# Trade and Cooperation in an Age of Insecurity

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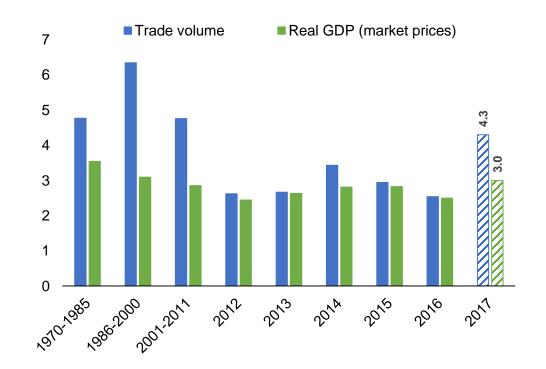
G-24 Technical Group Meeting, Colombo, 27-28 February 2018

### Three questions

- What is happening to global trade and why do we care?
- Trade growth has slowed down and that may be hurting productivity
- What is happening to trade agreements?
- Trade agreements are becoming deeper and less trade diverting
- How do we address the backlash against globalization?
- The political economy of trade is changing and requires a new paradigm of international cooperation

## The relationship between world trade and income has changed in recent decades

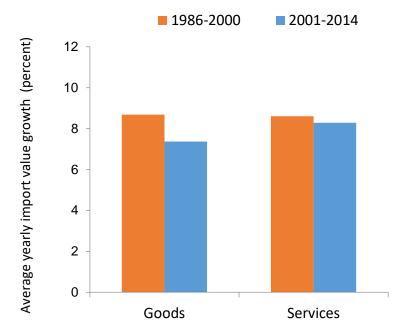
Average growth rates across selected periods and years (percent)



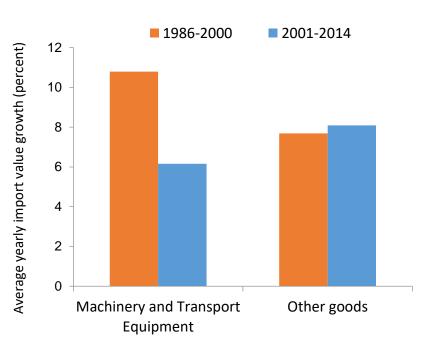
*Sources:* World Bank World Development Indicators, World Bank Global Economic Prospects Jan. 2018 for the 2017 estimates, and authors' calculations.

Note: Trade growth is the average of import and export growth rates.

## The global trade slowdown is attributable not to services or commodities, but to manufacturing



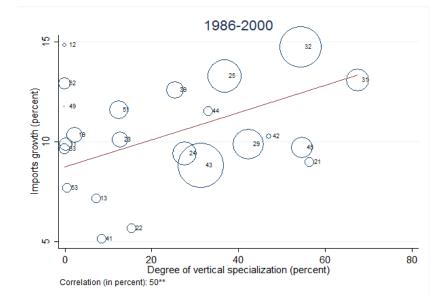
The rapid growth in world trade in the long 1990s and the subsequent slowdown in the 2000s was driven by goods rather than services

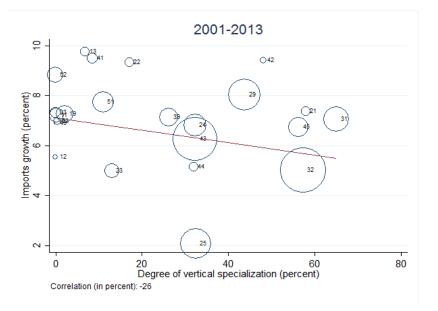


Within goods, the significant deceleration of trade growth was in the manufacturing sector

Source: UN Comtrade, WTO Trade in commercial services database.

## Within manufacturing, trade growth declined more in subsectors with greater vertical specialization



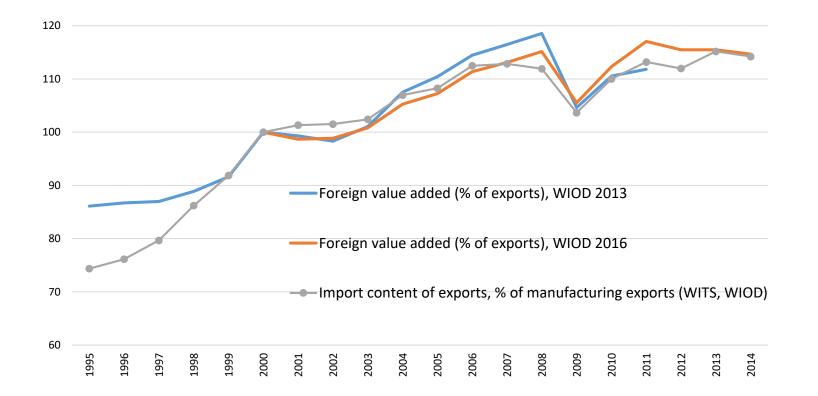


In the long 1990s, trade in the most vertically specialized sub-sectors saw much faster rates of growth In the 2000s, the largest declines in trade growth were in the subsectors with higher degrees of vertical specialization.

Source: Source: Constantinescu, Mattoo and Ruta (2016), drawing on UN Comtrade, via WITS (ISIC2 classification). Notes: \*\*\* indicates a significance level of 1%, \*\* of 5% and \* of 10%. Charts display sub-sectors of "Manufacturing of Fabricated Metal Products, Machinery and Equipment" (division 38 in ISIC2). Vertical specialization is the share of parts and components in a sub-sector's trade. The size of the bubbles denotes sub-sector's share in trade of ISIC2 division 38.

#### Maturation of Global Value Chains

Measures of world vertical specialization, 1995-2014 (percent)

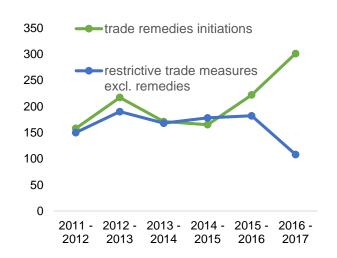


Source: World Input-Output Database (2013 and 2016 releases), UN Comtrade (WITS), authors' calculations Notes: The measures of vertical specialization based on WIOD 2013 and 2016 data are shares of foreign value added in gross exports of goods and services. The third measure relies on manufacturing trade data from the UN Comtrade (obtained via WITS) and output data from WIOD.

