

Chinese Head Tax Project: Updates

Amy Kim

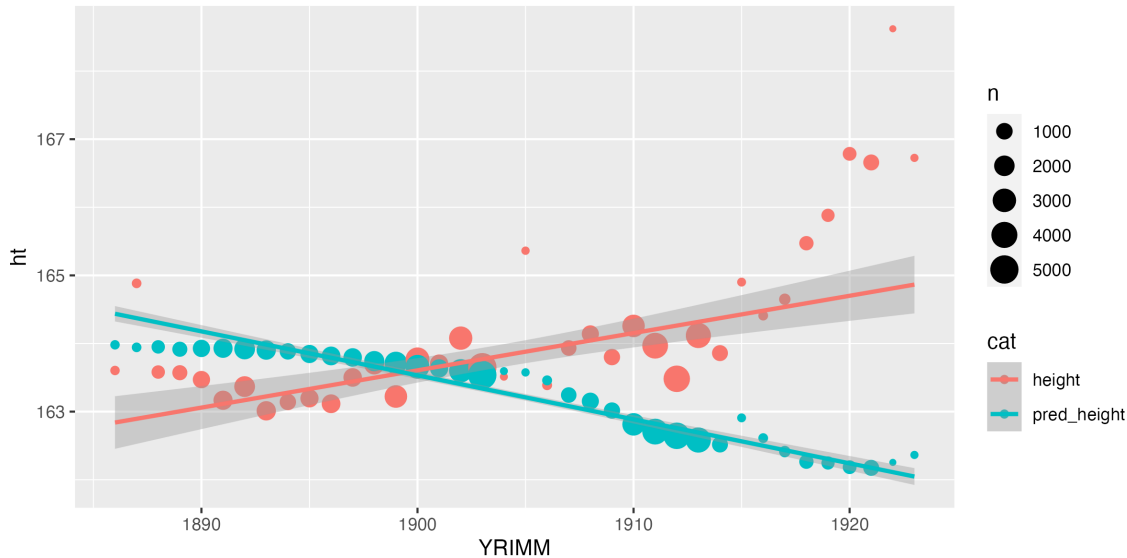
October 5, 2023

Selection on Height: Summary of Results

- **Sample:** Men¹ age 23-50 in Chinese Register arriving between 1885 and 1923 (sample is young, so this is approx. half of sample)
- **Results from Data:** Chinese immigrants get taller and younger over time
 - ▶ Height Plot
 - ▶ Age Plot
- **Results from Baten et al. 2010:** Decrease in height of birth cohorts from 1850-1890 (younger Chinese men are shorter) ▶ Figure from Paper
- **Implication:** increasingly positive selection on height (although precise link to head tax unclear) – can show this by plotting avg. height over time against avg. *predicted* height based on Baten et al. 2010 birth cohort estimates from AUS

¹Results for women: far smaller sample (<1k obs), no comparison group, but qualitatively see similar increase in height, no change in age (also more women immigrate later)

Annual Mean Height and Mean Predicted Height



Selection on Numeracy: Summary of Results

- Descriptive evidence of age heaping (tendency to report ages ending in 5 or 0)

