Barron Tsai

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Education

Ph.D. in Economics, Duke University — Aug 2020 – May 2026 (expected)
- Advisors: Rafael Dix-Carneiro, Daniel Yi Xu, Laura Castillo-Martinez, Federico Huneeus, Matthias Kehrig

MPhil in Economics, HKUST — Sep 2018 – Jun 2020

BBA in Global Business, Economics, HKUST — Sep 2014 – Jun 2018

Research Fields

Primary: Trade

Secondary: Industrial Organization, Macroeconomics

Working Papers

When Cutting Out the Middleman Backfires: Disintermediation, Wholesale Markups, and Misallocation
Job Market Paper

- Policy debates often start from the premise that wholesale markups simply inflate prices, making technologies or regulations that "cut out the middleman" appear unambiguously welfare-improving. This paper shows the trade-off is more nuanced. Wholesalers help firms avoid the fixed costs of forming direct buyer-supplier links, but when direct-trade technology improves, demand for intermediation falls; marginal wholesalers exit, survivors gain share, and markups rise — distorting relative input prices and misallocating resources — partially offsetting gains from disintermediation. I develop a production network model with endogenous intermediation, wholesaler entry/exit, and markups, and test its predictions using Turkish firm-to-firm transactions, exploiting the staggered rollout of fiber internet. Consistent with theory, provinces with faster fiber growth see less intermediated trade, fewer wholesalers, and higher wholesale markups. Calibrating the model to these elasticities, endogenous markup increases reduce welfare gains from fiber-induced disintermediation by 1.4 p.p. (≈30%), highlighting the need for complementary competition policy.

Work in Progress

Internal Trade Barrier and Spatial Misallocation

- I study how reductions in internal trade costs, driven by the rollout of fiber internet across Turkish provinces, reshape product-market competition and aggregate efficiency. First, I document a pro-competitive effect: provinces experiencing faster fiber rollout saw a relative decline in aggregate manufacturing markup, with markedly larger declines in sectors that are more tradable. Second, I develop a spatial extension of Atkeson–Burstein that embeds sectoral heterogeneity in tradability and internal migration. The model quantifies welfare changes that operate through two opposing forces. On the one hand, falling internal trade costs reduce aggregate markups and within-province markup dispersion. On the other hand, uneven infrastructure development can widen markup dispersion across provinces, misallocating workers toward low-markup provinces and dampening the aggregate gains. The net effect hinges on the initial spatial distribution of markups and on each province's comparative advantage in more versus less tradable sectors. These findings provide a rationale for place-based policy aimed at correcting spatial distortions due to product-market power. The potential for uneven infrastructure development to worsen aggregate efficiency provides a rationale for a more balanced approach to development within a country.

Optimal Tariffs with Granular Importers

- When a few large importers internalize terms-of-trade effects, the standard optimal-tariff motive shrinks. Unlike granular seller power (Gaubert and Itskhoki, 2021), granular buyer power can eliminate the rationale for tariffs. This creates a complementarity between antitrust and trade policy: reducing importer concentration raises the optimal tariff by weakening private internalization of the terms-of-trade effect.

Research and Work Experience

Ph.D. Graduate Assistant, Duke University — Durham, NC
Aug 2022 – May 2024

- Research Assistant to Prof. Laura Castillo-Martinez (Fall 2022 – Spring 2024)
- Research Assistant to Prof. Federico Huneeus (Fall 2023)

Part-time Research Assistant, HKUST — Hong Kong
Jun 2017 – Sep 2018

- Research Assistant to Prof. Edwin Lai

Research Intern, Chartwell Capital — Hong Kong
Jun 2017 – Aug 2017

Teaching Experience

Teaching Assistant, Duke University — Durham, NC
Sep 2021 – Present

- Macroeconomic Analysis I (PhD) ; Instructor: Prof. Craig Burnside, Prof. Cosmin Ilut; Fall 2021
- Macroeconomic Analysis II (PhD); Instructor: Prof. Andrea Lanteri, Prof. Kyle Jurado; Spring 2022
- Economics Principles (Head TA; UG); Instructor: Prof. Thomas Nechyba; Fall 2024, Fall 2025
- Intermediate Macroeconomics (UG); Instructor: Prof. Matthias Kehrig; Spring 2025

Teaching Assistant, HKUST — Hong Kong
Sep 2018 – Jun 2019

- Economic Development and Growth (UG); Instructor: Professor Sujata Visaria; Fall 2018
- Environmental Economics (PG); Instructor: Professor Yatang Lin; Spring 2019

Awards and Fellowships

- Summer Research Fellowship, Duke University
- Academic Achievement Medal, HKUST
- Academic Excellence Award, HKUST
- Fung Scholarship
- Arnhold & Co., Ltd. Scholarship
- University Admission Scholarship, HKUST

Skills

Programming: Julia, Matlab, Python, Stata, R, ArcGIS

Language: English (Fluent), Cantonese (Native), Mandarin (Fluent)

References

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