

Xiao Ling
Ph.D. Candidate in Systems modeling
Virginia Commonwealth University

Website: maovurin.github.io
Email: lingx@vcu.edu
Phone: (347)-841-6580

EDUCATION

- **Virginia Commonwealth University** Virginia, USA
Doctor of Philosophy in Systems Modeling and Analysis Aug 2017 - Exp. May 2021
- **The University of Toledo** Ohio, USA
Master of Science in Statistics Aug 2015 - Jun 2017
- **Saginaw Valley State University** Michigan, USA
Master of Business Administration Aug 2009 - Jun 2011
- **University of Shanghai for Science and Technology** Shanghai, China
Bachelor of Engineering in Power Engineering and Engineering Thermal physics Aug 1998 - Jun 2003

RESEARCH INTERESTS

My main research interest is theory and algorithm for optimization for subspace estimation and its application in computer vision.

SKILLS SUMMARY

- Experienced in designing, implementing, testing, and deploying algorithm to handle big data in distributed platform.
- Strong background in computer vision, machine learning, statistical analysis.
- Strong system builder, excellent presenter, and team player.
- Independent, creative, and rigorous thinker.

PROGRAMMING SKILLS

- **Languages:** R, Scala, Spark, SAS, Python, VBA, C

EXPERIENCE

- **Virginia Commonwealth University** Virginia, USA
Graduate Teaching Assistant July 2017 - Present
 - Teaching an undergraduate level math course including concepts and applications of linear, exponential, logarithmic, power and quadratic functions, graphing, transformations and inverses of functions, algebra and composition of functions.
- **The University of Toledo** Ohio, USA
Teaching Assistant Jan 2016 - Jun 2017
 - Taught Business Calculus Recitation section. Implemented stimulating examples to capture students' attention and interest. Created and administered regular quizzes and tests to tract student progress.
 - Offered after-school tutoring to help struggling students improve their skills and critical thinking.
 - Conducted PCA, CCA, Regression Statistical analysis on real projects.
- **General Electric Healthcare** Shanghai, China
Demand Planning Analyst Sep 2012 - Aug 2015
 - Conducted and tuned critical parameters for multiple regression model in SAP APO system.
 - Tuning Monthly Global demand forecast with a cross-functional global team including meeting, training personnel and collecting data.
 - Developed AD-Hoc Dynamic applications based on Excel and Access for global teams. Significantly saved reporting time and reduced process errors.
 - Developed an Visual Basic API to automate demand dataset reconciliation and regression forecast output.
 - Configured APO Data Mart with Key Figures, Characteristics, Data Sources, and Info Cubes to store historical sales invoice data which is gathered from R/3 and non-R/3 systems.
 - Training junior team member.

- **Freelancer** New York, US
Data Analyst and VBA Programmer *Jun 2011 - Aug 2012*
 - Developed a Data processing application with VBA.
 - Conducted various statistical model using R and VBA.
- **Shanghai Shi-Cheng Electronics Technology Company** Shanghai, China
Analyst and Consultant *Sep 2003 - Aug 2009*
 - Reconciled data from multiple sources into Excel or Access using advanced Excel functions to generate spreadsheets and pivot tables.
 - Optimized data collection procedures and generated reports on a weekly, monthly and quarterly basis.
 - Utilized SPSS statistical software to track and analyze data.
 - Developed and initiated more efficient data collection procedures using VBA.

ONGOING PROJECTS

- **Image denoising via patch based L1-PCA** A novel image denoising framework that produces a one-dimensional dictionary based on the L_1 -norm.
- **Kernel L_1 -PCA** Developing a kernel version of L_1 -norm PCA

PUBLICATIONS

- Xiao Ling, Paul Brooks, **L_1 -norm regularized L_1 -norm best-fit line problem**
 The 15th INFORMS Virtual Workshop on Data Mining and Decision Analytics
 Implemented in Spark using Scala: github.com/maovurin/Sparse-L1

PROFESSIONAL SOCIETIES

- **Memberships:** Institute for Operations Research and Management Science (INFORMS) Quality, Statistics & Reliability Section and Optimization Society Subdivision.