BIOGRAPHICAL SKETCH

NAME in English **Wei-Chao Liao** NAME in Chinese **廖威超**	POSITION TITLE Assistant Professor, Molecular Medicine Research Center

EDUCATION/TRAINING

INSTITUTION AND LOCATION	DEGREE *(if applicable)*	MM/YY	FIELD OF STUDY
Institute of Medical and Molecular Toxicology, Chung Shan Medical University	M.S.	06/2003	Virology, Molecular Biology
Institute of Biotechnology in Medicine, National Yang-Ming University	Ph.D.	06/2011	Biotechnology, Bioinformatics
Molecular Medicine Research Center, Chang Gung University	Postdoctoral	08/2014	Biotechnology, Bioinformatics

A. Positions and Honors

Positions and Employment

2019/08 - Present Assistant Professor, Molecular Medicine Research Center, Chang Gung University, Taiwan.

2019/02 - Present Project Manager for CGU Technology and Bioinformatics Research Service Platforms, Molecular Medicine Research Center, Chang Gung University, Taiwan.

2017/02 - 2019/07 Assistant Professor, Center for General Education, Chang Gung University, Taiwan.

2018/08 - 2019/07 Project Manager for Center for International Academic Cooperation, Chang Gung University, Taiwan.

2016/08 - 2018/07 Project Manager for Office of Research and Development, Chang Gung University, Taiwan.

2014/08 - 2017/01 Assistant Research Fellow, Molecular Medicine Research Center, Chang Gung University, Taiwan.

2013/05 - 2018/12 Project Manager for Biosignature Project, Chang Gung Biosignature Center and Molecular Medicine Research Center, Chang Gung University, Taiwan.

Honors

1. The International Genetically Engineered Machine (iGEM) Competition, 2007 (Massachusetts Institute of Technology, MIT). Gold Medal Team of NYMU, Taipei. Project Title: A Synthetic Biology Approach for Designing and Engineering BioRobot Systems with Embedded Insulin Auto

Feedback and Control Mechanisms.

2. The International Genetically Engineered Machine (iGEM) Competition, 2008 (MIT). The team from NYMU-Taipei. Project Title: BacToKidney Project.

3. The International Genetically Engineered Machine (iGEM) Competition, 2009 (MIT). The team from NYMU-Taipei, one of six finalists. Project Title: ViroCatcher Project.

