

Opening up policies, Poverty-Inequality and Development

Section 1- Opening up policies, Poverty-Inequality

Section 2 - Opening up policies, structural transformation and development

- 1) Trade structure and the development path:
 - a-Diversification away from agriculture
 - b-Sophistication

2) Opening up, institutions and development:

- a-The impact of opening up on institutions
- b-What accompanying measures to ensure that opening up is inclusive?

2) Opening up, institutions and development: The impact of opening up on institutions

What are institutions?

Economists call institutions the rules and conventions that people follow in their daily lives. They are the rules of the game in economic, political and social interactions.

Main contributors: Douglass North and Daron Acemoglu.

Definition by North:

"Institutions are the rules of the game in a society or, more formally, are the humanly devised constraints that shape human interaction."

Crucial elements: institutions

- are humanly devised (contrary to exogenous factors like geography)
- shape incentives (enforcement of property rights is crucial for incentives to invest)
- ensure even playing field (equal opportunity)
- set constraints on the actions of elites

Table 1. Institutional proxies

Institutional group and measure	Source
Legal institutions	
Index of economic freedom: property rights	The Heritage Foundation and WSJ
Freedom of the press: legal environment ^a	Freedom House
Freedom in the world: civil liberties ^a	Freedom House
EFW index: judicial independence	Fraser Institute
EFW index: impartial courts	Fraser Institute
EFW index: protection of property rights	Fraser Institute
Law and order	ICRG
Religion in politics	ICRG
Rule of law	WB WGI
Political institutions	
Freedom of the press: political environment ^a	Freedom House
Freedom in the world: political rights ^a	Freedom House
Institutionalized democracy – institutionalized autocracy	Polity IV
Checks and balances	WB DPI
Democratic accountability	ICRG
Corruption	ICRG
Bureaucratic quality	ICRG
Internal conflict	ICRG
Military in politics	ICRG
Control of corruption	WB WGI
Corruption perceptions index	Transparency international
Political terror scale ^a	Political terror scale
Economic institutions	
Index of economic freedom: financial freedom	The Heritage Foundation and WSJ
Index of economic freedom: business freedom	The Heritage Foundation and WSJ
Regulatory quality	WB WGI
Freedom of the press: economic environment ^a	Freedom House
EFW index: freedom to own foreign currency bank accounts	Fraser Institute
EFW index: regulation of credit, labor, and business: credit market regulations	Fraser Institute
EFW index: regulation of credit, labor, and business: labor market regulations	Fraser Institute
EFW index: regulation of credit, labor, and business: business regulations	Fraser Institute
EFW index: foreign ownership/investment restrictions	Fraser Institute
EFW index: capital controls	Fraser Institute
Investment profile	ICRG

There are many « super » indicators but the most commonly used datasets

-International Country Risk Guide (ICRG)

-World Bank's Governance Indicators produced by Kaufmann, Kraay and Zoido-Lobaton

Also indexes built by
Transparency International
Fraser Institute
Freedom House

2) Opening up, institutions and development: The impact of opening up on institutions

What determines institutions?

Acemoglu, Johnson, and Robinson (2005): institutions are an outcome of a nexus of a political and an economic equilibrium.

-Agents that are in power determine institutions.

-Institutions in turn determine the distribution of economic resources in the economy.

-Ownership of economic resources in the economy in turn (partly) determines who is in power.

The **mutual feedback** between the distribution of political power and the distribution of economic resources occurs through, and in turn determines, institutions

This view of institutions has the ability to explain, in particular, **the long-run persistence of bad institutions**.

The long-run persistence of bad institutions.

Agents that are in power (“the elites”) use bad institutions (such as corruption, insecure property rights, expropriation, etc.) to channel economic resources to themselves: “**capture of rents**”

Their control of economic resources in turn keeps them in power, generating a **vicious circle**.

This makes it clear that opening up can impact institutions

What is needed to effect institutional change is a **large and discrete change in the distribution of economic resources in society**.

Shocks to international trade (such as opening to trade or large changes to a country’s comparative advantage) can be large enough to do that, often precipitating institutional change.

Unfortunately, it is not necessarily the case that the result is institutional **improvement rather than a deterioration**.

Two main reasons why trade opening will lead to a change in institutions

1-trade can change agents' preferences over institutions.

Even if the exact **same “elites” stay in power** following a trade shock, institutions can change if trade changes their incentives to install certain institutions.

This is because exports create benefits that those in power want to maximize.

Hence the elite may change equilibrium institutions if this helps raise the exports. This will depend on the country's comparative advantage.

Hence whether or not trade opening improves or weakens institutional quality **depends on whether the country's comparative advantage is in sectors that require good institutions.**

Andrei A. Levchenko (2013): repercussions of opening up on institutions depend on the “**institutional intensity**” of the sectors that will benefit from the opening up shock

Institutional Intensity of a sector is measured as the *share of intermediate inputs that cannot be bought on organized exchanges*

Idea: inputs sold in *spot markets* (obtained on organized exchanges) do not require contracts and thus good institutions.

inputs that cannot be bought this way require relationship-specific investments and thus rely on good contracting institutions being in place.