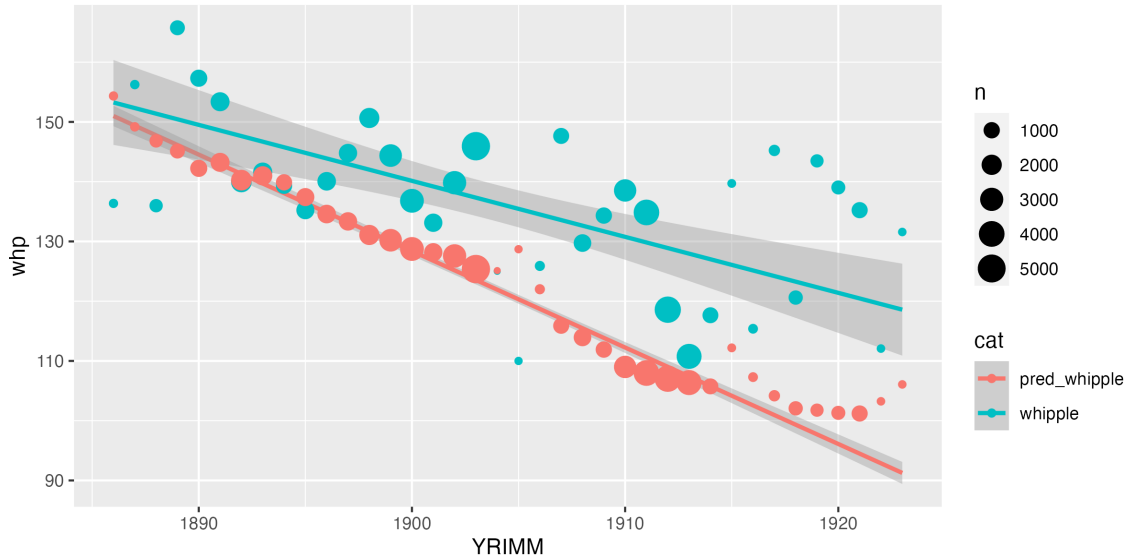
▶ Histogram: Register

▶ Histogram: Census (All Imm)

▶ Histogram: Census (Chinese Imm)

- **Key Metric:** $whipple = 500 \times \frac{\# \text{ ppl age 23-62 w/ age ending in 0 or 5}}{\text{total } \# \text{ ppl age 23-62}}$
- **Results from Data:** Increase in numeracy (decrease in whipple) of Chinese imm. over time ▶ Whipple Plot, esp. relative to other immigrants ▶ Whipple Plot (Census)
- **Results from Baten et al. 2010:** Rapid incr. in numeracy of birth cohorts from 1850-1890 (younger Chinese men are much less likely to round ages) ▶ Figure from Paper
- **Implication:** contrary (?) to height results – slightly increasingly *negative* selection on numeracy, as seen by plotting predicted whipple using Baten et al. (2010) again

Annual Mean Whipple and Mean Predicted Whipple (Register)



Results on Selection: Takeaways?

- Main conclusions drawn from comparison with Baten et al. 2010 paper, which I don't have the data for [yet?]
- Mostly reinforce takeaway of positive selection that I also find in Census (on occupation and literacy)
- Numeracy results a bit puzzling (esp. compared to literacy in the census)
- How to tie back to head tax? or is it fine to show trends over this period as descriptive?

Framing Project

Option 1: Big-picture framing, main focus on what we can learn about immigration more generally from this one historical episode

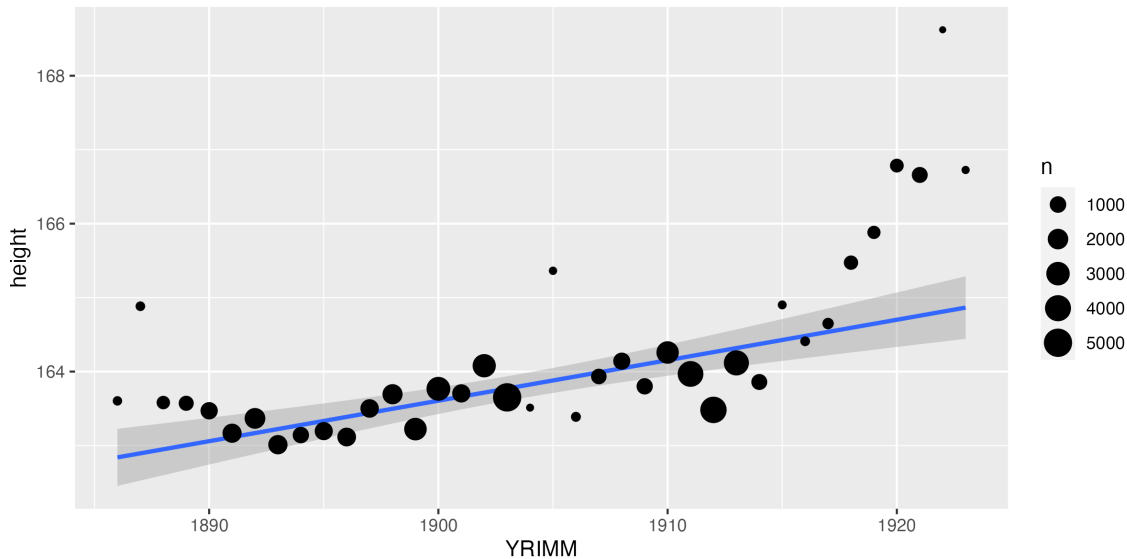
- references: Feigenberg (2020) on effect of border fence construction on selection [present day, Mexico]; Escamilla-Guerrero and López-Alonso (2023) on effect of 1907 crisis on selection [historical, Mexico]
- not sure how my work necessarily contributes to the existing literature, other than to look at a different group of immigrants & using cool data
- other papers do have exogenous shocks to migration cost (if not explicitly in monetary terms)
- i find more positive selection due to HT – what is the policy implication?