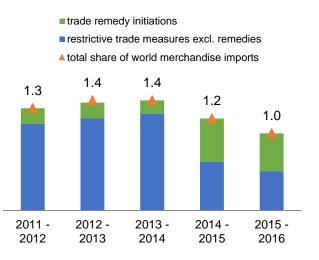
#### Rising protectionist rhetoric is so far not reflected in rising protection

### Share of trade covered by import-restrictive measures in world merchandise imports, percent

a. Number of trade restrictive measures including trade remedies



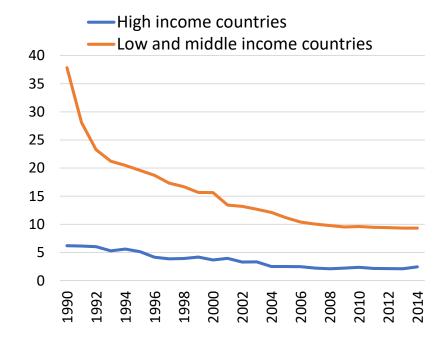
b. Share of trade restrictive measures, including remedies, in world merchandise imports, percent



Source: World Trade Organization, various issues of the "Overview of development in international trading environment."

## But declining pace of trade liberalization may have played a role in the trade slowdown

Average applied tariffs in advanced economies and emerging and developing economies (percent)



Faster trade liberalization in the 1990s relative to the 2000s

--High income countries

Imports of Goods and Services

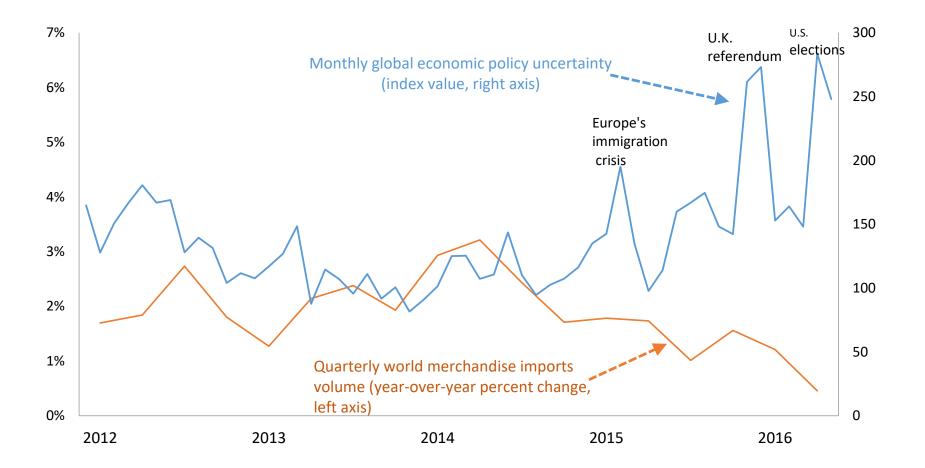
(percent of GDP in US dollars)

The liberalization led to a significant increase in the ratio of imports to GDP

Source: UNCTAD TRAINS. World Bank World Development Indicators. \*Simple averages of MFN Applied and Preferential tariffs. Note: The data for tariffs does not pertain to a consistent sample of countries over time.

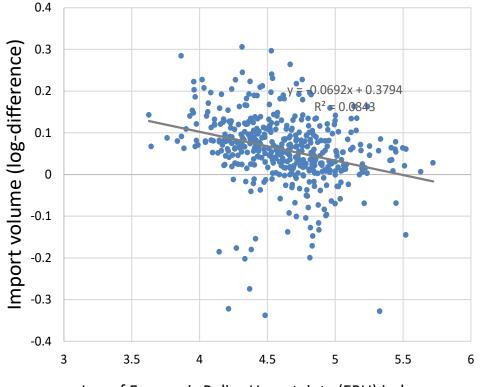
## And the recent rise in policy uncertainty may have contributed to slowing trade

World import growth and policy uncertainty, from mid-2012 to 2016



Source: CPB Netherlands Bureau of Economic Policy Analysis, www.PolicyUncertainty.com - Baker, Bloom and Davis (forthcoming), and staff calculations.

# Some evidence that economic policy uncertainty hurt trade growth



Log of Economic Policy Uncertainty (EPU) index

Using new data on policy uncertainty for 18 countries and over 20 years, we find a 1 percent increase in uncertainty is associated with a 0.02–percentage point reduction in trade volume growth.

Based on these estimates, the increase in economic policy uncertainty in 2016 may have caused a 0.6 percentage point decrease in trade growth.

Source: Constantinescu, Mattoo and Ruta (2017), Policy Uncertainty and the Global Trade Slowdown, World Bank.

## The trade slowdown may have an impact on countries' growth

On the demand side (Keynes):

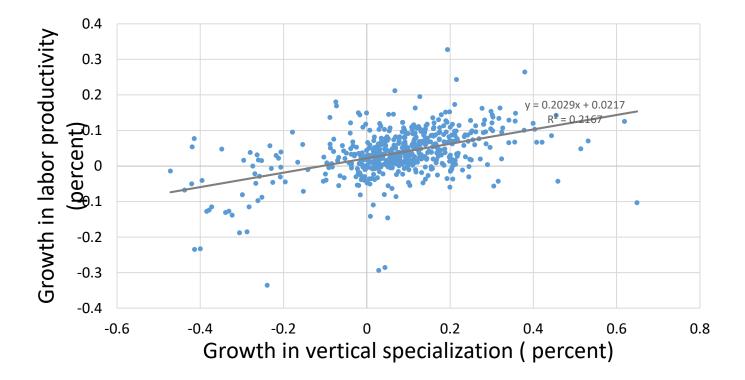
- Sluggish world imports may reduce opportunities for individual countries' exports
- However, the elasticity of world value-added exports to world GDP has been more stable ...

