Colonial Migration and the Origins of Governance
Theory and Evidence from Java

Thomas B. Pepinsky

Department of Government
Cornell University
pepinsky@cornell.edu

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Overview

Background Question
Where does governance come from?

My argument
Colonial migration

Social exclusion of trading minorities in the colonial era ⇒ accommodative local economic governance today
The Case of Java

- Laboratory for Indo’s wide-ranging decentralization experiment
- Long open to trade and migration from South China, Indian Ocean communities
- Agricultural exports dominate → socioeconomic structure is “plural economy” (Furnivall 1939)
Exploit variation in settlement between “Chinese” and “other foreign Easterners”

1. Common **economic position** of foreign Easterners: traders, middlemen, intermediaries, petty financiers

2. Important **social distinction** between Chinese and Arabs in Java
Measuring Social Exclusion

Exploit variation in settlement between “Chinese” and “other foreign Easterners”

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**Implication**: isolate social exclusion from other features of trading minorities (human capital, “business-mindedness”, etc.)
Measuring Social Exclusion

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Claim: Social exclusion in the past ⇒ cooperative informal networks in the past ⇒ cooperative informal networks today ⇒ economic governance today
Measuring Social Exclusion

Migrant population density of colonial administrative units from the 1930 Census of the Netherlands Indies (Volkstelling 1930)

Administrative Divisions in Java:

- **Colonial**
  - Provincie or Gouvernement
  - Residentie
  - Regentschaap
  - District

- **Indonesian**
  - Propinsi
  - Kabupaten or Kota
  - Kecamatan

- **U.S. Equivalent**
  - State
  - County
  - Township

Match Regentschaap to kabupaten/kota where possible, use District where necessary
Migrants in 1930

Number of Chinese people per 1000 inhabitants, 1930

Legend
- Less than 5
- From 5 to 10
- From 10 to 20
- From 20 to 70
- More than 70
- Missing values

Number of other "Foreign Easterners" per 1000 inhabitants, 1930

Legend
- Less than 0.5
- From 0.5 to 1
- From 1 to 5
- More than 5
- Missing values
General Empirical Strategy

Social exclusion in the past ⇒
cooperative informal networks in the past ⇒
cooperative informal networks today ⇒
economic governance today
General Empirical Strategy

Social exclusion in the past ⇒
  cooperative informal networks in the past ⇒
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Measuring Economic Governance

“Accommodative” economic governance:

- “government actions/policies/regulations/etc. not interfering with firms’ objectives”
- partial, not impartial
- May be normatively objectionable
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Economic Governance Index ($EGI$) = first principal component of 40+ governance indicators from KPPOD and the Asia Foundation (McCulloch 2011)
- NB: first component corresponds to above definition
“Accommodative” economic governance:
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A quick look

Difference in Migrant Densities, Chinese versus Other Foreign Easterners

Province
- Central Java
- East Java
- West Java
- Yogyakarta

Pepinsky (Cornell)
Model to be Estimated

\[ EGI = \alpha + \beta_1 CHI_{1930} + \beta_2 OFE_{1930} + \beta_3 EUR_{1930} + \gamma X + \delta D + \epsilon \]

where

- \( CHI_{1930} = \log \) percent Chinese in 1930
- \( OFE_{1930} = \log \) percent other foreign Easterners in 1930
- \( EUR_{1930} = \log \) percent Europeans in 1930
- \( X = \) demographic, economic, geographic controls
- \( D = \) provincial fixed effects
### Results

<table>
<thead>
<tr>
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<td>Observations</td>
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OLS with bootstrapped standard errors in parentheses. Province fixed effects suppressed for presentation. $* = p < .05.$
Inferential Hurdles

How to interpret this correlation between settlement in 1930 and economic governance today?

- Colonial social exclusion (my preferred explanation), but also

Chinese population?

Sorting?

Human capital?