Framing Project

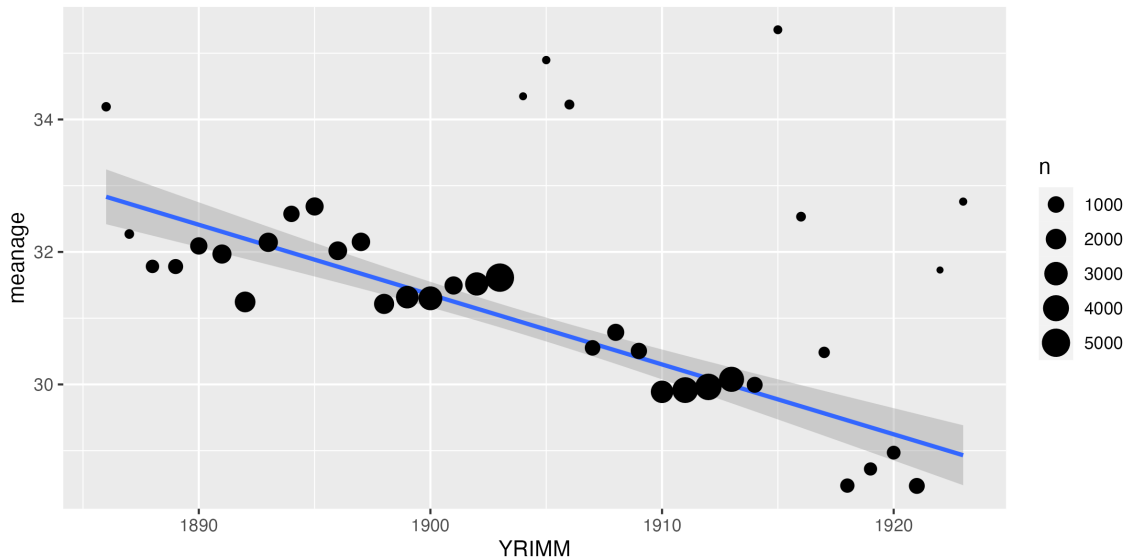
Option 2: More narrow framing, main focus is on documenting trends in Chinese immigration under the Chinese Head Tax

- references: Kanazawa (2005) on political economy of Chinese exclusion
- less general-interest, likely harder to publish
- closer to the reason I was interested in this topic in the first place, more emphasis on how horrible this tax was

