

11.167 Economic Development & Technical Capabilities

Lecture 5

Outsourcing

- Is Globalization good for developing countries?
 - Example – Radiology
 - X-rays sent offshore, because radiologist time is much cheaper
 - Created a huge fiasco for the US, and actually became an issue in a Presidential campaign (i.e. what's going on with employment?)
- What is outsourcing?
 - Part of a company goes overseas (part of Foreign Direct Investment)
 - FDI (Foreign Direct Investment)
 - i.e. loaning \$\$\$ to build a railroad, compared to going into a country and building it
 - Export of services – outsourcing
- How do we measure the amount of outsourcing?
 - One method – look at a countries' balance of payments
 - An indirect example for the US is higher education! Many foreign countries “export” students to learn in US institutions.
- Is the US right to object to outsourcing?
 - In the past, lots of outsourcing came to the US, now a lot of outsourcing is leaving the US
 - If we can show the in and out flows for the US, a concrete argument can be made about outsourcing.

Imperialism

- Many negative viewpoints, but there is a positive viewpoint
 - Argues that colonial governments establish law/order, basic transportation and health, modern financial and legal institutions
 - Is this true? No!
 - Imperialism driven by racism, greed by colonists
 - Law/order only brought about because it's necessary to safeguard the cash flow
 - Many developing countries already had law/order, but it was different from the imperialist notions of law/order, thus the imperialists saw them as barbaric.
- 12 Countries that succeeded after imperialism and WWII
 - Argentina, Brazil, Chile, Mexico, Korea, Taiwan, China, Malaysia, Indonesia, Thailand, Turkey, India
 - Succeeded primarily because of their pre-WWII manufacturing experience
 - Argentina, Brazil, Chile, Mexico – developed primarily because of immigration (“neo-colonialist”)
 - Korea, Taiwan, Malaysia, Indonesia, Thailand – help of a strong Japan
 - China, Turkey, India – Long history and nationalism

- These countries are all self-developed (domestic investment >> foreign investment)
- Decolonization brought opportunity to create national firms when the imperialist nations left.

Technology

- As noted before, economic theory is modeled as if technology information is perfectly free (i.e. Adam Smith's Pin factory from Lecture 1).
- What is technological knowledge?
 - One of the most scarce resources for development
 - Usually proprietary, which makes technology transfer difficult for buyers/suppliers
 - Buyers must be **pro-active** for development to succeed!
- Where do you get knowledge from?

Technological Capabilities – 4 examples

- Example: textile machinery
 - Textiles are very good for developing countries, because the technology is in the machinery
 - In general, foreign knowledge doesn't come with foreign investment unless it comes in the form of the product, such as the machinery
 - Issue of knowledge of workers is very important
 - How was this knowledge obtained?
 - Visiting foreign textile companies
 - Hiring foreign skilled workers
- Example: cement industry
 - Like textile industry, it's a raw-material based industry, and technology transfer occurs mainly within the machinery
 - Quality of material varies, lots of regulation and quality control required for a successful industry.
 - Nowadays, jobs in the cement industry require computer knowledge to manage the process, because the manual labor is almost all mechanized.
- Example: steel industry
 - Huge economies of scale, requires huge ovens/furnaces
 - How did the technology transfer occur? Look at example of S. Korea.
 - Received knowledge from an elite Japanese steel mill
 - New manager of Korean mill went to Japan to work in a blast furnace
 - Also worked with construction crew that built the furnace
 - Thus, technology transfer involved the Koreans going to Japan as well as the Japanese coming to work for the Koreans
 - Excellent example of the pro-active buyer which is essential for strong economic growth.
- Example: pulp and paper
 - Stinks!!!

- Like the steel industry, requires a lot of huge machines as well as very careful process control
- Machinery supplier crucial for technology transfer – important because they are looking to help the customer, and thus assists greatly in the technology transfer
- Again, requires very pro-active work by the buyer of large machines to ensure things are going smoothly.