On the supply side (Smith):

- Slower trade growth diminishes the scope for productivity growth through specialization and diffusion of technologies. In particular, a slower pace of GVC expansion may imply diminishing scope for productivity growth through a more efficient international division of labor and knowledge spillovers
- However, trade to GDP ratio remains historically high and openness may continue to deliver benefits. Also fragmentation within countries, often FDI-driven, could sustain productivity.

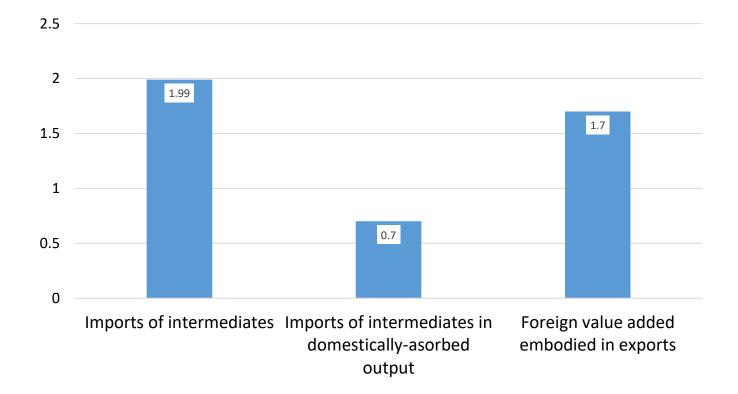
## Association between vertical specialization and labor productivity

### Manufacturing industries: vertical specialization and labor productivity, 1995-2009



Source: Constantinescu, Mattoo and Ruta (2017) based on data from the 2013 Release of the World Input-Output Database (WIOD 2013) (Timmer et al. 2015). Notes: Each dot represents a country–year combination. Labor productivity is computed as the real value added divided by the number of persons employed. Vertical specialization in manufacturing for each country and year includes the foreign value added embodied in exports (backward linkages) as well as the domestic value added embodied in exports that the direct importer exports further or that returns home as imports (forward linkages).

## Implied effect of a 10 percent increase in intermediate import volumes on labor productivity

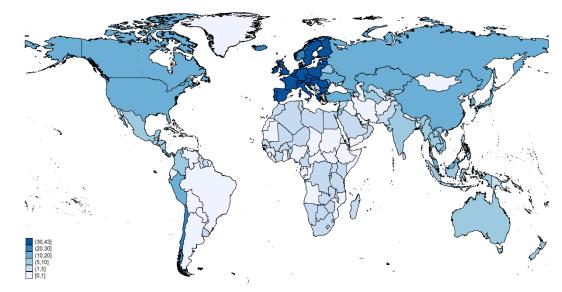


Source: Constantinescu, Mattoo and Ruta (2017) based on data from the 2013 Release of the World Input-Output Database (WIOD 2013) (Timmer et al. 2015). Notes: Based on panel regressions of log of real value added per employee, by industry, country, and year, on log of real capital stock per employee, log of price-deflated trade indicators (lagged 1 year), and fixed effects. Robust standard errors corrected for clustering at country-industry level are used. The coefficient reported for foreign value added embodied in exports is an instrumental variable (IV) estimate.

#### WHAT IS HAPPENING TO TRADE AGREEMENTS?

Trade agreements are growing in number and participation

- On average, each country participates in 14 agreements
- New agreements are currently under discussion, negotiation, or enlargement in all world areas
- Africa: e.g. African Continental Free Trade Area (CFTA)
- Latin America: e.g. Pacific Alliance, Comprehensive and Progressive Agreement for Trans-Pacific Partnership (TPP)



- East Asia: e.g. Regional Comprehensive Economic Partnership (RCEP), Belt & Road
- Central Asia: e.g. Eurasian Economic Union, Belt & Road
- Middle East: e.g. Gulf Cooperation Council (GCC),
- South Asia: e.g. South Asia Free Trade Area (SAFTA), RCEP, Belt & Road

### Preferential liberalization has reduced trade-weighted average tariffs rates to less than 5 percent for two-thirds of countries



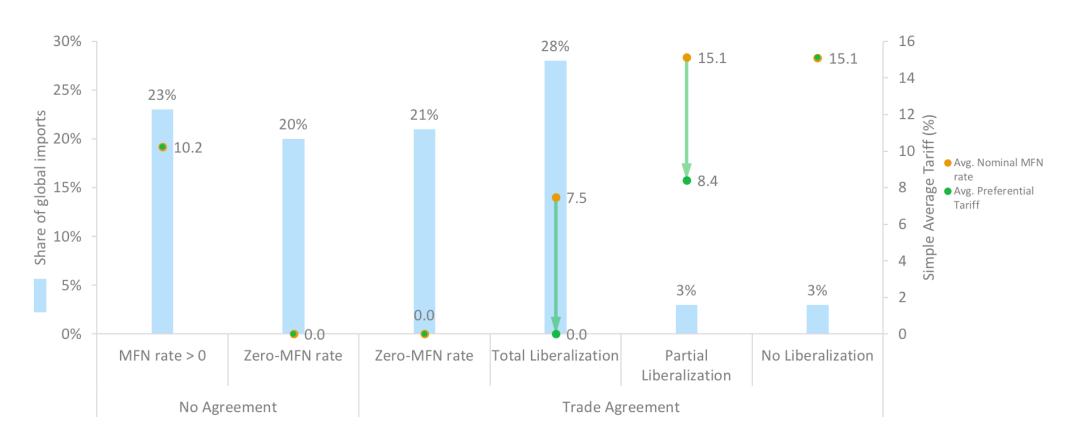
Source: Espitia, Mattoo, Mimouni, Pichot and Rocha (2018)

#### Tariffs have been reduced across sectors but are still high for agricultural products



Source: Espitia, Mattoo, Mimouni, Pichot and Rocha (2018)

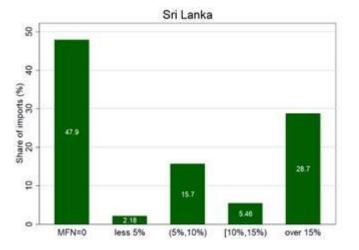
#### More than a quarter of world trade is subject to an average preference margin of 7.5 percent



