r4d programme

Policy Brief

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Winners and loser of trade liberalization: frictions, rigidities and reforms

Trade liberalization brings economic gains to the economy due to efficiency improvements and lower prices. The gains, however, may not be for everybody: export sectors win and import sectors lose. This creates a distributional conflict. The gains and losses from trade, and the attendant conflict, evolve as the economy adjusts. This depends on capital and labor market rigidities. There is room for policies to help realize and enhance the gains from trade and to mitigate the losses.

Picture: A Lao garment factory symbolizing the competition of imports under free trade and an employment application form which captures the process of employment and the labor mobility costs. © Hannes Teutoburg-Weiss

KEY MESSAGES

- Trade liberalization generates aggregate gains, but also creates winners and losers.
- Tariff cuts hurt workers in import-competing sectors and benefit workers in other sectors.
- The ensuing distributional conflict depends on the frictions that govern markets for labor, finance and raw materials.
- Rigidities in labor markets may prevent the gains from trade; labor reforms may enhance those gains.
- But labor frictions are protection devices too: rigidities protect winning workers in export sectors from the inflow of trade-displaced workers.
- Complementary labor market reforms that accompany trade liberalization need careful scrutiny.

The r4d project "Trade and labor market outcomes" is a research partnership involving economists from Brazil, Ghana, Kenya, Bolivia and Switzerland.

Trade liberalization, labor market frictions, employment and wages

A fundamental source of gains from trade operates via the price system. Trade liberalization requires the elimination of tariffs, which reduces the domestic price of imports relative to exports. The import sector contracts while the export sector expands. As this happens, capital and workers move from the import-competing sector to the more efficient export-oriented sector. This reallocation of resources leads to efficiency, lower prices, and aggregate gains from trade. For example, in Ghana import-competing sectors comprise some food products such as rice and poultry and capital goods while export sectors comprise cocoa and some minerals. In Bangladesh, exports comprise apparel and imports comprise raw cotton and wheat.

There is, however, an ensuing distributional conflict and this conflict depends on the factors that facilitate or impede factor reallocation. After liberalization, workers and capital (firm owners) in the export sector gain from trade, while workers and capital (firm owners) in the import sector lose. Although this looks like it might be a theoretical perspective, it can have a considerable impact on the economy in terms of standards of living and social welfare.

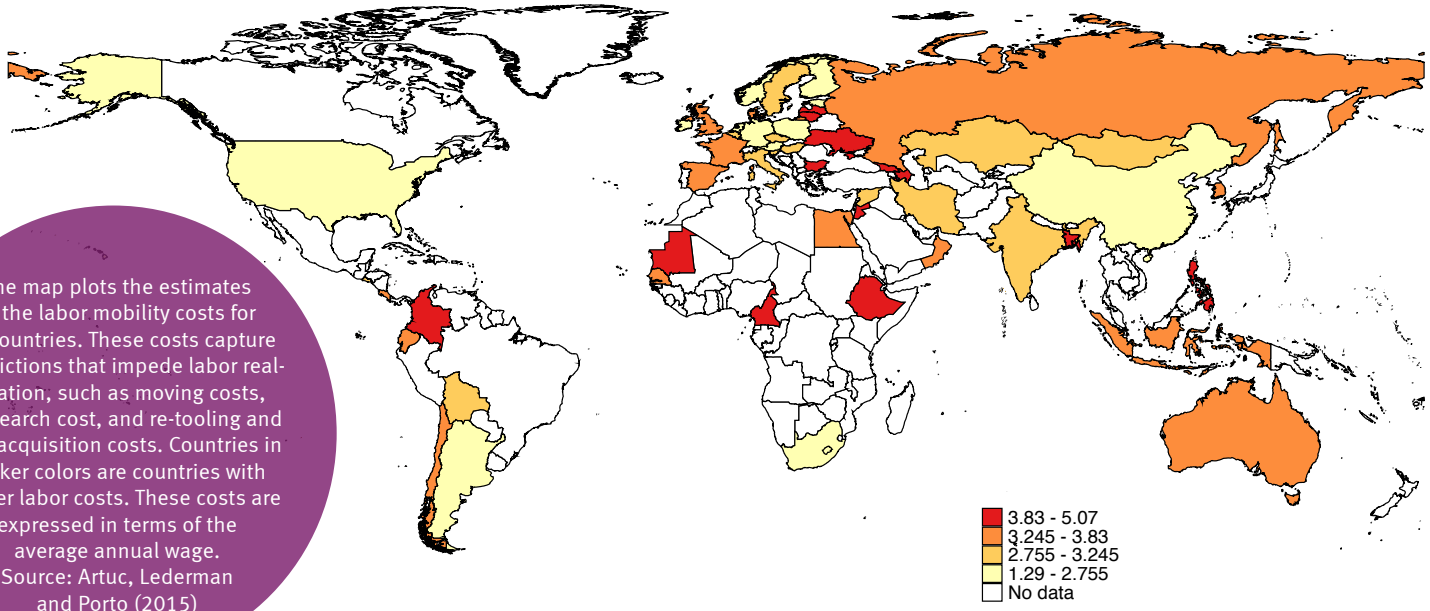
These are the typical elements of the welfare analysis of trade policy: while there are potential gains from trade at the national level, there are winners and losers from liberalization. A major challenge for policy is how to reap all the benefits of liberalization while at the same time assisting those being hurt. This depends on who the winners and losers are and on the factor market frictions that determine how costly it is for labor and capital to adjust in search of market opportunities. When frictions are high, the economy cannot adjust at all or can adjust only very slowly; when frictions are low, the economy can adjust quickly. A factor market is a market where factors of production, such as labor, raw materials and finance, are bought and sold.

