IDE Research Bulletin

Research Summary based on papers prepared for publication in academic journals with the aim of contributing to the academia

Labor in Global Supply Chains

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This research project investigated economic and political issues that developing countries face in the world economy where countries are increasingly interconnected through production networks. Specifically, we focused on the following three areas: (i) Internationalization of local firms in industrializing developing economies, (ii) The effect of international trade on work values, and (iii) Labor standards in trade agreements. The project produced the following five papers:

[1] "Management Practices and Local Suppliers to Multinational Firms: Firm-level Evidence from Northern Vietnam" by Hitoshi Sato, Kiyoyasu Tanaka, and Minh Binh Tran

[2] "Does Hard Work Bring Success? Heterogeneous Impacts of Trade on the Belief in Hard Work" by Yoko Asuyama

[3] "Can RTA Labor Provisions Prevent the Deterioration of Domestic Labor Standards? The Cases of Statutory Minimum Wages and Employment Protection Regulations" by Isao Kamata
[4] "Political Economy of Labor Provisions in Free Trade Agreements" by Hitoshi Sato

[5] "Endogenous Human Capital Accumulation, Trade Openness, and Industrialization" by Toshitaka Gokan, Hitoshi Sato, and Jacques-François Thisse

Sato, Tanaka, and Tran [1] construct an original survey data on northern Vietnamese firms and quantitatively examine their management practices by comparing indigenous firms that supply local affiliates of foreign firms with intermediate inputs to those firms that serve domestic firms only. Asuyama [2] empirically examines how international trade affects people's beliefs in the relative importance of hard work rather than luck as a determinant of success, utilizing individual-level belief data from the World Values Survey and European Values Study. Kamata [3] empirically examines the effect of labor clauses in regional trade agreements (RTAs) on the signatories' domestic labor standards measured by statutory minimum wages and the strictness of employment protection, using the original classification of RTAs together with the labor market data for a wide variety of countries for multiple years. Sato [4] investigates the effects of the inclusion of labor provisions into free trade agreements (FTAs) on external tariffs imposed on non-member countries and political viability of FTAs with a political economy model in which the oligopolistic industry may make political contributions. Gokan, Sato, and Thisse [5] propose a tractable two-country model for investigating export-led industrialization with skill accumulation and highlight interactions among trade cost reductions, the efficiency of school systems, and market size.

[1] "Management Practices and Local Suppliers to Multinational Firms: Firm-level Evidence from Northern Vietnam" by Sato, H. Tanaka, K., and Tran, M. B.

We seek to examine the characteristics of local suppliers to MNEs by conducting a new firm-level survey in Northern Vietnam. We collect information on firm characteristics for locally-owned and foreign-owned firms, including their backgrounds, management practices, characteristics of a chief executive officer (CEO) and middle managers. Using firm-level survey data, we estimate the probability that local firms engage in transactions with foreign firms as a function of firm-level characteristics such as management practices and managerial experiences.

We find that foreign firms tend to adopt more structured management practices than domestic firms. Domestic suppliers are more likely than non-suppliers to adopt more structured management practices and to employ CEO and managers with prior working experiences at foreign firms in Vietnam. An econometric analysis shows that managers with work experience at foreign firms are one of main differences between local suppliers and non-suppliers. A plausible explanation is that successful local suppliers meet the stringent supply requirements from MNEs by exploiting tacit managerial knowledge embodied in experienced managers, which is crucial input to efficiently implement a modern production system.

[2] "Does Hard Work Bring Success? Heterogeneous Impacts of Trade on the Belief in Hard Work" by Asuyama, Y.

This study empirically examines how international trade affects people's beliefs in the relative importance of hard work rather than luck as a determinant of success. Utilizing individual-level belief data from the World Values Survey and European Values Study, which are matched with country-, cohort-, year-specific past trade-exposure data, the study finds that the impacts of trade differ by export and import, their skill content, development stages of countries, and individual skill levels.

In high-income countries, individuals who experienced growth in exports to low-income or low- and middle-income countries tend to attach importance to hard work as a driver of success, regardless of their skill levels. By contrast, in low- and middle- income countries, exposure to exports does not substantially change people's belief in hard work.

A growing number of studies in various countries find that rise in imports from low-income countries such as China negatively affect employment and wages of domestic workers, particularly the low-skilled workers. Such negative impact on labor market appears to have no significant effect on people's beliefs in hard work in high-income countries. In low- and middle-income countries, however, individuals who are exposed to imports from low-income countries tend to attach less importance to hard work, regardless of their skill levels. By contrast, low-skilled individuals more exposed to imports from high-income countries strongly believe

in the relative importance of hard work. This is consistent with the consumption channel hypothesis that individuals attach more importance to hard work to increase earnings and consume newer or luxury goods imported from high-income countries.

The present study also examines the effect of trade on individual beliefs in redistribution policy and government interventions. The results indicate that individuals who experienced growth in exports to low-income countries favor less redistribution and government interventions, while those more exposed to imports (from low-income countries, in particular) support more redistribution and interventions in general.

The present study primarily contributes to the scarce empirical literature on the impact of trade on people's beliefs. To the author's knowledge, this is the first study to examine the effects of trade on people's beliefs in hard work and to show its heterogeneous impacts.

