibberellins and brassinosteroids in rice. *The Plant Journal* 57 (3): 498-510.