

# The impact of travel restrictions on trade during the COVID-19 pandemic

Bengt Söderlund 04 November 2020

*Strict travel restrictions are preventing business partners from different countries from meeting in person. This column explores the effect of business travelling time on trade using data from the liberalisation of Soviet air space in 1985, which radically reduced flight times between Europe and East Asia. The findings reveal that travelling time can account for most of the trade frictions that cause bilateral trade to sharply decline with geographical distance, suggesting that the current travel restrictions could have large negative effects on trade.*

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Global trade has taken a great hit in the wake of the current pandemic. In the second quarter of this year, global merchandise trade saw the sharpest quarter-on-quarter decline ever recorded, falling by 14.3% compared to the previous period. The WTO forecasts a 9.2% annual decline in merchandise trade for 2020 (WTO 2020). Much focus has been directed towards the initial breakdown of supply chains as well as issues related to the distribution of food and medical supplies.<sup>1</sup> The breakdown of many supply chains has also served as a reminder of how dependent countries are on trade, and especially of how important China is as a supplier of inputs to the rest of the world.

One aspect that has received less attention is how current travel restrictions have impacted trade by making it hard for business partners in different countries to meet in person. While a large fraction of the labour force has managed to transition to work from home and firms seem to maintain business relationships, empirical evidence points to the fact that in-person meetings are important to facilitate trade.

A driving force behind the interest in understanding face-to-face communication and trade is that economists have not been able to explain why geographical distance still has a large negative impact on bilateral trade. Baldwin (2016) argues that, while globalisation has reduced the cost of transmitting information and shipping goods, the cost of moving people has been largely unchanged.<sup>2</sup> Even if the prices of airfares have declined, it is arguably the time and inconvenience of transporting personnel that account for the major share of the cost of business travel. If meeting face-to-face is important for international trade, the cost of moving people can provide an explanation for why the impact of distance has been so persistent during recent decades despite intense globalisation.

While this hypothesis is plausible, causal evidence on the impact of business travel cost on trade is surprisingly scarce. The work of Startz (2018) is an important exception. Investigating transaction data of Nigerian traders, she finds that high costs of travel to meet foreign suppliers lower trade by making it more difficult to gather information and overcome problems of moral hazard.<sup>3</sup>

Using a unique historical event that exogenously changed travel time, I add to this literature by estimating the impact of business travel time on trade (Söderlund 2020). The event was the liberalisation of the Soviet airspace in 1985, which allowed airlines to fly non-stop over the Soviet Union. The liberalisation radically reduced flight time between Europe and East Asia and was followed by a substantial increase in trade between the two regions. I find that travel time can account for most of the trade frictions that cause bilateral trade to sharply decline with geographical

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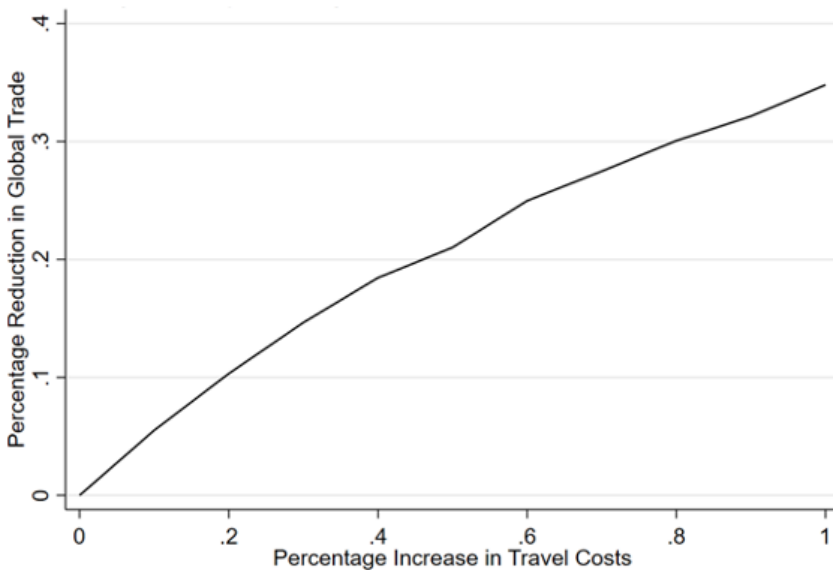
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Having estimated the elasticity of business travel time on trade, I analyse counterfactual scenarios when travel is restricted between any groups of countries. Admittedly, the travel restrictions imposed during the current pandemic are absolute rather than a marginal increase in the business travel cost. Yet, having an approximate understanding of how trade may respond when the movement of people is heavily restricted is important.

I follow the framework provided by Head and Mayer (2014) to estimate the general equilibrium effect of higher travel costs on trade.<sup>4</sup> Using the CEPII Trade and Production data along with the business travel cost elasticity from my study, I model the impact of travel restrictions as an equal percentage increase in business travel time between all countries of the world.<sup>5</sup> I assume no domestic travel restrictions.

Figure 1 shows how much global trade decreases when the cost of business travel increases. The horizontal axis depicts the uniform percentage increase in business travel time. Hence, we see that a 50% increase in business travel time between all countries of the world would cause a decline in trade by approximately 20%.

**Figure 1** Impact of higher business travel costs on global trade



This analysis contains a number of caveats. First, as mentioned previously, under the current COVID-19 pandemic the travel restrictions between most countries are absolute; however, in this analysis, I model them as an increase in business travel costs. Second, the analysis captures the general equilibrium effect. Meanwhile, current travel restrictions are temporary, even though it is unclear for how long they will last. Firms that would have terminated certain long-distance business relationships had travel restrictions become permanent may maintain the same relationship in the short term. Third, the travel restrictions are not uniform, and some countries have imposed domestic travel restrictions as well.

Nonetheless, this analysis indicates that travel restrictions may have a large impact on global trade. It is currently unclear how businesses are responding to the lack of face-to-face interaction with foreign business partners. The impact of the travel restrictions will depend on the ability of firms to sustain business relationships without meeting in person and the ability of firms to substitute foreign suppliers for domestic ones.

If the negative impact of travel restrictions on trade is large, one policy response would be to allow exceptions for key personnel at firms that trade large values of goods and services. The coming months will show how firms worldwide respond to being restricted to remote communication with many of their foreign business partners.

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## Endnotes

1 See Baldwin and Evenett (2020) and Baldwin and Weder di Mauro (2020) for an overview of issues related to the trade impact of the COVID-19 pandemic.

2 Similar arguments have been put forward by several scholars, see for instance Leamer and Storper (2014), and Storper and Venables (2004).

3 There are a number of studies that have analysed the correlation between trade and travel. See for instance Kulendran and Wilson (2000), Shan and Wilson (2001), Cristea (2011), Alderighi and Gaggero (2017), and Yilmazkuday and Yilmazkuday (2017). There is also a stream of papers that examine the relationship between travel and other forms of economic exchange, such as FDI. See Söderlund (2020) for an extended review of the literature.

4 Head and Mayer (2014) provide a method to compute the general equilibrium trade impact (GETI) of trade shocks in a gravity model framework. See Appendix A.11 in Söderlund (2020) for further details.

5 I need to use both production and trade data, as the method to calculate the general trade impact requires information on domestic expenditures. Domestic expenditures are computed as the difference between total manufacturing production and total manufacturing exports. I use data from 2006, which is the latest available year. The data covers trade and production for 71 countries. The CEPII Trade and Production data is developed by de Sousa et al. (2012).

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