[3] "Can RTA Labor Provisions Prevent the Deterioration of Domestic Labor Standards?: the Cases of Statutory Minimum Wages and Employment Protection Regulations" by Kamata, I.

This study addresses the question of whether labor clauses in regional trade agreements (RTAs) are effective to maintain or improve the domestic labor standards in the signatory countries. The study empirically analyzes the effects of RTA labor clauses on two measures of the signatories' domestic labor standards: statutory minimum wages and the strictness of employment protection. The impacts of RTA with and without labor clauses as well as the trade presence of the RTA partners for a signatory are estimated using the RTA classification proposed in my own previous study (Kamata, 2016)1 together with data on minimum wages and the indicator of the strictness of employment protection for a wide variety of countries for multiple years. The results show that having labor-clause-non-inclusive RTAs with more or larger trading partners are associated with lower statutory minimum wages although that negative association is not found for labor-clause-inclusive RTAs. The separate estimation for countries in different income groups further demonstrates that the above-mentioned results are chiefly driven by middle-income countries that sign RTAs with high-income partners. This should imply that signing RTAs with more or larger high-income trading partners would create to the government of a middle-income country, which has a comparative advantage over the high-income partners in labor-intensive sectors, a downward policy pressure on statutory minimum wages, while labor clauses could alleviate such a negative policy effect of RTAs on minimum wages in the middle-income country. This finding also exhibits an interesting contrast with the empirical finding of my preceding study in which no systematic relationship has been found between RTA-partner trade concentration and actual labor earnings regardless of whether or not RTAs include labor provisions. This potentially asymmetric effects of RTA

¹ Kamata, Isao (2016), "Labor Clauses in Regional Trade Agreements and Effects on Labor Conditions: An Empirical Analysis," IDE Discussion Paper No. 609, Institute of Developing Economies (IDE-JETRO).

labor clauses on statutory minimum wages and actually-paid wages are reaffirmed through the estimation with a "common" sample, which should suggest that although signing RTAs with more or larger partners would not bring a market pressure on wages regardless of whether or not the RTAs have labor clauses, signing RTAs with more or larger partners could create some policy pressure onto the signatory government to maintain statutory minimum wages being low, unless the RTAs include labor clauses. Unlike this case of statutory minimum wages, however, the empirical analysis finds no evidence for positive impacts of labor-clause-inclusive RTAs or negative impacts of labor-clause-free RTAs on the strictness of employment-protection regulations in the signatory countries. Finally, the empirical analysis also finds some evidence for potential negative effects of RTAs between high-income countries on their domestic labor standards even in the case of RTAs with labor clauses.

[4] "Political Economy of Labor Provisions in Free Trade Agreements" by Sato, H.

The inclusion of labor standards into trade agreements has long been one of the most controversial issues in trade negotiations. The embedded concern is that while international market competition would drive firms/governments to degrade labor standards to maintain their competitiveness, such provisions would nullify market access concessions in trade agreements. Indeed, the Uruguay Round of multilateral trade negotiations failed to incorporate labor standards into the GATT/WTO agreements. Nevertheless, it is increasingly common for new preferential trade agreements (PTAs) to include labor provisions.

This paper examines the effects of the inclusion of labor provisions into free trade agreements (FTAs) on external tariffs imposed on non-member countries and political viability of FTAs, using a political economy model in which the oligopolistic industry may make political contributions for exerting influence on the home government that sets import tariffs against non-member countries. Labor provisions in FTAs tend to raise the production cost in the party countries with low labor standards (e.g., developing countries) and encourage their external-tariff reductions (the tariff complementarity effect is enhanced). By contrast, the labor provisions do not affect the production cost in the party countries with sufficiently high labor standards so that the provisions are non-binding. Nevertheless, the tariff complementarity effect is weakened in such countries: their external-tariff reductions would shrink. Labor provisions also influence political viability of FTAs. When an FTA has labor provisions, its political viability will increase in counties with high labor standards.

[5] "Endogenous Human Capital Accumulation, Trade Openness, and Industrialization" by Gokan, T., Sato, H. and Thisse, J. F.

Perhaps the two most prominent development strategies in recent years have been export-led

growth and raising education attainment. The rapid and sustained growth over the last decades in East Asia has been deemed as a notable example of economic openness and export-led growth. The importance of education in economic growth and development, as an engine of human capital formation, has long been stressed in both policy and academic arenas. However, few papers have presented formal analysis on both of industrialization with export-oriented strategy and the improvement of education systems in a unified framework. Since the view that trade openness and education are key for economic development is compelling, such an omission is critical.

This paper develops a tractable two-country (a developed country and a developing country) general equilibrium model with endogenous skill formation. We show how education costs, trade costs and market sizes of a developed and a developing country interact to shape the spatial configuration of the manufacturing sectors. We consider the following four equilibrium distributions of industries: (i) the core-periphery such that no manufacturing production is in a developing country emerges, (ii) the periphery hosts only intermediate firms in manufacturing sector, (iii) the core and the periphery accommodate the intermediate and final sectors, and (iv) the core no longer hosts the final sector. This transition occurs as education costs decreases. This transition tends to emerge more with larger country size and lower transport costs. This implies less populated developing countries need to obtain the higher quality of the school system for industrialization.

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