Source: Espitia, Mattoo, Mimouni, Pichot and Rocha (2018)

#### An example: Sri Lanka and Preferential Trade

Half of Sri Lanka's imports by value are subject to MFN rates of less than 5 percent



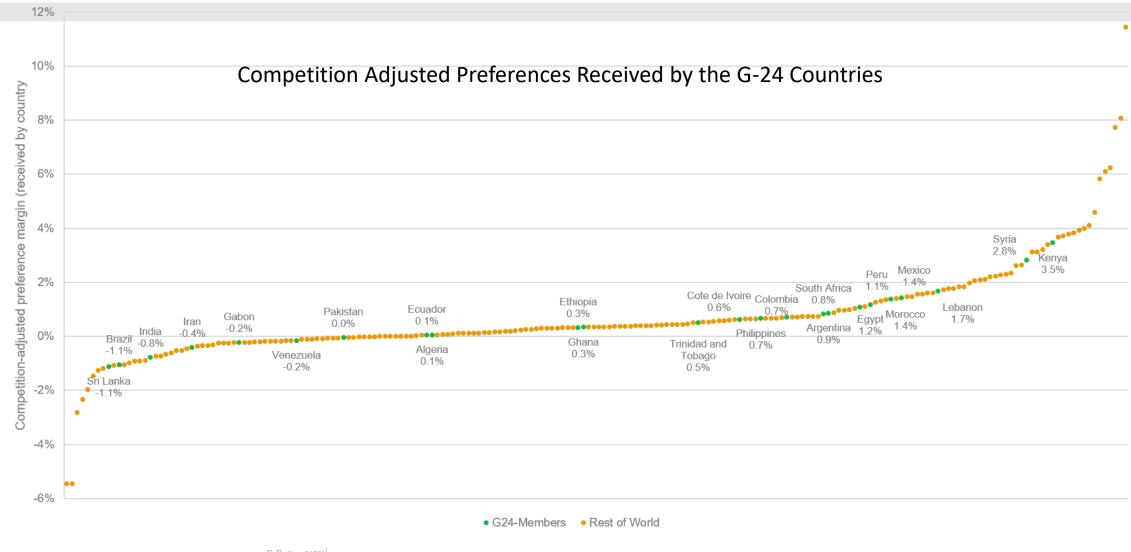
### More than half of Sri Lanka's imports are under a trade agreement



### Only about one-tenth of Sri Lanka's imports is subject to a significant preferential margin



#### But the competition adjusted preference margins are typically low



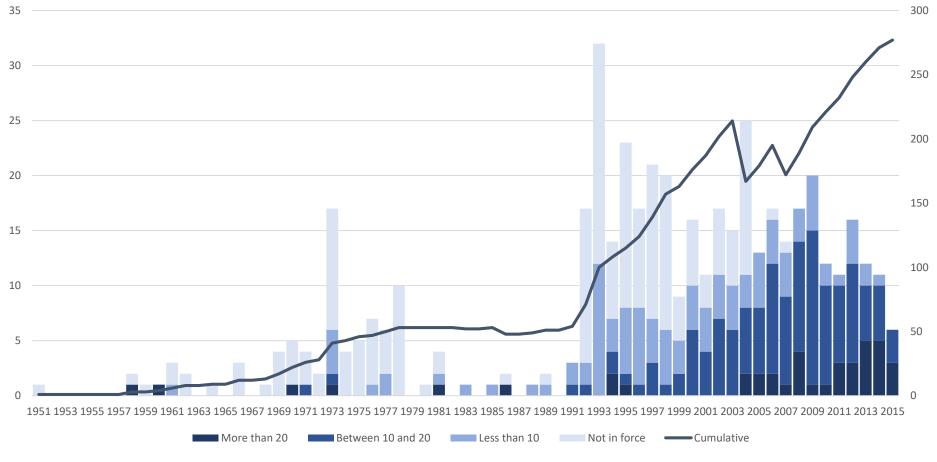
Note: Competition-adjusted preference margin for country j =  $\frac{\sum_i \sum_k x_{jk,i} CAPM_{k,i}^j}{\sum_i \sum_k x_{jk,i}}$  is the export-weighted (X in the formula denotes exports of j into k) average competition-adjusted preference margin imposed to country's j on all exports by all countries

#### A strong trend towards "deep" agreements

	No of areas covered in the agreement		
	<10	10-20	>20
Tariffs on manufacturing goods	~	~	$\checkmark$
Tariffs on agricultural goods	$\checkmark$	$\checkmark$	$\checkmark$
Export taxes	$\checkmark$	$\checkmark$	$\checkmark$
Customs	$\checkmark$	$\checkmark$	$\checkmark$
Competition policy	×	$\checkmark$	$\checkmark$
State aid	×	$\checkmark$	$\checkmark$
Anti-dumping	×	$\checkmark$	$\checkmark$
Countervailing measures	×	$\checkmark$	$\checkmark$
TRIPS	×	$\checkmark$	$\checkmark$
STE	×	$\checkmark$	$\checkmark$
ТВТ	×	$\checkmark$	$\checkmark$
GATS	×	$\checkmark$	$\checkmark$
SPS	×	$\checkmark$	$\checkmark$
Movement of capital	×	$\checkmark$	$\checkmark$
Public procurement	×	×	$\checkmark$
IPR	×	*	$\checkmark$
Investment	×	*	$\checkmark$
Environmental laws	×	×	$\checkmark$
Labor market regulations	×	×	$\checkmark$
TRIMS	×	×	<b>v</b>

