

Infrastructure, Public Goods, and Market Failure

(September 12 Session)

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INFRASTRUCTURE HISTORY

- When was the U.S. interstate highway system constructed?
- Why was it constructed?
- What about waterways (e.g., the Erie Canal, airports, pipelines)?

INFRASTRUCTURE OVERVIEW

- Baseline infrastructure needs:
\$87 billion/year (54 billion public;
\$33 billion private) and generate 1.6
million new jobs
- High end estimate:
\$148 billion/year (93 billion public; 55
billion private) and generate 2.6 million
new jobs

INFRASTRUCTURE OVERVIEW

- What arguments support the statement that the **rate of growth** and **infrastructure investment** are related?
- What is a “**productivity dividend**”?
- Why would **infrastructure investment** create about 18,000 **new jobs** for every \$1 billion spent (direct, indirect, and induced spending), while a **tax cut** would augment household spending and create only 14,000 new jobs?

INFRASTRUCTURE OVERVIEW

- Why would most of the jobs be created in **construction**?
- If 40% of the new jobs are created in construction and 10% in manufacturing, where are **the other 50%** of new jobs created?
- What role do **imports** play?
- Why does public investment improve **private sector productivity**?

INFRASTRUCTURE OVERVIEW

- What type of public investments produce direct **environmental benefits**? How does this occur?
- 1950-1979 GDP and infrastructure investment grew at ~4.1 and 4.0 %/year, respectively; 1980-2007, they grew at 2.9 and 2.3%/year, respectively

	GDP growth rate	Infrastructure Investment growth rate
1950-1979	4.1%	4.0%
1980-2007	2.9%	2.3%

INFRASTRUCTURE OVERVIEW

- Of nondefense assets in 2007, **roads** represent about 32% and **education** almost 20%, with state and local share of **nonmilitary assets** being over 92%.
- In 2007, 62% of all federal assets were **military**.
- What happened to the **regional shares** of assets.
Why?
- Why did **Washington DC** and **Alaska** have the highest per capita shares of public investment in 2006?
In what type of infrastructure did each of these regions invest?

REVIEW OF ARTICLES

- What is the “**Washington Consensus**”? Who formulated it?
- What do the two characteristics of a **public good** mean?
 - Nonexclusive
 - Joint consumption
- Should such goods be produced in the **public sector**? Why or why not? Why do “**free riders**” exist?
- What explains the production of **national defense**? Is government-income maximization a motive for national defense? Why or why not? How would **Holcombe** explain our participation in the Iraq and Afghanistan wars?

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REVIEW OF ARTICLES

- What role does **public education** play in terms of public expenditures?
- Give some examples of **market failure**. How can the public sector correct a “market failure”?
- Does the market or the public sector do best in obtaining “**revealed preference**”?
- Give examples to show that governments **need not be democratic** to be considered legitimate.

REVIEW OF ARTICLES

- Give some example of **public failures**? Can the market overcome these?
- Provide the views of **Krueger** on
 1. Market failure versus government failure
 2. Role of corruption
 3. Licensing
 4. Input subsidies
 5. Government intervention and falling/rising living standards

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REVIEW OF ARTICLES

- For **Krueger**,
 1. What is the government?
 2. What is the comparative advantage of government?
 3. What are the ways in which government intervention works?
 4. What guidance does she provide for policy makers?

REVIEW OF ARTICLES

Frishmann Economic Theory of Infrastructure and Commons Management:

- Summarize what Frishmann thinks are the primary reasons that the Internet infrastructure is “**socially valuable.**”
- Indicate the “strong economic arguments” that he provides for managing resources in an **openly accessible** manner
- Give and critique his three key insights

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REVIEW OF ARTICLES

- What is the “**comedy of the commons**”?
- Explain the differences between **traditional and nontraditional** infrastructure.
- Distinguish “**open access**” and “**commons**” and explain why Frishmann uses them interchangeably.
- Explain the difference between an “apple” and an “idea.” Which one has **infinite capacity**?
- Explain how one can achieve **Pareto optimality** in regard to infrastructure.
- Explain cases in which the **demand curve** will slope upward.

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