

Intermediate Goods Trade, Technology Choice and Productivity

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1. WHAT IS THE QUESTION OF THE PAPER?

The problematic of the paper is to find actual impacts of trade liberalization in developing country, and analyze the effect of reducing tax rate under the concept of trade dual margin of new trade theory. In this paper, authors focus on three parts of empirical literature:

- More substantial productivity gains are found in firms using newly imported intermediate inputs.
- Trade liberalization results in lower mark-ups and greater competition.
- Firms facing greater competition incur significantly larger productivity gains.

2. WHY SHOULD WE CARE ABOUT IT?

This paper constructed a two-stage goods market, which can fit empirical data better than traditional literature. Due to deviation of goods, the conclusions of this liberalization model can also give more durable policy intuition of the export-oriented country, such as Taiwan.

3. WHAT IS THE AUTHORS ANSWER?

- Showing that domestic trade liberalization increases imported intermediate inputs on the intensive margin. While final goods producers react to it by shifting imports to lower types of intermediate inputs to lower the production cost. Finally decrease the overall length of the production line.
- Showing that Domestic trade liberalization leads to lower markups and greater competition and results in productivity gains.
- Domestic trade liberalization (lower domestic tariffs) can yield large benefits to final goods producers, resulting in sharp increases in both the final good output and measured productivity.

4. HOW DID THE AUTHOR GET THERE?

Using numerical analysis to test the constructed model ,under the case with and without tariffs. in the model, Author assume there is two type of goods have traded across two country (bigger and smaller one, implied the possibility of price difference). And the differ technical level comes to the different choice of producing or import good in the other hand, the production of final goods is constructed by the input of different type of goods and the intermediate goods production function. Under first order condition of prices, using steady state closed form equilibrium to compare the effect of different tariff policy.

parameter	meaning
n^E	the upper bound of export intermediates
n^P	the upper bound of all intermediate goods
M	production line
ψ	efficacy of investment in technological improvement
δ	technology gradient
ν	represents the technology obsolescence rate
ϕ	units of labor
ρ	time preference rate
$\beta - \gamma$	production sophistication effect

Table 1: Symbols