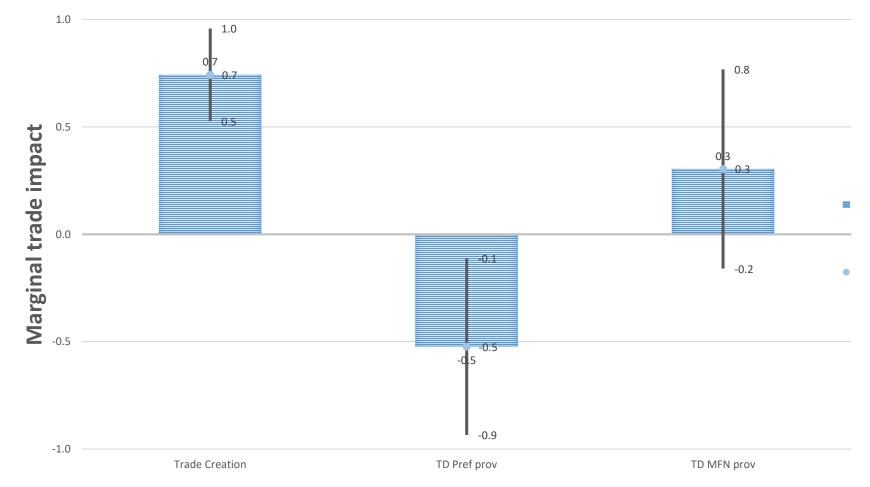
- Go beyond tariffs: cover measures affecting goods and services trade, investment, competition, business environment, etc.
- Along with the multilateral trading system, define the rules in which economies operate, integrate and grow

#### How are trade agreements changing? Number and policy areas covered

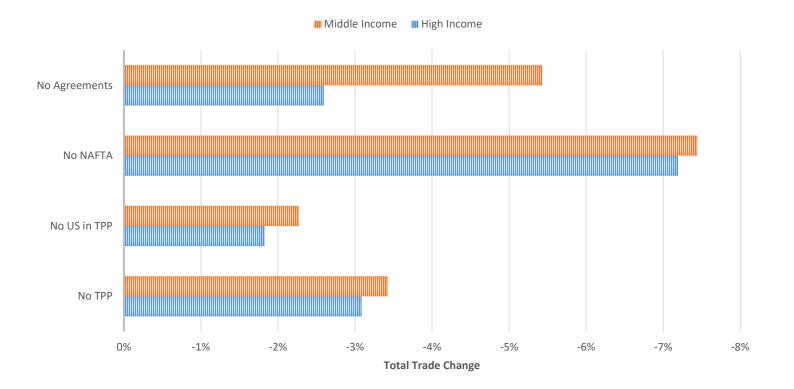


Source: Hofmann, Osnago and Ruta (2017)

## Deep agreements: Good for participants, a mixed blessing for outsiders



## Unraveling trade agreements: Bad news for the US, Worse for everyone else



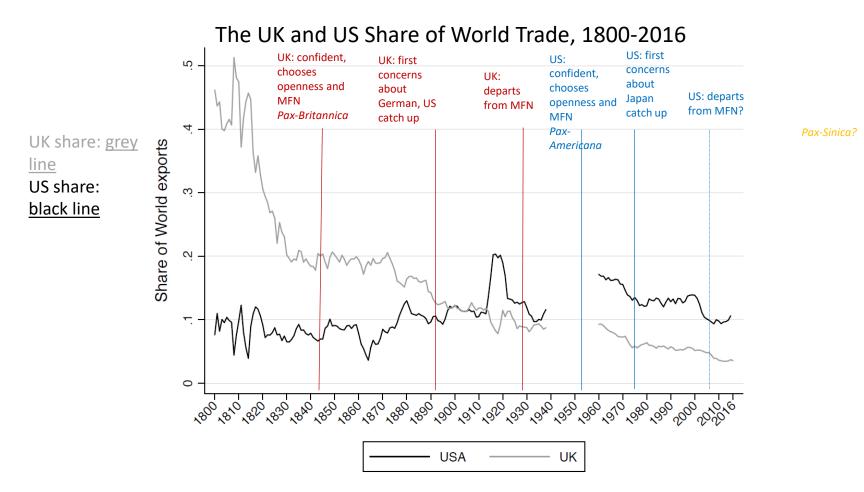
Source: Mattoo, Mulabdic and Ruta (2016), "Trade Creation and Trade Diversion in Deep Agreements."

## HOW SHOULD WE ADDRESS THE BACKLASH AGAINST GLOBALIZATION?

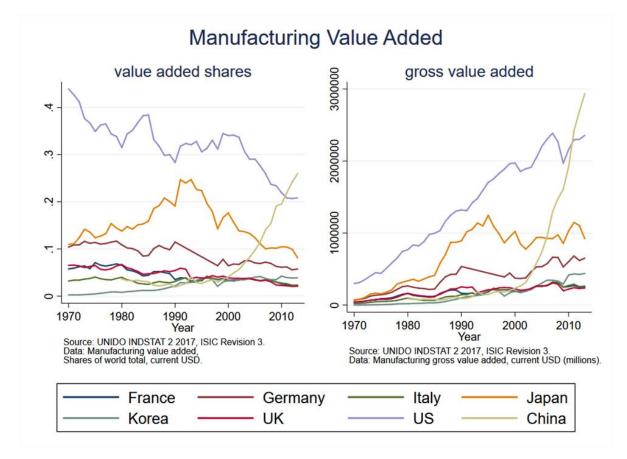
### The Argument

- The threat to multilateralism may be a historical inevitability
- Changes in global relative dominance are changing national political economy of trade policy and international cooperation
- Key nation states are now more responsive to internationally immobile labor and consumer interests
- To sustain openness, the emphasis of international cooperation must shift away from reciprocal liberalization and towards:
  - Tax cooperation to shield immobile labor from the pain of globalization
  - Regulatory cooperation to shield immobile consumers from international market failure
  - Destination-based taxation and regulatory commitments may be a solution

