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Dr. Lijuan Ma obtained her PhD in Biochemistry and Molecular Biology from Sun Yat-sen University, working on DNA replication mechanism and related cancer therapy. After two years continuing research on mitosis cell cycle regulation, she joined Dr. Gerald R. Smith lab at Fred Hutchinson Cancer Research Center for her postdoc training to study another specific cell cycle, meiosis. Currently, her research focus on two aspects: 1. Age-related aneuploidy in human eggs and its related decline in female fertility and early miscarriage. 2. aneuploidy and cancer. Taking advantage of yeast traceable genetic system and powerful molecular tools, we are identifying drugs from TCM to interfere aneuploidy eggs formation thus to reduce the rate of early miscarriage. On the other hand, aneuploidy in somatic cells is the most prevalent genetic alteration in human cancer. Aneuploidy is a valuable cancer therapeutic target.

Biochemistry and Molecular Biology; Biochemistry and Molecular Biology  
Experiments; Microbiology and Immunology; Pharmacology and Clinical Pharmacy  
III—Clinical Pharmacology and Pharmacotherapy

1. anticancer drugs from TCM
2. age-related aneuploidy and miscarriage
3. molecular mechanism of meiosis

2003-2009     PhD, Molecular Biology and Biochemistry, Sun Yat-sen University,  
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1999-2003 Bachelor, Biological Science, Shanxi Normal University, Shanxi, China

2017-present Assistant Professor, Macau University of Science and Technology,  
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2011-2017 Postdoc, Fred Hutchinson Cancer Research Center, Seattle, USA

2009-2011 Visiting Scholar, Hong Kong University of Science and Technology,  
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