# Mark K. Wang (王凯章)

#### **EDUCATION**

The University of Texas at Austin

Austin, TX

Doctor of Philosophy | Civil Engineering

Expected May 2025

Master of Science | Environmental and Water Resources Engineering

May 2022

• Thesis: Near Real-Time Coastal Flood Mapping

Columbia University

New York, NY

Bachelor of Science | Civil Engineering | Water Resources Concentration

May 2016

Franklin & Marshall College

Lancaster, PA

Bachelor of Arts | Cognitive Science | Music Minor

May 2016

## EXPERIENCE

#### Water Utility, City of Austin

Austin, TX

Systems Planning Engineering Intern

Mar 2020 - Sep 2020

- Developed python scripts for automatic storm event and sewer peak flow analysis
- Maintained GIS databases for long-range water infrastructure planning

## Fulbright Program, U.S. Department of State

Zhuhai & Shenzhen, China

 $June\ 2019-Feb\ 2020$ 

- Studied low-impact development and green infrastructure in the Pearl River Delta
- Investigated urban stormwater management techniques and their underlying policy in China

## Mease Engineering, P.C.

Quakertown, PA

Civil Engineer

Research Grantee

Oct 2017 – June 2019

- Performed hydrologic site analyses under pre- and post-development conditions
- Designed stormwater infiltration and attenuation systems for water quality and flow rate control
- Completed floodplain analyses, reports, and supporting calculations

#### NYC Department of Environmental Protection

New York, NY

Assistant Civil Engineer

June 2016 - Oct 2017

- Managed green stormwater infrastructure projects in public parks and streets
- Developed and reviewed construction drawings and contract specifications
- Coordinated with government agencies and engineering consultants

#### Publications & Presentations

- 1. Wang, Mark, & Passalacqua, P. (2022). Near real-time coastal flood mapping. *Planet Texas 2050 Research Symposium*.
- 2. Shetty, N. H., Hu, R., Mailloux, B. J., Hsueh, D. Y., McGillis, W. R., Wang, Mark, Chandran, K., & Culligan, P. J. (2019). Studying the effect of bioswales on nutrient pollution in urban combined sewer systems. *Science of The Total Environment*, 665, 944–958
- 3. Shetty, N. H., & Wang, Mark. (2018). Performance of a "next generation" green roof with irrigation and smart detention. 2018 EWRI International Low Impact Development Conference, Abstract 437268.

National Science Foundation	
• Graduate Research Fellowship   \$102,000	2020-Present
The University of Texas at Austin	
• John E. Kasch Endowed Graduate Fellowship in Engineering	2020-Present
• Dean's Prestigious Fellowship Supplement	2020-Present
Fulbright Program, U.S. Department of State	
• Study/Research Award   \$23,300	2019 - 2020
• Critical Language Enhancement Award   \$16,740	2019
Franklin & Marshall College	
• Magna cum laude   Phi Beta Kappa	2016
• G. Kenneth Kohlmaier Family Scholarship	2011 - 2014
• C. Richard Plank Scholarship	2011 - 2014

## SKILLS & MISCELLANEOUS

## Computational

# Languages

- English (native speaker)
- Mandarin Chinese (professional working proficiency)

## Licenses

• Engineer-in-Training (Pennsylvania License No. ET023499)

# Completed Courses Courses

- Machine Learning with Python [link to credential]
- Computer Vision and Image Processing Essentials [link to credential]
- $\bullet\,$  Deep Learning Essentials with Keras [link to credential]