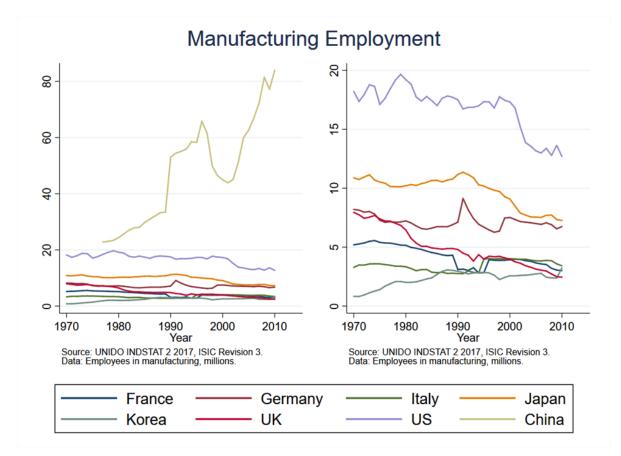
"The country that is more developed industrially shows to the less developed the image of their future." Shifts in trade shares and changes in policy stance



# Significant reversal of fortune in the share of manufacturing

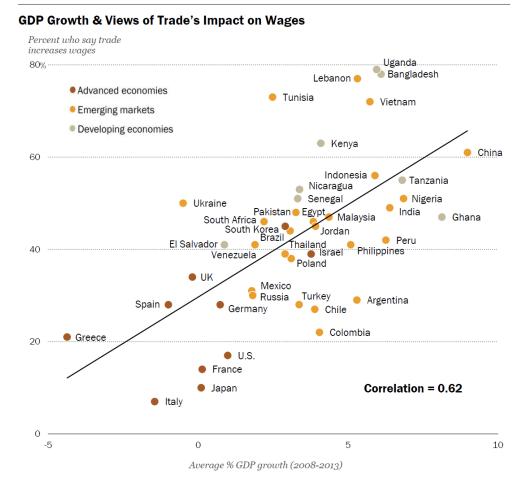


### Leading to declines in absolute employment



Is manufacturing the new agriculture?

Contrasting attitudes to trade in the relatively stagnant North and the relatively dynamic South: A growing pie dilutes inequality aversion



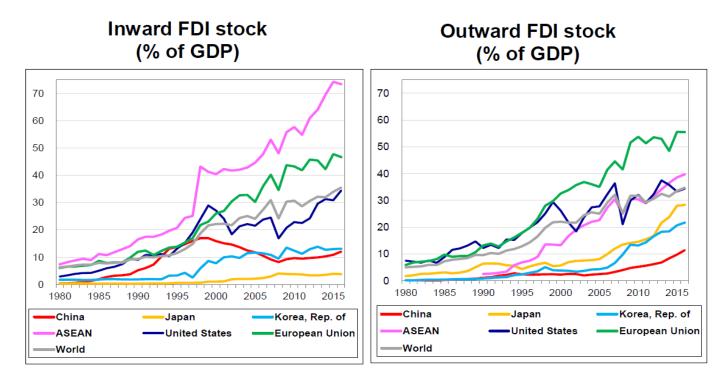
Source: Spring 2014 Global Attitudes survey. Q28. GDP annual growth from IMF, World Economic Outlook Database, April 2014, accessed 4 September 2014. Data not available for Palestinian territories.

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The conventional view of what drives trade policy and trade negotiations

- The classical view of the **political economy of trade policy** (Mancur Olsen, etc.): policy makers attach a disproportionately high weight to the concentrated interests of producers rather than to the diffuse interests of consumers.
- Accordingly, the **view of trade negotiations** (Bagwell and Staiger, etc.): as a means of harnessing the power of concentrated exporter interests seeking better access to markets abroad to countervail the power of domestic import-competing interests, with consumers the incidental beneficiaries of the resulting liberalization.

# But the world is changing: the fragmentation of ownership **Inward and outward FDI stock**

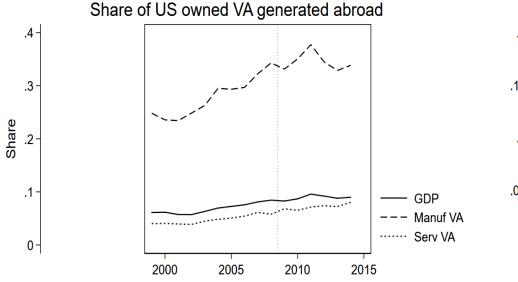


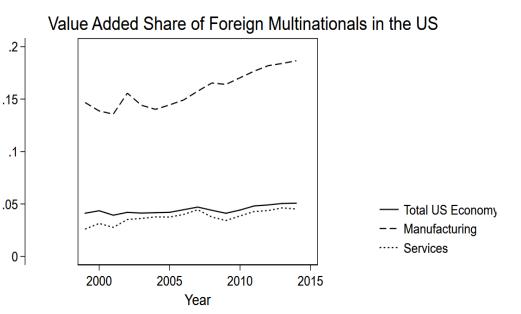
*Source*: World Bank, World Development Indicators dataset: https://data.worldbank.org/data-catalog/world-development-indicators

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The emergence of multinationals with both production and ownership spread out over multiple countries have weakened the link between producer interests and individual nation states (see e.g. Blanchard).

### Fragmentation of Ownership: A Large and Growing Share of Output is Produced by US Firms Outside the US, and foreign firms in the US





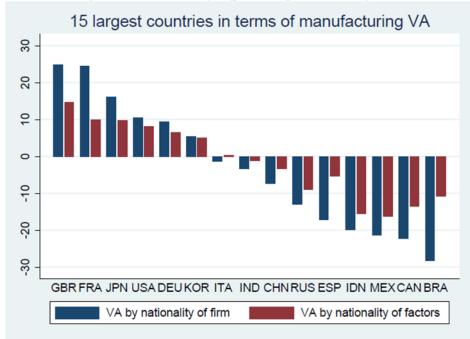
This graph plots the share of value added by US-owned firms generated abroad in total US-owned production by sector of activity. Note: there is a break in the series of US-owned affiliates. From 2009, they include bank affiliates as well.

Source: BEA, own calculations. Services consist of utilities; wholesale trade; retail trade; transportation and warehousing; information; finance, insurance, real estate, rental, and leasing; professional and business services; educational services, health care, and social assistance; arts, entertainment, recreation, accommodation, and food services; and other services, except government.

The graph plots the contribution of foreign MNE VA to the total VA generated in the US. Source: BEA, own calculations. Services consist of utilities; wholesale trade; retail trade; transportation and warehousing; information; finance, insurance, real estate, rental, and leasing; professional and business services; educational services, health care, and social assistance; arts, entertainment, recreation, accommodation, and food services; and other services, except government.