Rely on design and argument to dismiss these. Briefly,

Chinese population today does not predict governance

No evidence of selective migration by Chinese, not Arabs

Arabs and Chinese performed remarkably similar functions in the
colonial economy

In sum: possible to tell a story about unobservables

...but stories are inconsistent with the evidence available to us
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Conclusions and Implications

1. Colonial origins of comparative development (Acemoglu and colleagues)
2. Ethnicity and informal institutions (Greif, Landa, and others)
3. Social capital and democratic performance (Putnam in Italy)
Plural economy ⇒ three kinds of people recognized under colonial law
1. so-called “natives” or “indigenous” people (Inlander)
2. Europeans and assimilated persons (Europeanen en gelijkgestelden)
3. “foreign Easterners” (vreemde Oosterlingen)
   ▶ Chinese (Chineezen)
   ▶ Others (andere vreemde Oosterlingen)
Extras: The Colonial Economy of Java

Plural economy ⇒ three kinds of people recognized under colonial law

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⇒ differential trajectories of colonial migrants

1. Europeans: incorporation in formal politics
2. Chinese: social exclusion
3. Others: social inclusion
Extras: Colonial Economies

Characteristic Problem: Trade and exchange without property rights

Solutions?

- Internal focus: ethnic ties (Greif, Landa, Fearon/Laitin)
- External focus: personal, informal networking and collaboration with local indigenous political elites (compare to Fearon/Laitin’s “spiral model”)
Extras: Colonial Economies

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Local elites provide property rights and physical protection for migrant traders in exchange for preferential access to commodities, taxes and tribute, etc.
Solution to colonial-era problem: personal, informal networking and collaboration with local indigenous political elites

Informal networks more likely to support informally institutionalized exchange when

1. Trading minorities have settled
2. “Ethnic ties” with the indigenous population are impossible: “social exclusion”

Long-term consequences: where these informal networks arise, they persist
Colonial origins $\Rightarrow$ extractive institutions or inclusive institutions
Colonial origins $\Rightarrow$ extractive institutions or inclusive institutions

My contribution:

1. What are the “everyday” responses to extractive institutions?
2. Can we study them in a principled manner?
3. Do they shape long-term outcomes?
Extras: Ethnicity and Institutions

Avner Greif, Janet Landa, many others:
What is the internal logic of trade and exchange?
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   What is the internal logic of trade and exchange?

My intervention:
   The “external strategy” is interesting and consequential
Putnam: historical/informal origins of democratic performance in modern Italy
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My perspective:

1. History matters, but former colonies have different foundational moments
2. Precision over parsimony
3. Critical juncture: the creation of market relations?
Colonial settlement as first stage IV for growth regressions?
Extras: Measuring Economic Governance: Concepts

Normative theories of “good” economic governance:

- “the norms of limited government that protect private property from predation by the state” (Kaufmann)
- “impartiality in the exercise of public authority” (Rothstein and Teorell)

Contrast with “accommodative” economic governance:
- “government actions/policies/regulations/etc. not interfering with firms’ objectives”
  - partial, not impartial
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**Extras: Measuring Economic Governance: Measures**

Exploratory factor analysis of 40+ governance indicators (KPPOD and the Asia Foundation, McCulloch (2011))

Natural cluster of loadings on first principal component

<table>
<thead>
<tr>
<th>Indicator</th>
<th>Loading</th>
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<tbody>
<tr>
<td>Interaction: Obstacle or Impact on Firm Performance</td>
<td>0.24</td>
</tr>
<tr>
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<tr>
<td>Regent/Mayor Integrity: Impact on Firm Performance</td>
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<tr>
<td>Infrastructure: Obstacle or Impact on Firm Performance</td>
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<td>Land Access: Obstacle or Impact Impact on Firm Performance</td>
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<td>Security and Problem Solving: Obstacle or Impact on Firm Performance</td>
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<td>Transaction Costs: Obstacle or Impact on Firm Performance</td>
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<td>Licensing: Obstacle or Impact on Firm Performance</td>
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Economic Governance Index ($EGI$) = first principal component

**NOTE:** definition **entails** conceptualization of “accommodative” rather than “good” economic governance
Extras: Other Indicators

![Graph showing component eigenvalues](image-url)

![Graph showing the comparison of Chinese population per 1000 in 1930 and today. The graph uses a log scale for both axes.]

