Duong Trinh

CONTACT INFORMATION	Adam Smith Business School, University of Glasgow Office 101, 12 Southpark Terrace Glasgow, G12 8LG, United Kingdom	✉ Duong.Trinh@glasgow.ac.uk 📞 (+44) 7512 022 723 🌐 duongtrinhss.github.io

RESEARCH INTERESTS

Bayesian Microeconometrics; Applied Econometrics; Applied Microeconomics
Causal Inference; Machine Learning; High-dimensional Models; Spatial & Network Models

EDUCATION

University of Glasgow, Glasgow, UK
Ph.D. in Economics   2021 – 2025 (expected)
· Advisors: Professor Dimitris Korobilis, Dr. Kenichi Shimizu, Dr. Santiago Montoya-Blandón.
· Thesis title: *Three Essays in Bayesian Microeconometrics: Embracing Causality and Heterogeneity.*

University of Glasgow, Glasgow, UK
M.Res. in Economics (Distinction)   2019 – 2021

Foreign Trade University, Hanoi, Vietnam
B.A. in International Business Economics (Excellent)   2014 – 2018

REFERENCES

Professor **Dimitris Korobilis**, Ph.D.
Adam Smith Business School, University of Glasgow
Dimitris Korobilis@glasgow.ac.uk

Dr. **Santiago Montoya-Blandón**
Adam Smith Business School, University of Glasgow
santiago.montoya-blandon@glasgow.ac.uk

Dr. **Kenichi Shimizu**
Department of Economics, University of Alberta
Kenichi.Shimizu@ualberta.ca

WORKING PAPERS

Causal Inference on Quantiles in High Dimensions: A Bayesian Approach, *Job Market Paper*
Abstract: This paper proposes a novel approach, Bayesian Analog of Doubly Robust (BADR) estimation, to estimate unconditional Quantile Treatment Effects (QTEs) in observational studies. By augmenting the proposed estimator with shrinkage priors, this framework can account for high-dimensional covariates and feature a flexible Bayesian modeling strategy with favorable frequentist properties in finite samples, even when either the treatment assignment or outcome models are misspecified. The proposed approach offers a straightforward and adaptable implementation for incorporating probabilistic machine learning techniques to fit the propensity score and conditional cumulative distribution function, followed by combining posterior draws. This enables the effective handling of high-dimensional covariate spaces or nonlinear relationships to achieve better accuracy and appropriate uncertainty quantification. The simulation results show that BADR estimators yield a substantial improvement in bias reduction for QTE estimates compared with popular alternative estimators found in the literature. We revisit the role of microcredit expansion and loan access on Moroccan household outcomes, demonstrating how the new method adds value in characterizing heterogeneous distributional impacts on outcomes and detecting changes in overall economic inequality, which is also appealing to other applied contexts.

Bayesian Causal Inference in the Presence of Endogenous Selection into Treatment and Spillovers. (2024)

A Comparative Review of Bayesian Shrinkage and Variable Selection in Econometrics.
(with Dimitris Korobilis, Kenichi Shimizu) (2022)

Inference on Treatment Effects with High-dimensional Controls: Frequentist and Bayesian Approaches. (2021)

Goverment Disclosure in the Pandemic. (2020)

Early Career Gender Wage Gap: First Evidence in Vietnam.
(with Anh Nguyen Ngoc, Hai Doan Ma, Thuc Hoang Kim) (2018)

WORK
IN PROGRESS

Selection-corrected SAR Mixture Model.
(with Santiago Montoya-Blandón).

PUBLISHED
PAPERS

Firm Export and the Impact of Foreign Ownership in Vietnam: A Micro-data Analysis.
(with Vinh Nguyen Thi Thuy), *Journal of Economic Development* (2020), 45(1).

The Impact of Exchange Rate Volatility on Exports in Vietnam: A Bounds Testing Approach.
(with Vinh Nguyen Thi Thuy), *Journal of Risk and Financial Management* (2019), 12(1).

TEACHING
EXPERIENCE

University of Glasgow, Glasgow, UK

Graduate Teaching Assistant   Sep 2020 – present

· Bayesian Data Analysis (Graduate) | Spring 2025
· Basic Econometrics (Graduate) | Fall 2023, 2024
· Econometrics 2 (Undergraduate) | Spring 2024
· Econometrics 1 (Undergraduate) | Fall 2020, 2021
· Introductory Statistics for Economists (Undergraduate) | Spring 2022, 2024

RESEARCH
EXPERIENCE

The Development and Policies Research Center, Hanoi, Vietnam
Research Intern, Research Assistant   2017 - 2018

Institute of Economics and International Trade, Hanoi, Vietnam
Research Intern   2016

CONFERENCE
PRESENTATIONS

Annual Conference of International Association for Applied Econometrics (IAAE),
Thessaloniki, Greece   2024

5th Panmure House Annual PhD Workshop, Edinburgh, UK   2022

12th Vietnam Economists Annual Meeting (VEAM), Dalat, Vietnam   2019

11th Vietnam Economists Annual Meeting (VEAM), Hanoi, Vietnam   2018

13th Asia Pacific Trade Seminars (APTS), Hanoi, Vietnam   2017

Others: Volunteer at RES and SES Annual Conference 2023, Glasgow, UK;
        Participant at European Seminar on Bayesian Econometrics (ESOBE) 2023, Glasgow, UK.

SELECTED
SHORT COURSES

1st Oxford Economics Summer School on *Machine Learning* and *Treatment Effects*   Sep 2022

1st SGPE PhD Summer School on *Machine Learning for Economists*   Aug 2022

MITx Certification on *Introduction to Computer Science and Programming Using Python* Aug 2020

SCHOLARSHIPS &
AWARDS

Adam Smith Business School Scholarship (M.Res. & Ph.D.)   2019 – 2024

Foreign Trade University Academic Scholarships   2014 – 2018

Third Prize at the Undergraduate Olympiad of Econometrics and Applications   2017

SKILLS

Programming: R, MATLAB, Python, Stata, Cpp, Julia, LaTeX, Markdown, CSS, Git, Unix.

Languages: Vietnamese (native), English (fluent).