# Yujuan Gao

(352) 283-1856 | gyj0508@stanford.edu | 616 Jane Stanford Way, Stanford, CA
 ✓ yujuangao.github.io | github.com/yujuangao | in linkedin.com/in/yujuan-gao

# **Professional Summary**

Ph.D. candidate specializing in **product analytics**, **causal inference**, **and A/B experimentation** for large-scale user behavior data. Experienced applying econometric methods and advanced analytics (**SQL**, **Python**, **R**) to quantify impact, optimize product features, and drive data-informed strategy. Expertise includes analyzing **Meta's Social Connectedness Index (SCI)** to model peer effect on health behaviros.

# **Technical Skills**

Programming: Python (Pandas, NumPy), R, SQL, LATEX, GitHub, TensorFlow, PyTorch, scikit-learn

Methods: Randomized Control Trial (RCT), A/B Experiments, Causal Inference (Event Study, Matching), Network Analysis, NLP, Geospatial Analysis

Tools: ArcGIS, Survey Solutions, Qualtrics, LENA Technology

### Education

University of Florida, Gainesville, FL Ph.D., Applied Economics, Food and Resource Economics Department Graduate School Fellowship (Merit-based, 2021–2025)	Aug 2021 – May 2026
Stanford Center on China's Economy and Institutions, Palo Alto, CA Visiting Graduate Research Fellow	Aug 2018 – Aug 2019
Shaanxi Normal University, China M.A., Economics	Aug 2016 – Dec 2019
Shanxi University of Finance and Economics, China  B.S. Statistics	Sep 2012 – Jul 2016

# Research Projects & Analytics Experience

### Stanford University, Stanford, CA

Jul 2025 - Present

Research Scientist, Freeman Spogli Institute for International Studies

• Job Market Trend Analysis (NLP): Directed research applying NLP algorithms to analyze 500M job posting records from recruitment websites and apps, quantifying AI exposure effects on regional employment demand and skill shifts.

### University of Florida, Gainesville, FL

Aug 2021 – Present

Lead Researcher, Food and Resource Economics Department

### Social Network User Behavior Analysis (Leveraging Meta Data)

- Processed and analyzed large-scale **Meta Social Connectedness Index (SCI)** with Demographic and Health Surveys (DHS) outcomes to quantify how social ties mediate knowledge diffusion and health behaviors.
- Implemented edge-based linear models with country fixed effects on 2,000+ regional connections to identify peer influence mechanisms.

### Educational Software Efficacy and Network Spillover Analysis [Link]

- Designed and executed a large-scale cluster-Randomized Controlled Trial (RCT) across 130 schools (11,000 users) to benchmark the efficacy of Game-Based Learning software against traditional resources.
- Quantified **network spillover effects** to measure ecosystem impact, demonstrating that the **digital product eliminated negative peer** externalities on non-targeted users.

# Digital Health Intervention Impact Evaluation (Leverage Wechat Plateform) [Link]

- Directed a RCT with 1,096 mothers, utilizing **WeChat** to deliver targeted text messages and evaluate mobile health intervention effectiveness.
- Collected information feedback via phone interviews to track user engagement and analyzed how digital content influenced user behaviors.
- Achieved statistically significant improvement of 0.22 standard deviations in parenting knowledge through targeted information interventions.

# Digital Information and Demographic Trend Analysis (Leverage Good Trend Data) [Link]

- Integrated geospatial 3G coverage with 80,000 Demographic and Health Surveys (DHS) household records and Google Trends to measure how internet access shifts information-seeking and demographic behavior.
- Used staggered DiD and hazard models to estimate long-run behavior changes, identifying 11–16% reductions in early fertility.

# Behavioral Economics Consumer Choice Study [Link] (Published in Food Policy)

- Designed randomized A/B experiment testing a UI framing element (color-coded labels) on consumer decisions.
- Reduced decision time by 18% and increased healthy selection by 10 pp.

# Child Development and Urbanization Study [Link] (Published in Child Development)

- Deployed LENA audio technology to process home language environments and estimate urbanization impacts on early childhood development.
- Published findings linking peri-urban transition to reduced adult word counts and conversational turns.

### Save the Children, China

Jul 2020 - Jan 2021

Consultant, Early Childhood Development Project

- Designed impact evaluation for a Randomized Controlled Trial (RCT) and deployed Survey Solutions to collect data, significantly improving data quality and reducing field time.
- Drafted comprehensive policy reports and presented data-driven findings to different stakeholders, translating statistical insights into actionable recommendations.

### Teaching & Leadership Experience

### University of Florida, Gainesville, FL

Aug 2021 – Present

Teaching Fellow & Instructional Team Lead

- Led instructional support for **6 undergraduate/graduate courses** (358 students total); facilitated recitations and mentored research.
- $\bullet$  Average teaching evaluation 4.6/5.0, reflecting strong organization and clarity.

### Shaanxi Normal University, China

2016 - 2019

International Field Research Team Leader

- Managed 15+ enumerators across multi-site field studies; enforced quality control for 13,000+ participants.
- Coordinated stakeholders including schools, hospitals, and local governments.

### Selected Presentations & Honors

Conferences: NABE Tech Economics Conference (Seattle, 2025), Allied Social Science Associations (2025, 2026), International Association for Applied Econometrics (Italy, 2025), Advances in Field Experiments (2025), Association for Public Policy Analysis and Management (2024), Harvard NEUDC (2023)

Awards: J.R. Greenman Scholarship (2022, 2024), Best Paper Award – Agricultural and Applied Economics Association (2020)