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Extras: Sorting?
Extras: Sorting?

[Graph showing a scatter plot with data points on a log scale for Chinese per 1000 and Other Foreign Easterners per 1000.]

Other Foreign Easterners per 1000, log scale
Chinese per 1000, log scale

Pepinsky (Cornell)  Migration and Governance

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### Extras: Sorting?

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<td>Ln GRDPPC (2001)</td>
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<td>Growth (2001-7)</td>
<td>-24.7</td>
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<td>(20.0)</td>
<td>(27.9)</td>
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### Extras: Human Capital, Industriousness, etc.? 

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<tr>
<th>Occupational Group</th>
<th>Description</th>
<th>Chinese</th>
<th>Others</th>
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<tbody>
<tr>
<td>Oerproductie</td>
<td>Farming, fishing, mining</td>
<td>9.1</td>
<td>2.8</td>
</tr>
<tr>
<td>Nijverheid</td>
<td>Industry</td>
<td>20.8</td>
<td>10.6</td>
</tr>
<tr>
<td>Verkeerswezen</td>
<td>Transportation</td>
<td>2.8</td>
<td>3.6</td>
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<tr>
<td>Handel</td>
<td>Trade</td>
<td>57.7</td>
<td>72.6</td>
</tr>
<tr>
<td>Vrije beroepen</td>
<td>Medicine, law, religion, teaching</td>
<td>2.1</td>
<td>3.5</td>
</tr>
<tr>
<td>Overheidsdienst</td>
<td>Public Service</td>
<td>0.5</td>
<td>0.9</td>
</tr>
<tr>
<td>Overige beroepen</td>
<td>Other</td>
<td>6.9</td>
<td>5.9</td>
</tr>
</tbody>
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Entries are percentages of all employed Chinese and other foreign Easterners. 

Source: Volkstelling 1930.


### Table: Occupational Groups in Java

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Source: *Volkstelling 1930*.
Table: Traders in Java

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<th>Occupational Subgroup</th>
<th>Description</th>
<th>Chinese</th>
<th>Others</th>
</tr>
</thead>
<tbody>
<tr>
<td><em>In voedings- en negotmiddelen</em></td>
<td>In foods</td>
<td>22.3</td>
<td>4.3</td>
</tr>
<tr>
<td><em>In textiele stoffen</em></td>
<td>In textiles</td>
<td>16.0</td>
<td>48.8</td>
</tr>
<tr>
<td><em>In ceramiek</em></td>
<td>In ceramics</td>
<td>0.5</td>
<td>0.3</td>
</tr>
<tr>
<td><em>In hout, bamboe en voorwerpen daarvan</em></td>
<td>In wood and bamboo products</td>
<td>0.7</td>
<td>1.3</td>
</tr>
<tr>
<td><em>In vervoermiddelen</em></td>
<td>In vehicles</td>
<td>1.0</td>
<td>0.5</td>
</tr>
<tr>
<td><em>In kleeding en lederwaren</em></td>
<td>In clothing</td>
<td>0.8</td>
<td>2.5</td>
</tr>
<tr>
<td><em>Gemengde kleinhandel</em></td>
<td>Miscellaneous small trading</td>
<td>46.8</td>
<td>27.5</td>
</tr>
<tr>
<td><em>Groot- en tusschenhandel</em></td>
<td>Wholesale and distribution</td>
<td>1.8</td>
<td>0.3</td>
</tr>
<tr>
<td><em>Overige handel</em></td>
<td>Other trade</td>
<td>5.1</td>
<td>8.6</td>
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<tr>
<td><em>Credietwezen</em></td>
<td>Banking and finance</td>
<td>5.1</td>
<td>5.8</td>
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Entries are percentages of all Chinese and other foreign Easterners employed in trade (*Handel*).

Source: *Volkstelling 1930*.