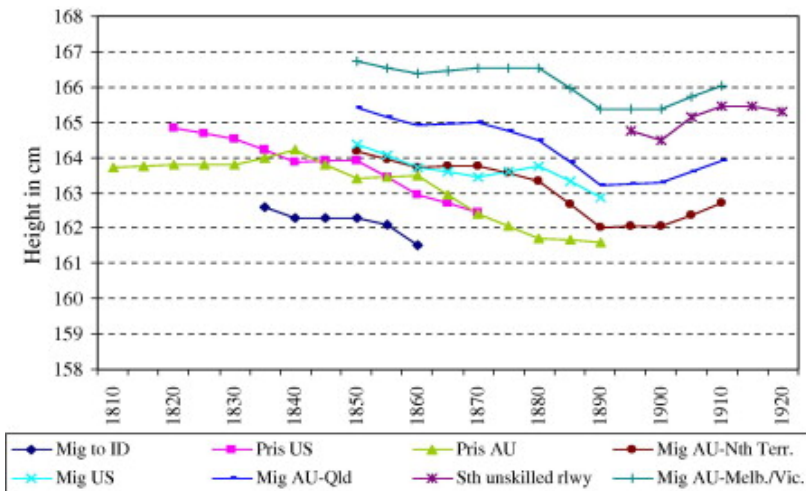
Raw Annual Mean Height [< Back](#)



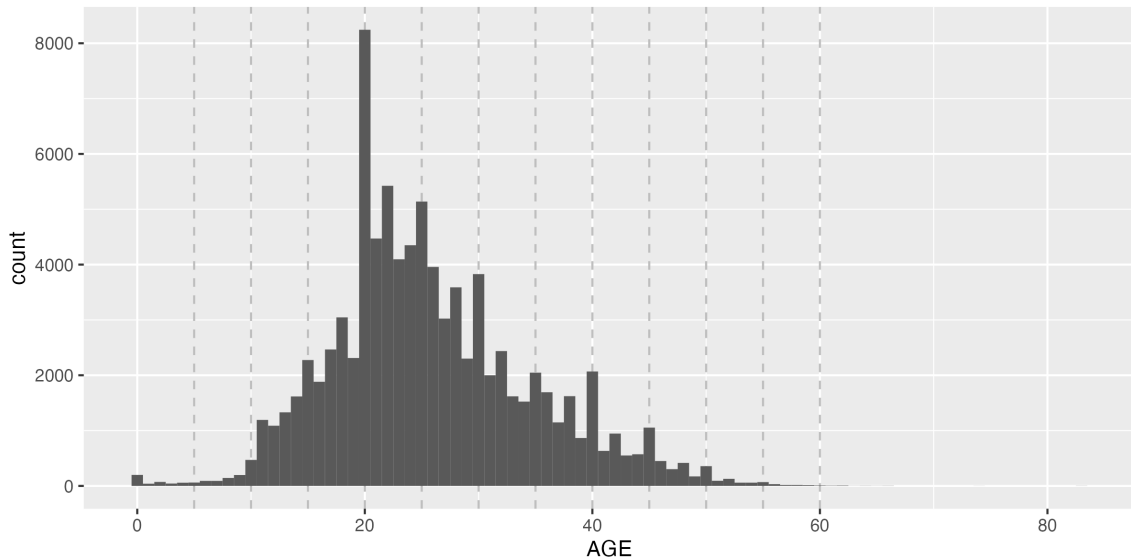
Raw Annual Mean Age

[◀ Back](#)

