

## Wei Guo

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CONTACT INFORMATION	175 Yellowstone Drive apt 302 Charlottesville, VA 22903	434-327-0610 wg8we@virginia.edu
RESEARCH INTERESTS	Reinforcement Learning, Deep Learning, Machine Learning	
EDUCATION	<b>University of Virginia</b> , Charlottesville, VA	
	M.E., Computer Engineering, GPA: 3.69	Dec. 2018
	<ul style="list-style-type: none"><li>• Core Lessons: Machine Learning, Reinforcement Learning, Cloud Computing, Algorithm, Data Mining</li><li>• Advisors: Joanne Bechta Dugan, Ph.D</li></ul>	
	<b>East China Normal University</b> , Shanghai, China	
	B.S., Statistics, GPA: 3.26	Jun. 2016
	<ul style="list-style-type: none"><li>• Core Lessons: Multivariate Statistics, Regression Analysis, Time Series, Mathematical Statistics, Probability Theory</li><li>• Thesis: <i>Analysis on the Satisfaction of Farmers to the Construction of High Standard Farmland in 12th Five-year: Case of a Town in Shanghai City</i></li></ul>	
RESEARCH EXPERIENCE	<b>Identification of Calories from Food Pictures</b>	Jun. 2018 to Aug. 2018
	<ul style="list-style-type: none"><li>• Detect and record features of food using HOG and LBP.</li><li>• Build classification models with SVM and CNN.</li></ul>	
	<b>English Poetry Generator with RNN</b>	Jun. 2018 to Aug. 2018
	<ul style="list-style-type: none"><li>• Preprocess the document to fit in the unsupervised generator model.</li><li>• Build RNN model for predicting the next sentence.</li></ul>	
	<b>Facial Expression Recognition</b>	May 2018 to Jul. 2018
	<ul style="list-style-type: none"><li>• Build ANN and CNN model with different sizes and compare the performance.</li><li>• Optimize the models with the methods of RMSProp and Dropout.</li></ul>	
	<b>Simulation of Process of Thermal Spray Operations</b>	Feb. 2018 to Jun. 2018
	<ul style="list-style-type: none"><li>• Simulate the process of thermal spray operations with Deep Q Network.</li><li>• Build Temporal Difference model for prediction and Q learning for control.</li></ul>	
	<b>Recommendation System on AWS</b>	Sep. 2017 to May 2018
	<ul style="list-style-type: none"><li>• Build recommendation system based on Collaborative Filtering and Neural Network.</li><li>• Build up the website with JavaScript and deploy the website to AWS.</li></ul>	
	<b>Fraud Detection with Supervised Learning Method</b>	Sep. 2017 to Dec. 2017
	<ul style="list-style-type: none"><li>• Perform feature selection on the data set to reduce the number of attributes used.</li><li>• Train and test the model with Decision Tree, k-Nearest Neighbor, Random Forest and Adaboost.</li></ul>	
PUBLICATION	1. Wei Guo “Analysis on the Satisfaction of Farmers to the Construction of High Standard Farmland in 12th Five-year: Case of a Town in Shanghai City”, <i>Journal of Agrotechnical Economics</i> :39–45, 2016.	
AWARDS	<ul style="list-style-type: none"><li>• Outstanding Undergraduate Graduate Thesis May 2016</li><li>• Outstanding winner for 17th East China Cup College Students Mathematical Modeling Contest Apr. 2015</li><li>• Scholarship for Academic Excellence Sep. 2015</li></ul>	