CURRICULUM VITAE

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Education

Fudan University	Biology	B.A./B.S.	1989
Shanghai Institute of Plant Physiology	Plant Molecular Biology	M.S.	1992
California Institute of Technology	Genetics	Ph.D.	1998
Whitehead Institute, MIT	Genetics	Postdoc	1998-2001

Professional Appointments

2015-present	Professor, Plant Biology Section, SIPS, Cornell University, Ithaca, NY
2008-2015	Associate Professor, Department of Plant Biology, Cornell University, Ithaca, NY
2001-2008	Assistant Professor, Department of Plant Biology, Cornell University, Ithaca, NY
1998-2001	Postdoctoral Fellow, Whitehead Institute, MIT, Cambridge, MA

Research interests

Plants monitor and respond to their environment constantly, which is essential for their viability and fitness. The ultimate goal of our research is to understand the molecular mechanisms by which plants perceive environmental signals and integrate signals to regulate their growth and development. We are particularly interested in temperature responses, immune responses, and the interaction between abiotic and biotic responses. We are currently using Arabidopsis thaliana as a model plant to investigate how plant immune responses are repressed under non-pathogenic conditions, how temperature modulates plant disease resistance and how plants respond and adapt to temperature variations.

Publications

Bao Z, Zhang N, and **Hua J** (2014) Endopolyploidization and flowering time are antagonistically regulated by checkpoint component MAD1 and immunity modulator MOS1. *Nat. Commun.* 5:5628

Bao Z and **Hua J** (2014) Interaction of CPR5 with cell cycle regulators UVI4 and OSD1 in Arabidopsis. *PLoS One*, 9(6): e100347.

Zou B, Yang D, Shi Z, Dong H, and **Hua J** (2014) Monoubiquitination of Histone 2B at the disease resistance gene locus regulates its expression and impacts immune responses in Arabidopsis. *Plant Physio*, 165:309-318.

Hua J (2014) Temperature and plant immunity. in Temperature and Plant Development, 163-180, Wiley Blackwell Publisher.

Hua J (2013) Modulation of plant immunity by light, circadian rhythm, and temperature. *Curr Opin Plant Biol.* 16:406-413.

Bao Z, Yang H, **Hua J** (2013) Perturbation of cell cycle regulation triggers plant immune response via activation of disease resistance genes. *PNAS*, 110:2407-2412.

Zhu Y, Du B, Qian J, Zou B, and **Hua J** (2013) Disease resistance gene-induced growth inhibition is enhanced by rcd1 independent of defense activation in Arabidopsis. *Plant Physio*, 161:2005-2013.

Zhu Y, Mang HG, Sun Q, Hipps A, and **Hua J** (2012) Gene discovery using mutagen-induced polymorphisms and deep sequencing: application to plant disease resistance. *Genetics*, 192:139-146.

Mang HG, Qian W, Zhu Y, Qian J, Kang H, Klessig DF, and **Hua J** (2012) ABA deficiency antagonizes high temperature inhibition of disease resistance through enhancing nuclear accumulation of R proteins SNC1 and RPS4. *Plant Cell*, 24:1271-1284.

Gou M and **Hua J** (2012) Complex regulation of an R gene SNC1 revealed by auto-immune mutants. *Plant Signal Behav*, 7:213-216.

Gou M, Shi Z, Zhu Y, Bao Z, Wang G, and **Hua J** (2012) The F-box protein CPR1/CPR30 negatively regulates R protein SNC1 accumulation. *Plant J*, 69, 411-420.

Zhu Y, Yang H, Mang HG, and **Hua J** (2011) Induction of *BAP1* by a moderate decrease in temperature is mediated by *ICE1* in Arabidopsis. *Plant Physiol*, 155, 580-588.

Zhu Y, Qian W, and **Hua J** (2010) Temperature modulates plant defense responses through NB-LRR proteins. *PLoS Pathog*, 6: e1000844.

Li Y, Gou M, Sun Q, and **Hua J** (2010) Requirement of calcium binding, myristoylation, and protein-protein interaction for the copine BON1 function in Arabidopsis. *J Biol Chem*, 285, 29884-29891.

Hua J (2009) From freezing to scorching, transcriptional responses to temperature variations in plants. *Curr Opin Plant Bio*, 12:568–573.

Wang Y, Bao Z, Zhu Y, and **Hua J** (2009) Analysis of temperature modulation of plant defense against biotrophic microbes. *MPMI*, 22: 498-506.

Wang Y and **Hua J** (2009) A moderate decrease in temperature induces COR15a expression through the CBF signaling cascade and enhances freezing tolerance. *Plant J*, 60: 340-349.

Li Y, Pennington BO, and **Hua J** (2009) Multiple R-like genes are negatively regulated by BON1 and BON3 in Arabidopsis. *MPMI*, 22: 840-848.

Yang H, Yang S, Li Y, and **Hua J** (2007) The Arabidopsis BAP1 and BAP2 genes are general inhibitors of programmed cell death. *Plant Physiol*, 145: 135-146.

Li Y, Yang S, Yang H, **Hua J** (2007) The TIR-NB-LRR gene SNC1 is regulated at the transcript level by multiple factors. *Mol Plant Microbe Interact*. 20(11):1449-1456.

Yang S, Yang H, Grisafi P, Sanchatjate S, Fink GR, Sun Q, and **Hua J** (2006). The *BON/CPN* gene family represses cell death and promotes cell growth in Arabidopsis. *Plant J*, 45: 166-179.

Yang H, Li Y, and **Hua J** (2006) The small C2 protein BAP1 negatively regulates cell death and defense response in Arabidopsis. *Plant J*, 45: 166-179.

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Hua J, Grisaffi P, Cheng, SH, Fink GR. (2001) Plant growth homeostasis is controlled by the Arabidopsis *BON1* and *BAP1* genes. *Genes Dev*, 15:2263-2272.

Hua J, Meyerowitz EM. (1998) Ethylene responses are negatively regulated by a receptor gene family. *Cell*, 94:261-271.

Hua J, Sakai H, Chen QG, Nourizadeh S, Bleecker AB, Ecker JR, Meyerowitz EM. (1998) *EIN4* and *ERS2* are two members of the putative ethylene receptor gene family. *Plant Cell*, 10:1321-1332.

Sakai H, **Hua J**, Chen QG, Chang C, Mderano L, Bleecker AB, Meyerowitz EM. (1998) *ETR2* is an *ETR1*-like gene involved in ethylene signaling in Arabidopsis. *PNAS*, 95:5812-5817.

Hua J, Sakai H, Meyerowitz EM. (1997) The ethylene receptor gene family in Arabidopsis. in Biology and Biotechnology of the Plant Hormone Ethylene, 71-76. Kluwer Academic Publishers.

Hua J, Chang C, Sun Q, Meyerowitz EM. (1995) Ethylene insensitivity conferred by Arabidopsis *ERS* gene. *Science*, 269:1712-1714.