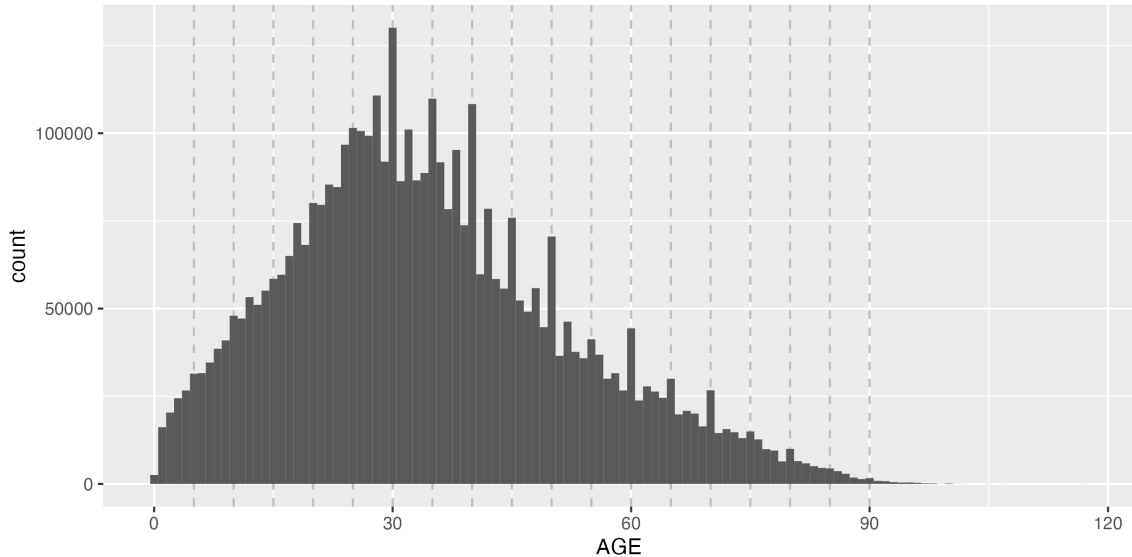
Baten et al. 2010 Height Patterns

[◀ Back](#)

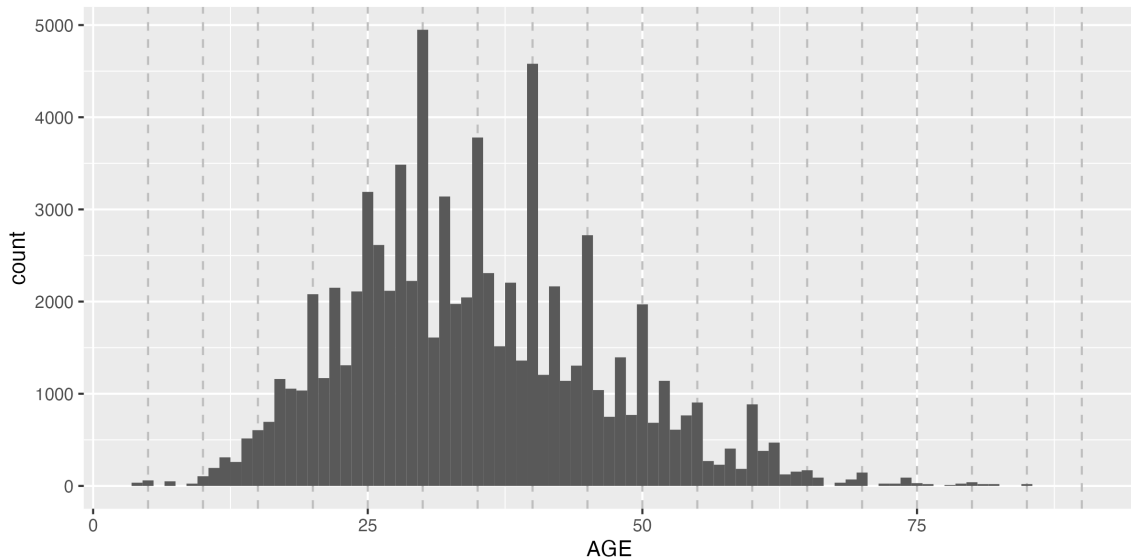
Histogram of Ages in Chinese Register

[◀ Back](#)

