### **Literature Review**

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#### Introduction

Since 2016, political events with significant influence happened around the globe, from Brexit to American election, also the ongoing European elections. One of the main characteristics of this tide of political movement is anti-globalization, which usually includes policies that would in theory restrict international trades. This situation leads to a question bothered many people. Though decades of globalization increase total wealth around the globe with no doubt, why closed to majority of people in those democratic countries would favor policies against international trades? Many studies has been done to try to reveal determines of individual's attitudes toward international trade. This literature review would first introduce two basic theoretical models in the field, and then analyze several important empirical studies.

The standard trade theory believes individual preferences on trade policy are determined crucially on how trade policy affects their income, also called income for factors of production. And how trade policy can affect income for factors of production depends crucially on the degree of intersectoral factor mobility, also called the degree of factor specificity. Two theoretical models, Ricardo-Viner Model and Heckscher-Ohlin model are built according to different level of degree of intersectoral factor mobility.

## Ricardo-Viner Model

The Ricardian model is a general equilibrium mathematical model in international trade theory introduced by David Ricardo in 1833. The Ricardo-Viner Model (RV model), also known as the specific factors model, is an extension of the Ricardian model, developed by Jacob Viner. It was further developed by Paul Samuelson and Ronald Jones later. The model consists of two countries,

two goods and three factors of production. The two countries can only trade goods, not factors of production. The model assumes some or all factors cannot move to other sectors. The result of the model suggests that factor incomes tend to vary by industry of employment (Krugman et al. 2015, pp: 83-97).

#### Heckscher-Ohlin Model

The Heckscher-Ohlin model (HO model) is a general mathematical model of international trade. It is another extension of the Ricardian model. The HO model is developed by Eli Hechscher and Bertil Ohlin. The model also consists of two countries, two goods and three factors of production. In contrast to the RV model, the HO model assumes that factors of production can move costlessly across sectors. As a result, the factor incomes tend to vary by factor type (Blaug 1992, pp. 190). In general, the HO model is a better description of the worldwide trade after WWII. Part of the reason is that after WWII, the factors such as labor or capital could move less costly through different sectors.

# **Evidence for Theoretical Models**

Based on the two theoretical models above, researchers start their empirical works to try to find determines of individual preferences toward international trade. Two key factors are considered at first. The effects of industry of employment, meaning which kind of industry the individual is working at, and factor type, meaning high skilled workers or low skilled workers, are tested through different works. Evidences supporting both theoretical models are found. Irwin (1994, 1996) finds evidence showing that industry interests rather than factor interests dominates individual preferences in both 1923 British general election and 1906 British general election. The studies used county-level data regress on votes reflecting county factor and industry issues. Magee (1978) also finds evidence supporting the RV model. The study shows in 19 out of 21 industries testifying before the House Ways and Means Committee on the Trade Reform Act of 1973 that unions agreed with management and

industry trade associations. Unions are considered representatives of labor and management and industry trade associations are considered as representatives of capital. So little conflicts were found between factors, but industry type dominates their views of international trade policies.

However, evidences supporting the HO model are also found. Beaulieu (1996, 1998) using individual-level survey data from 1988 Canadian federal election, an election mostly viewed as a national referendum on the Canadian-U.S. Free-Trade Agreement (CAFTA), shows that factor type, rather than industry of employment dominates individual preference towards international trade. Kaempfer and Marks (1993) find that House votes are significantly correlated with the average wage in House districts. This finding also supports the HO model.

## Other important findings outside the theatrical models

Other than factor type and industry of employment, new determines are found. According to Scheve and Slaughter (2001), not only factor type dominates industry of employment in explaining support for trade barriers, but home ownership in counties with a manufacturing mix concentrated in comparative-disadvantage industries is also correlated with support for trade barriers. This important finding indicates that asset value also determines individual preferences on trading policies. Prior studies mainly focus on how the trade policy would influence individual's future, in forms of predicted income. This study takes past accumulation of wealth, as housing value, into account, thus being very valuable. Scheve and Slaughter work combines 1992 NES survey data with data on average wages, tariffs, trade flows, and county manufacturing activity.

Another interesting finding is revealed when researchers use education level of individual as proxy variable to distinct high skill worker from low skill worker. Surprisingly, according to Hainmueller and Hiscox (2006), impact of education on attitudes toward trade is almost identical among respondents in the active labor force and those who are not. They further discover that while

individuals with college-level educations are far more likely to favor trade openness than others, other types of education have no significant effects on attitudes, and actually reduce the support for trade. Their findings are based on NES data and ISSP data. Also, Mansfield and Mutz (2009) find strong evidence that trade attitudes are quided less by material self-interest than by perception of how the U.S. economy as a whole is affected by trade from a communication perspective. The above two studies suggest that people's general feelings, or exposure to economics ideas may also affects people's feelings about international trade.

#### References

- Beaulieu, E., 1996. Who supported the Canada–U.S. free trade agreement: factor or industry cleavages in trade policy? Unpublished manuscript.
- Beaulieu, E., 1998. Factor or industry cleavages in trade policy? An empirical test of the Stolper–Samuelson theorem. Unpublished manuscript.
- Blaug, M., 1992. *The methodology of economics*, or, *How economists explain*. Cambridge University Press. p. 190. ISBN 0-521-43678-8.
- Hainmueller, J., Hiscox, M. 2006. *Learning to love globalization: Education and individual attitudes toward international trade*. International Organization, 60(02), 469-498.
- Irwin, D., 1994. *The political economy of free trade: voting in the British general election of 1906*. Journal of Law and Economics 37, 75–108.
- Irwin, D., 1996. Industry or class cleavages over trade policy? Evidence from the British general election of 1923. In: Feenstra, R., Grossman, G., Irwin, D. (Eds.), The Political Economy of Trade Policy: Papers in Honor of Jagdish Bhagwati. MIT Press, Cambridge, pp. 53–75.
- Mansfield, E., Mutz, D., 2009. Support for free trade: Self-interest, sociotropic politics, and out-group anxiety. International Organization, 63(03), 425-457.
- Kaempfer, W., Marks, S., 1993. The expected effects of trade liberalization: evidence from US congressional action on fast-track authority. The World Economy 16, 725–740.
- Krugman, P., Obstfeld, M., Melitz, M., 2015. "International Economics". Theory and policy. Pearson

Scheve, K. F., & Slaughter, M. J. 2001. What determines individual trade-policy preferences?. Journal of International Economics, 54(2), 267-292.