Our r4d research focuses on labor market frictions. These are the costs that workers and firms face when adjusting labor. Workers incur costs of moving and reallocating, as well as job search costs and re-tooling costs, including acquiring skills needed for other jobs. Firms face costs of hiring and firing, such as severance payments, bureaucratic constraints, and unions. Our research shows that these labor market frictions are large and prevalent. We estimate the costs of labor mobility, which include all the different frictions mentioned above, for a wide sample of 56 countries. The map on page 3 shows the mobility costs, with darker colors representing higher impediments to workers mobility across sectors. On average, the labor mobility costs in developing countries are equivalent to 3.7 times the annual wage of these economies. These are very large costs indeed and will have an enormous effect at the level of individuals, families and communities, exacerbating poverty.

Implications of tariff cuts with immobile factors

Consider first a scenario where the frictions are so high that labor and capital are immobile and do not respond to the reduction in tariffs. This means firms do not invest or disinvest and cannot hire or fire workers; workers, in turn, cannot quit jobs or move across sectors. When tariffs are eliminated, the price of the import good declines and the demand for labor declines in the import sector. Since capital and employment are fixed in this scenario, nominal wages decrease one to one with the tariff cut to compensate for the lower demand.

Consumer prices are also declining under this scenario but only in proportion to the share of expenditure on import goods. Workers in the import-competing sector are thus worse-off with liberalization because the loss of protection implies a loss of purchasing power. Workers in export sectors are, however, better-off. In a small developing country, such as all the low-income African countries covered in our research, the price of the export good is not affected by the tariff cut



The map plots the estimates of the labor mobility costs for 56 countries. These costs capture the frictions that impede labor reallocation, such as moving costs, job-search cost, and re-tooling and skill acquisition costs. Countries in darker colors are countries with higher labor costs. These costs are expressed in terms of the average annual wage. Source: Artuc, Lederman and Porto (2015)

on imports. As a result, nominal wages in this sector remain constant. With lower prices, the purchasing power of export workers increases. As for the capitalists (firm owners), the nominal return to capital in the export sector, which are firms' profits, remains constant. Lower import prices thus lead to increases in real returns and capitalist firm owners are better off as a result. In the import sector, it is the other way around, and capitalists are worse off in real terms.

This setting illustrates a number of features that are relevant for the assessment of the effects of trade on employment and wages and their interaction with factor market frictions. There is always a conflict of interest between winners and losers. The winners are the firm owners or capitalists in the export sector. The losers are the firm owners or capitalists in the import-competing sectors. With immobile labor, workers in sectors that lose protection are worse off with liberalization while workers in export oriented sectors and in sectors that are not protected more generally stand to gain. This is a very important result: labor market frictions can work as protection devices. After the liberalization of trade, the frictions protect the workers in the export sector because they prevent the inflow of workers from the import-competing sectors.

Implications of imperfect labor mobility

Imperfect labor mobility means that labor can now reallocate in response to tariff liberalization, but it can only do so at a cost. After the initial increase in real wages in export sectors and decrease in real wages in import sectors, the economy can begin to adjust. Workers employed in the import sector will seek better wage opportunities in export sectors. This process occurs gradually. As workers move, the real wage in the import sector begins to recover, while some of the initial gains in the real wage of the export sector begin to dissipate. This process continues in time and the adjustment gets smaller until a new equilibrium (without any further adjustment) is reached. This path may take several years. Our r4d research shows that this transition can last for more than six years.

Guidance for policy

Several lessons for policy guidance can be derived from this research. Free trade is beneficial, on aggregate, for the economy. However, trade policy creates winners and losers and the identification of the winners and the losers is not trivial, especially when it comes to employment and wages. As a result, it is complex to elaborate policies that facilitate the gains from trade while at the same time assisting the losers from the economic transformation. Workers and capitalists will lose in sectors that lose protection and will gain in the remaining sectors. This creates pressures from protected sectors to keep the tariff protection in place, while there should be pressure from unprotected sectors to push for liberalization.

But frictions matter and they can work as protection devices. Workers and capitalists in the import-competing sectors will favor trade protection as well as higher labor market frictions that prevent workers from moving into the import sector, aiming to reap some of the economic benefits of tariff protection. The political process may be different in the wake of liberalization, however. If liberalization is imminent, because a country has become a member of the World Trade Organization (WTO) or has signed a regional trade agreement, then export sectors may want to oppose labor reforms, while the import sector will push for policies that diminish the impediments to labor mobility. With imperfect labor mobility, the distributional conflict becomes dynamic and intertemporal. The short-run policy implications may be different from the long-run implications as the distributional conflict becomes eroded or amplified by the labor market frictions.

"Macroeconomic policy can never be devoid of politics: it involves fundamental trade-offs and affects different groups differently."

Joseph Stiglitz

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FURTHER INFORMATION

r4d Trade and labor market outcomes Project Page:
http://r4d.africantransformation.org/project/

References

Artuc, E., S. Chaudhuri, and J. McLaren (2010). "Trade Shocks and Labor Adjustment: A Structural Empirical Approach," American Economic Review, 100(3), pp. 1008–45.

Artuc, E., S. Chaudhuri, and J. McLaren (2019). "Some Simple Analytics of Trade and Labor Mobility," mimeo, World Bank.

Artuc, E., D. Lederman, and G. Porto (2015). "A Mapping of Labor Mobility Costs in the Developing World," Journal of International Economics, vol. 95(1), pp. 28–41.

Artuc, E., I. Brambilla and G. Porto (2019). "Patterns of Labor Market Adjustment to Trade Shocks with Imperfect Capital Mobility," mimeo, r4d employment module, Universidad Nacional de La Plata.

Dix-Carneiro, R. (2014). "Trade Liberalization and Labor Market Dynamics," Econometrica, vol. 82(3), pp. 825–885.

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