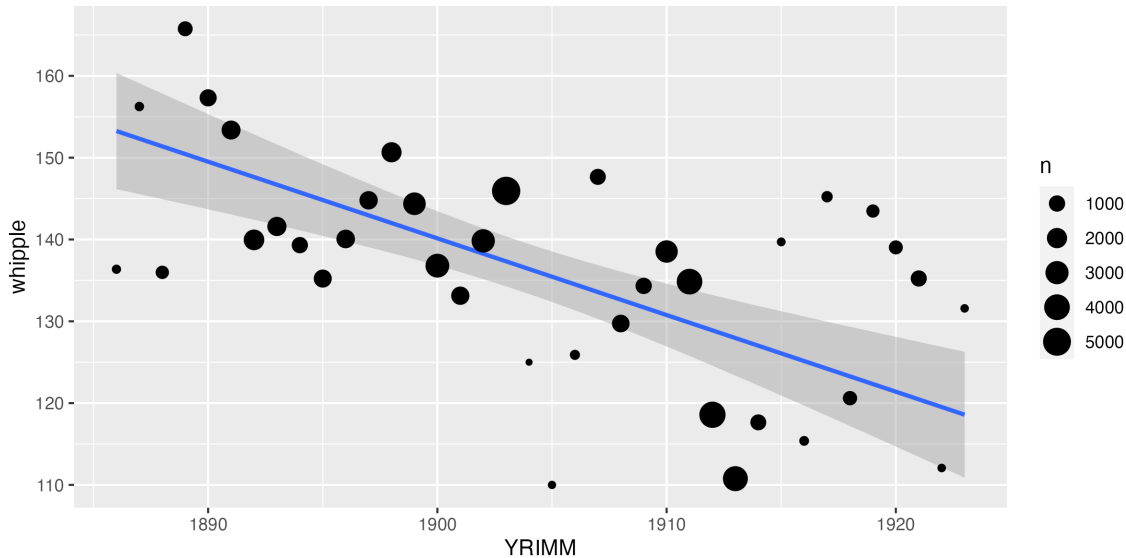
Histogram of Ages in Canadian Census: All Immigrants [◀ Back](#)



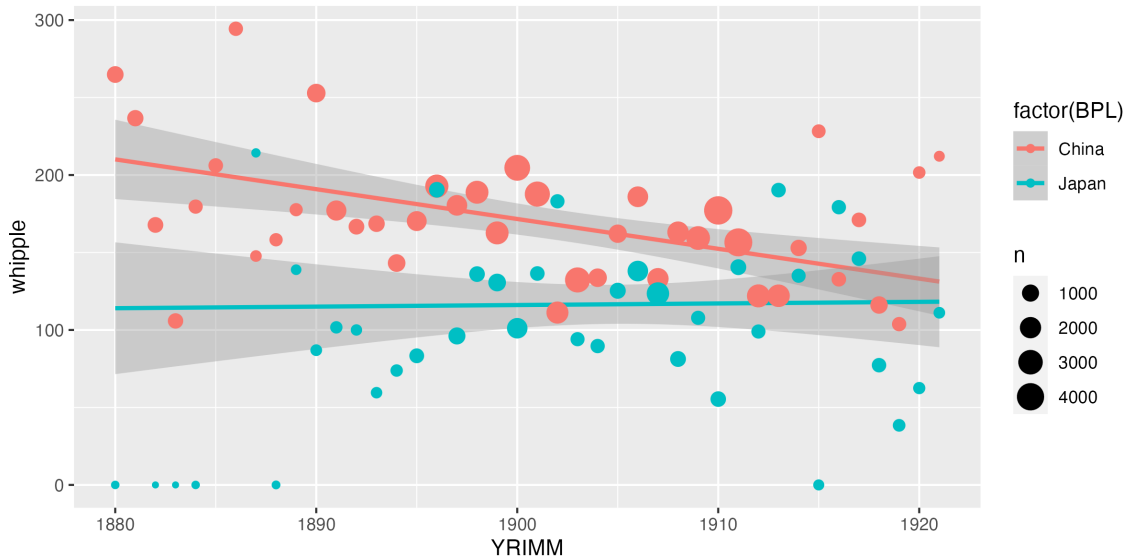
Histogram of Ages in Canadian Census: Chinese Immigrants

[◀ Back](#)

Raw Annual Mean Whipple Index (Register) [◀ Back](#)



Whipple Index for Chinese vs. Non-Chinese Imm. (Census)

[◀ Back](#)

Baten et al. 2010 Whipple Patterns

[◀ Back](#)