# Fragmentation of ownership: a global phenomenon

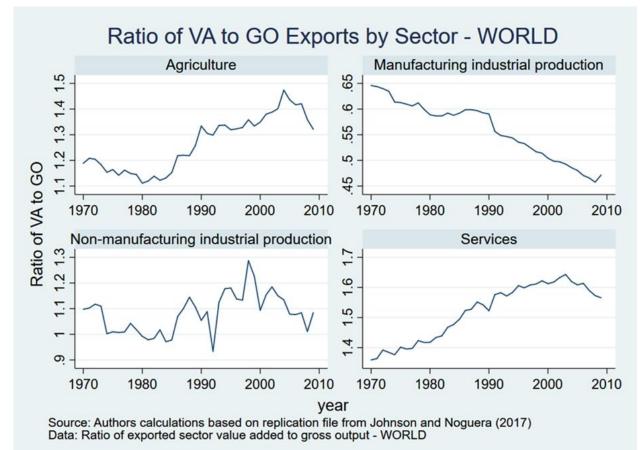
Figure 1: How does value added by nationality of firm (or factors) differ from value added by location of activity? (percentage differences)



Source: Author's estimates. The histograms represent the percentage difference between value added by nationality of firm (or factors involved in production) and value added by location of activity for each country's manufacturing sector in 2011. For instance, for the U.K. the value added by nationality of firm is about 25 per cent larger than the value added by location of activity, while the value added by nationality of factors is 15 per cent larger than the value added by location of activity. The graph includes the 15 largest countries in terms of manufacturing value added by location of activity. Value added is measured at current prices and exchange rates.

Source: Federico (2015)

### The fragmentation of production for trade

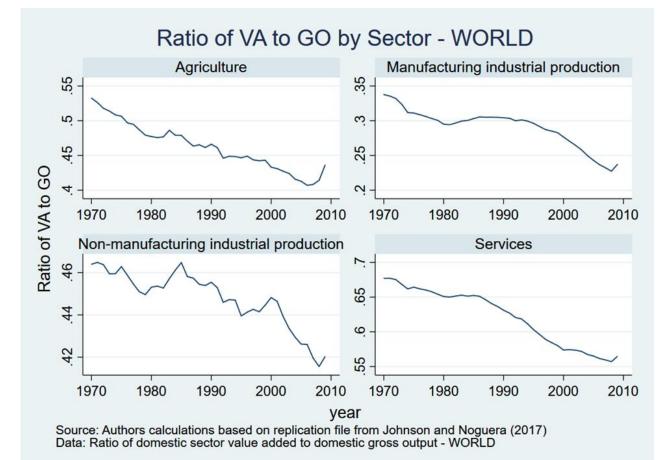


Ratio of Value-Added to Gross Exports for the World

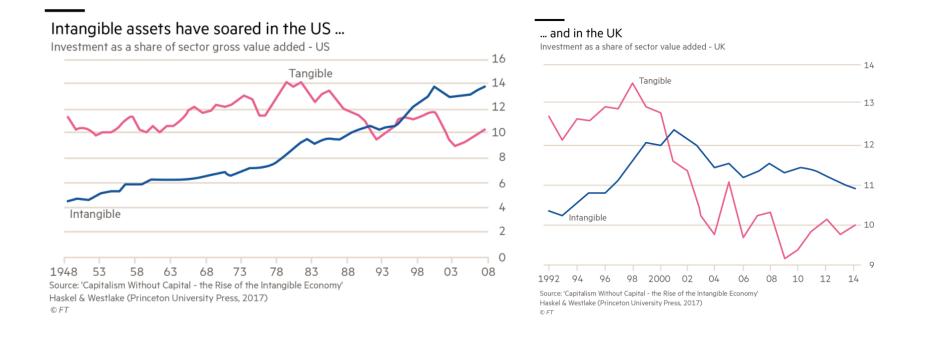
The fragmentation of production across countries has also changed producer perspectives on protection (see e.g. Blanchard, Bown and Johnson, 2016)

### The fragmentation of total production

Ratio of Domestic Value-Added to Gross Output for the World



### In parallel, the growth of "intangibles"



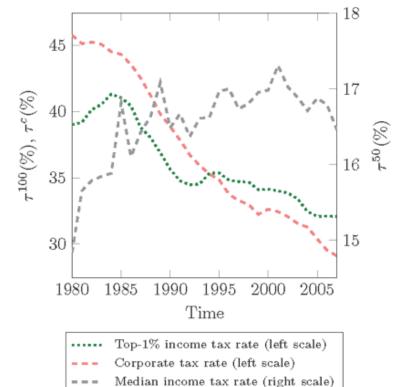
#### Skill intensive and footloose?

# Changing constituencies: The growing political influence of immobile labor

- The increased international mobility of capital and skilled labor means that "nationals" in nation states are a class of relatively immobile workers who have increasing say:
- Not just the populists; but also the mainstream (a bipartisan aversion to trade liberalization)
- Anti-dumping actions brought by workers and government rather than industries; and sometimes by foreign firms!
- Threats to act against "undervalued" exchange rates which hurt immobile labor rather than MNEs with internationally fragmented production (and would leave them vulnerable to retaliatory action);
- Ironically, immobile labor is bearing an increasing burden of taxation instead of receiving compensation for adjustment pain inflicted by trade and technology

### Impact of globalization on tax structures

Corporate tax rates and personal labor income tax rates for top 1% and median workers in 65 economies over 1980-2007



In 1994-2007, middle-income workers experienced a globalization-induced rise in their personal income tax rate of around 1.5, whereas the top 1% of workers faced a reduction of approximately 1.5 percentage points.

Source: Peter Egger, Sergey Nigai, Nora Strecker (2016).

### Regulatory externalities in taxation

- Tax competition between jurisdictions is leading to base erosion in jurisdictions with higher tax rates, and lower tax rates through tax competition
- Profit shifting through transfer pricing implies low revealed profits in high tax jurisdictions – a particularly acute problem in new platform services
- Indirect taxes can be adjusted at the border, direct taxes cannot be.

