# Resume of Jianglan Yuan

### **Basic Information**



School:	School of Life and Health Sciences
Gender:	Female
Date of Birth:	197012
Title:	Professor
Education:	Doctor of Science
Tutor:	Master/Doctoral degree
Research	Comprehensive utilization of protein
interests:	resources; Molecular nutrition; Food
	fermentation
E-mail:	jlyuan1229@163.com

### Academic Background

From July 1998 to present, Professor in Hubei University of Technology;

From September 2003 to July 2007, Wuhan University, PhD in Biochemistry and Molecular biology;

From September 1995 to July 1998, Northwest Agriculture and Forestry University, Master's degree in Food Science and Engineering.

#### **Representative Projects**

1. National Natural Science Foundation of China, Study on molecular mechanism of high-heat induced glutenin aggregation and *Aspergillus* combined deaggregation, Project leader.

2. National Natural Science Foundation of China, Study on mechanism of Lipase selective synthesis of dihydromyricetin esterification by *Aspergillus Niger* HGD0823.

3, National Natural Science Foundation of China, Screening of the peptides promoting  $\alpha$ -synclein correctly folded.

4. National Natural Science Foundation of China, Study on catalytic mechanism and molecular Evolution of Nattokinase.

5. Enterprise project, molecular nutrition application research of *Sanghuangporus spp*, project leader.

6. Enterprise project, processing function and application research of livestock and poultry blood protein, project leader.

7. Enterprise project, research on key processing technology of *Polygonatum*, project leader.

8. Provincial Department of Education, Research on co-production separation technology of high value-added protein components in egg yolk, project leader.

9. Doctoral initiation project, rice residue protein modification and application research, project leader.

10. Enterprise project, development and industrialization of high-quality rice soy sauce, project leader.

## **Representative Articles:**

1、 Xiaocui Liu, **Jianglan Yuan\***, Rui Chen, Jinying Lv, Zhuanzhuan Ma, Xu Kang. (2024). Chitooligosaccharide assisted in the construction of pickering high internal phase emulsion near the isoelectric point of porcine plasma protein. *LWT - Food Science and Technology*, 198, 116032. https://doi.org/10.1016/j.lwt.2024.116032

2、 Haoting Shi, Changsheng Ding, **Jianglan Yuan**\*. (2023). Effect and Mechanism of Soluble Starch on Bovine Serum Albumin Cold-Set Gel Induced by Microbial Transglutaminase: A Significantly Improved Carrier for Active Substances. *Foods*, 12, 4313. https://doi.org/10.3390/foods12234313

3、 **Jianglan Yuan**\*, Ping Yan, Xiaocui Liu, Xu Kang, Yongguo Jin, Long Sheng, Jianxin Xia. (2023). Enhancing solid-like characteristics of porcine plasma proteincarrageenan-based high internal phase emulsion: As solid fat alternative of loading curcumin. *Food Hydrocolloids*, 139, 108528. https://doi.org/10.1016/j.foodhyd.2023.108528

4. Haiyan Yao<sup>1</sup>, **Jianglan Yuan<sup>1,\*</sup>**, Rui Chen, Xu Kang, Yuchen Duan, Congxin Lei. (2023). Differential analysis and bioactivity identification of *Neurospora crassa* metabolites based on okara by widely-targeted metabolomics. *LWT-Food Science and Technology*, 174, 114441. https://doi.org/10.1016/j.lwt.2023.114441

5、 Chao Fan<sup>1</sup>, **Jiang-lan Yuan**<sup>1,\*</sup>, Jing Guo, Xu Kang. (2022). Soy protein isolate (SPI)-hemin complex nanoparticles as a novel water-soluble iron -fortifier: Fabrication, formation mechanism and in vitro bioavailability. *Food Bioscience*, 49, 101889. 10.1016/j.fbio.2022.101889

6、 Ping Yan<sup>1</sup>, **Jiang-lan Yuan<sup>1,\*</sup>**, Xu Kang, Jin-ying Lv, Xiao-cui Liu. (2022) Characteristics, formation mechanism and stability of high internal phase emulsions stabilized by porcine plasma protein (PPP) / carrageenan (CG) hybrid particles. *Food Bioscience*, 47, 101751. https://doi.org/10.1016/j.fbio.2022.101751

7、 **Jiang-lan Yuan**, Chang-sheng Ding, Cheng-liang Li, Yu Zhang, Xu Kang. (2022). Protective, controlled-release and embedding mechanism of porcine plasma protein cold-set gel on quercetin: An effective carrier of hydrophobic compounds. *Food Bioscience*, 47, 101672. <u>https://doi.org/10.1016/j.fbio.2022.101672</u>

8、Xu Kang, Meihu Ma<sup>\*</sup>, **Jianglan Yuan**<sup>\*</sup>, Yaming Huang. (2022). Characteristics and Mechanism of Crayfish Myofibril Protein Gel Deterioration Induced by Autoclaving. *Foods*, 11(7), 929; <u>https://doi.org/10.3390/foods11070929 - 23</u>

9. Rui-xia Li<sup>1</sup>, **Jiang-lan Yuan**<sup>1,\*</sup>, Chang-sheng Ding, Xu Kang. (2021). Bovine serum albumin cold-set emulsion gel mediated by transglutaminase / glucono- $\delta$ -lactone coupling precursors: Fabrication, characteristics and embedding efficiency of hydrophobic bioactive components. *LWT-Food Science and Technology*, 153, Article 112550. https://doi.org/10.1016/j.lwt.2021.112550

10. Yu Zhang<sup>1</sup>, **Jiang-lan Yuan<sup>1</sup>**, \*, Chao Fan, Ping Yan, Xu Kang. (2021). Fabrication and characteristics of porcine plasma protein cold-set gel: Influence of the aggregates produced by glucono- $\delta$ -lactone acidification on microbial transglutaminase catalysis. *Food Hydrocolloids*, *115*, Article 106597. https://doi.org/10.1016/j.foodhyd.2021.106597

11. Xiao-min Chen<sup>1</sup>, **Jiang-lan Yuan<sup>1</sup>**, \*, Rui-xia Li, Xu Kang. (2019). Characterization and embedding potential of bovine serum albumin cold-set gel induced by glucono- $\delta$ -lactone and sodium chloride. *Food Hydrocolloids*, 95, 273-282. https://doi.org/10.1016/j.foodhyd.2019.04.050