B. Selected Peer-reviewed Publications

1. Po-Hao Chou, **Wei-Chao Liao**, Kuo-Wang Tsai, Ku-Chung Chen, Jau-Song Yu & Ting-Wen Chen. TACCO, a Database Connecting Transcriptome Alterations, Pathway Alterations and Clinical Outcomes in Cancers. Scientific Reports. 2019; volume 9, Article number: 3877. (SCI)(IF:4.011) MULTIDISCIPLINARY SCIENCES: 15/69
2. Rae-Mann Hsu, Cai-Yan Zhong, Chih-Liang Wang, **Wei-Chao Liao**, Chi Yang, Shih-Yu Lin, Jia-Wei Lin, Hsiao-Yun Cheng, Po-Yu Li & Chia-Jung Yu. Golgi tethering factor golgin-97 suppresses breast cancer cell invasiveness by modulating NF-κB activity. Cell Communication and Signaling. 2018; volume 16, Article number: 19. (SCI)(IF:5.111) CELL BIOLOGY: 50/193
3. TW Chen, CC Lee, Hsuan Liu, CS Wu, CR Pickering, PJ Huang, J Wang, Ian YF Chan, YM Yeh, CD Chen, HP Li, JD Luo, Bertrand CM Tan, Timothy EH Chan, C Hsueh, L Julie Chu, YT Chen, B Zhang, CY Yang, CC Wu, CW Hsu, LC See, P Tang, JS Yu, **WC Liao**, Kenny WF Chiang, H Rodriguez, Jeffrey N. Myers, KP Chang, YS Chang. Integrated omics analyses identify APOBEC3A as an oral cancer prognostic biomarker in carriers of an APOBEC deletion polymorphism. Nature Communications. 2017; 8: 465. (SCI)(IF:12.124) MULTIDISCIPLINARY SCIENCES: 3/64
4. Chen TW, Gan RC, Fang YK, Chien KY, **Liao WC**, Chen CC, Wu TH, Chang YF, Yang C, Huang PJ, Yeh YM, Chiu CH, TW Huang and Tang Petrus. FunctionAnnotator, a versatile and efficient web tool for non-model organism annotation. Scientific Reports. 2017 Sep 5;7(1):10430. (SCI)(IF:4.259) MULTIDISCIPLINARY SCIENCES: 10/64
5. Chang-Ching Yang, Yi-Tung Chen, Yu-Ping Kuo, Hsuan Liu, Chieh-Tien Shih, **Wei-Chao Liao**, Yi-Feng Chang, Bertrand Chin-Ming Tan. ADAR1-mediated 3' UTR editing and expression control of anti-apoptosis genes fine-tunes cellular apoptosis response. Cell Death Dis. 2017 May 25;8(5): e2833. (SCI)(IF:5.965) CELL BIOLOGY: 39/190
6. Jau-Song Yu, Yi-Ting Chen, Wei-Fang Chiang, Yung-Chin Hsiao, Lichieh Julie Chu, Lai-Chu See, Chi-Seng Wu, Hui-Tzu Tu, Hsiao-Wei Chen, Chia-Chun Chen, **Wei-Chao Liao**, Ya-Ting Chang, Chih-Ching Wu, Che-Yi Lin, Shyun-Yeu Liu, Shu-Ti Chiou, Shu-Li Cha, Kai-Ping Chang, Chih-Yen Chien, Su Wei Chang, Chee-Jen Chang, John D. Young, Chia C Pao, Yu-Sun Chang, Leland H. Hartwell, Saliva Protein Biomarkers to Detect Oral Squamous Cell Carcinoma in a High-Risk Population in Taiwan. Proc Natl Acad Sci USA. 2016 Sep 23. (SCI)(IF:9.661) MULTIDISCIPLINARY SCIENCES: 4/64
7. Ting-Wen Chen, Ruei-Chi Gan, Yi-Feng Chang, **Wei-Chao Liao**, Timothy H. Wu, Chi-Ching Lee, Po-Jung Huang, Cheng-Yang Lee, Yi-Ywan M. Chen, Cheng-Hsun Chiu and Petrus Tang, Is the whole greater than the sum of its parts? De novo assembly strategies for bacterial genomes based on paired-end sequencing. BMC Genomics, 2015, 16:648. (SCI)(IF:3.867) BIOTECHNOLOGY & APPLIED MICROBIOLOGY: 32/161
8. **Wei-Chao Liao**, Wailap Victor Ng, I-Hsuan Lin, Wan-Jr Syu, Tze-Tze Liu, and Chuan-Hsiung Chang, T4-Like Genome Organization of the *Escherichia coli* O157:H7 Lytic Phage AR1. Journal of Virology, July 2011, p. 6567–6578. (SCI)(IF:5.402) VIROLOGY: 6/32
9. Chih-Hsien Yang, De-Ming Lin, Li-Hsiang Yen, **Wei-Chao Liao**, Shiau-Yi Wen and Chuan-Hsiung Chang, Designer Biosystem with Regulated Insulin Expression and Glucose Auto-Sensing for

Diabetes. International Journal of Systems and Synthetic Biology, 1(1) June 2010, pp. 143-153.

10. Shih-Feng Lan, Chung-Ho Huang, Chuan-Hsiung Chang, **Wei-Chao Liao**, I-Hsuan Lin, Wan-Neng Jian, Yueh-Gin Wu, Shau-Yan Chen, and Hin-chung Wong, Characterization of a New Plasmid-Like Prophage in a Pandemic *Vibrio parahaemolyticus* O3:K6 Strain. Applied and Environmental Microbiology, May 2009, 75(9):2659–67. (SCI)(IF:3.686) BIOTECHNOLOGY & APPLIED MICROBIOLOGY: 29/152.
11. 廖威超、張傳雄. 生物安全防禦與倫理. 科學月刊, (2009) 472(4): 298-301.

C. Research Support

Ongoing Research Support

1. MOST 108-2320-B-182-009-, 探討腸道病毒感染對宿主微小RNA的調節. 2019/08/01~2020/07/31.
   Role: PI

2. 108-2320-B-182-007-MY3, 高基氏體繫鏈因子golgin-97調節訊息傳導與抑制癌細胞侵犯能力的非典型功能探討. 2019/08/01~2022/07/31.
   Role: Co-PI

3. CLRPD1J0011, Chang-Gung Memorial Hospital. 2019/02/01-2020/01/31.
   Multi-Omics Technology and Bioinformatics Research Service Platforms.
   Role: Co-PI and Project Manager

Completed Research Support (2006-2010)

1. CIRPD3B0012, Chang-Gung Memorial Hospital. 2014/10/01-2016/11/30.
   Biosignatures-Technology and Bioinformatics Platform.
   Role: Co-PI and Project Manager

4. CIRPD3B0013, Chang-Gung Memorial Hospital. 2016/12/01-2018/11/30.
   Biosignatures-Technology and Bioinformatics Platform.
   Role: Co-PI and Project Manager