### Routes to international tax cooperation

- OECD initiatives to deal with base-erosion and profit shifting
- But strong resistance to the idea of fiscal harmonization
- Destination-based taxation? Not just US Congress but increasingly favored within the EU to deal with new services.

### International market failure in the age of insecurity

In an integrated world economy, consumers of goods and especially services are vulnerable to regulatory externalities – regulatory action or inaction in one state can impose costs on consumers in another state.

- Health and safety standards
- Digital trade and informational security
- Financial internationalization and financial security
- Labor mobility and security
- Demographic change and health and old-age security

National regulators are concerned only about the impact on consumers inside their jurisdiction – that is their mandate.

Conventional negotiations focusing on reciprocal liberalization ignore these concerns and cannot deal with them

### The issue of regulatory jurisdiction

- Two situations:
- How I regulate goods and services produced in my jurisdiction: I will only consider the impact on consumers, the environment, etc. in my jurisdiction and not the impact on consumers, etc. outside my jurisdiction. In my power, but not my concern.
- How I regulate goods and services consumed in my jurisdiction: I want all firms domestic and foreign firms to adhere to my rules when they supply goods or services in my jurisdiction. My concern, but not in my power.
- Harmonization and mutual recognition are not solutions.

### Conventional vs Proposed Approach

*Conventional approach*: negotiations about exchange of market access commitments by importers Supplemented by efforts to harmonize, mutually recognize



#### But for services to be global, regulation cannot be national

Inability to protect consumers leads to:

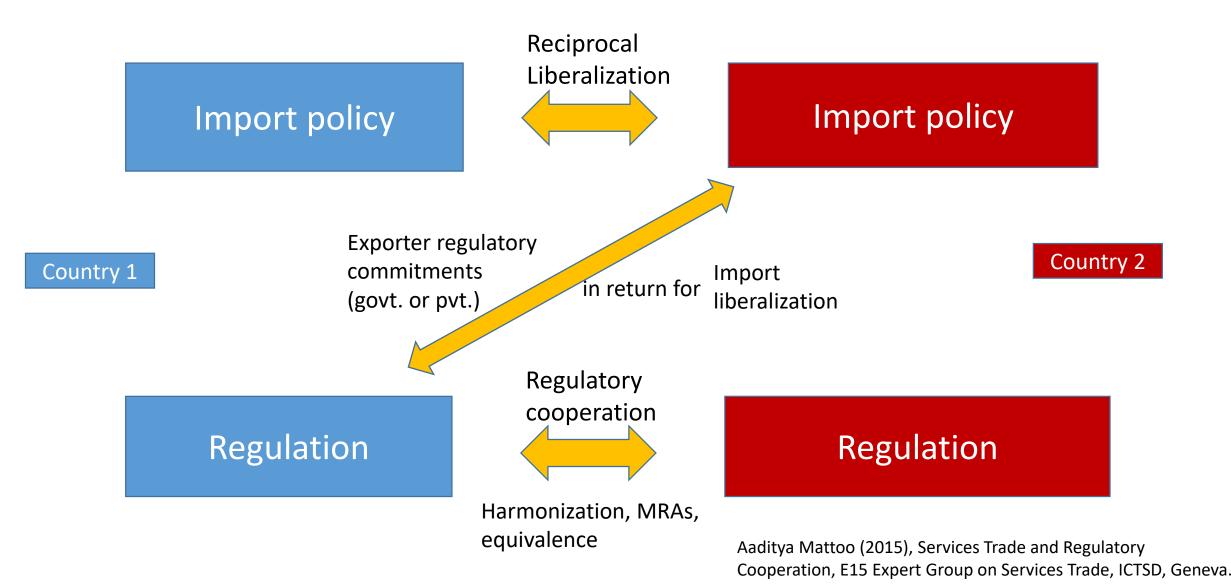
- protection (esp on modes 1 and 2) or
- burdensome requirements (esp on modes 3 and 4).



The Costs of Data Localisation: A Friendly Fire on Economic Recovery

*Needed*: a mechanism to protect consumers from international market failure *Proposed*: *destination-based regulatory commitments* by exporters to protect foreign consumer interests in return for market access commitments by importers

# How the proposed approach is different



## How exporting country regulatory commitments work: data flows

### The problem



### The necessary bargain

Exporting country commitments to adhere to importer standards of privacy in return for free data flows

### Examples

•*Standalone agreement*: EU-US Safe Harbor Agreement; renegotiated as EU-US privacy shield;

•*Trade agreement*: TPP provisions on data flows matched by provisions on protecting privacy and preventing fraud



# How destination-based regulatory commitments work: financial services



Dodd-Frank ends capital exemptions for European banks

The problem

Financial crisis: Banks reduce credit supply in emerging Europe The necessary bargain

Exporting country commitments to protect interests of foreign consumers, financial stability, and avoid "financial nationalism", etc. in return for market opening

Examples

- EU efforts to preserve the internal financial market EU-US markets
- EU-US discussions under the TTIP
- Vienna Initiative, for macroeconomic stability in emerging Europe



How destination-based regulatory commitments work: labor flows

The necessary bargain

Source country commitments to certify character and qualifications, facilitate repatriation, combat illegal migration in return for freer labor mobility

Examples

- Bilateral labor agreements between Spain-Ecuador; Korea-Philippines;
- APEC Business Travel Card



# How destination-based regulatory commitments work: competition policy

#### The problem



Rigging of Foreign Exchange Market Makes Felons of Top Banks

EU, US exemptions from competition policy for export cartels

#### The necessary bargain

Exporting countries to enforce competition rules to protect interests of foreign consumers in return for market opening

Examples

- EU-US cooperation on price rigging by financial institutions,
- EU-US action on collusive arrangements in air and maritime transport;
- APEC initiatives on competition policy;

Airlines Come Under EU-US Cargo Cartel Probe

European Commission - Press d release Competition: EU and US celebrate 20 years of cooperation; agree to advance cooperation further