The higher the fraction of such inputs in an industry, the higher is its “institutional intensity”

Table A1. The Institutional Intensity Measure

ISIC	Industry Name	Institutional Intensity
311	Food products	0.331
313	Beverages	0.713
314	Tobacco	0.317
321	Textiles	0.376
322	Wearing apparel, except footwear	0.745
323	Leather products	0.571
324	Footwear, except rubber or plastic	0.650
331	Wood products, except furniture	0.516
332	Furniture, except metal	0.568
341	Paper and products	0.348
342	Printing and publishing	0.713
351	Industrial chemicals	0.240
352	Other chemicals	0.490
353	Petroleum refineries	0.058
354	Misc. petroleum and coal products	0.395
355	Rubber products	0.407
356	Plastic products	0.408
361	Pottery, china, earthenware	0.329
362	Glass and products	0.557
369	Other non-metallic mineral products	0.377
371	Iron and steel	0.242
372	Non-ferrous metals	0.160
381	Fabricated metal products	0.435
382	Machinery, except electrical	0.764
383	Machinery, electric	0.740
384	Transport equipment	0.859
385	Professional & scientific equipment	0.785
390	Other manufactured products	0.547
	Mean	0.487
	Standard Deviation	0.206

Institutional Intensity is the share of intermediate inputs that cannot be bought on organized exchanges and is not reference-priced (Nunn, 2007).

It is constructed based on US Input-Output Tables.

Andrei A. Levchenko, 2013. "International Trade and Institutional Change," *Journal of Law, Economics and Organization*, Oxford University Press, vol. 29(5), pages 1145-1181, October

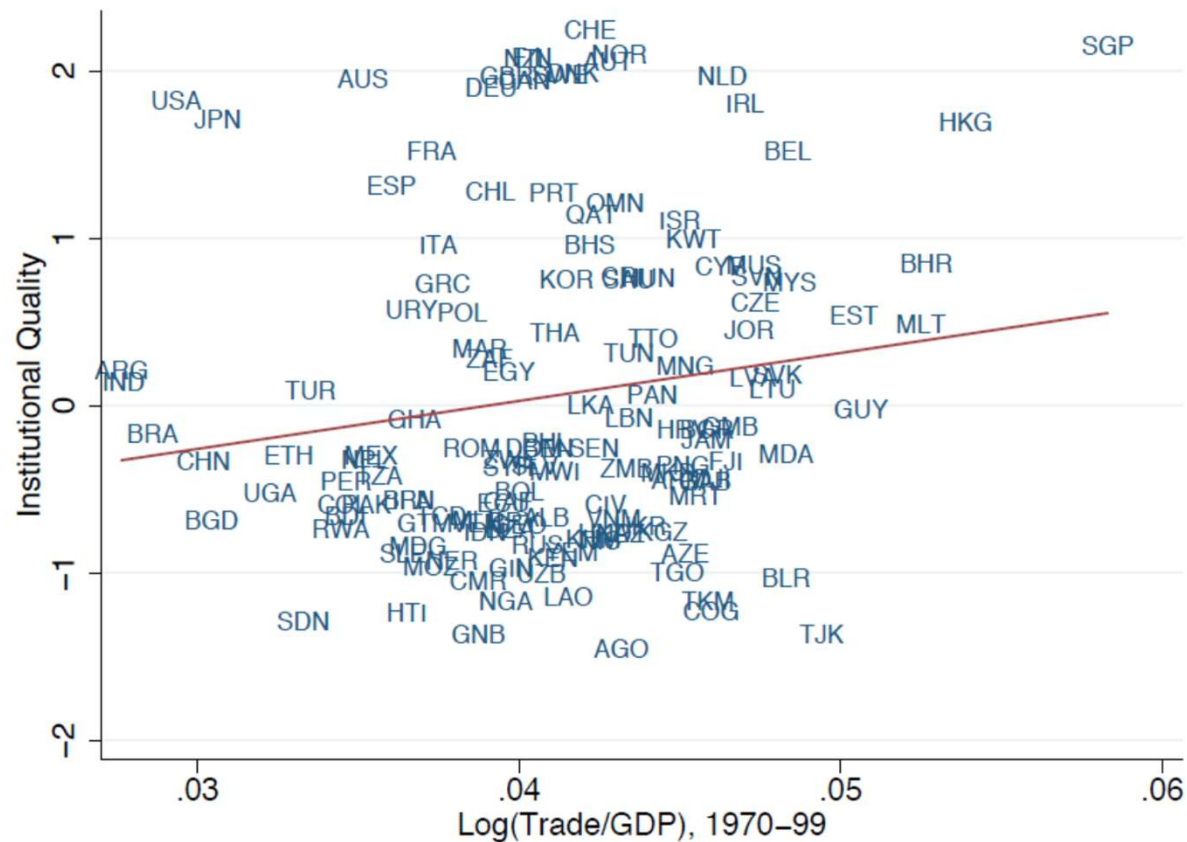
The **country IIX (Institutional intensity of exports)** is constructed as the weighted average (weights are predicted exports shares of each sector i in country's c total exports) of the sector-level index of institutional intensity,. The sum is made across sectors $i = 1 \dots I$

$$IIX_c = \sum_{i=1}^I \hat{X}_{ic} * Institutional_Intensity_i.$$

If a country has a high IIX, that is comparative advantages in sectors that are “institutional intensive”, opening up should promote institutional progress.

There is some positive association between institutions and overall trade openness, but it is not strong

Figure 4. Institutional Quality and Trade Openness

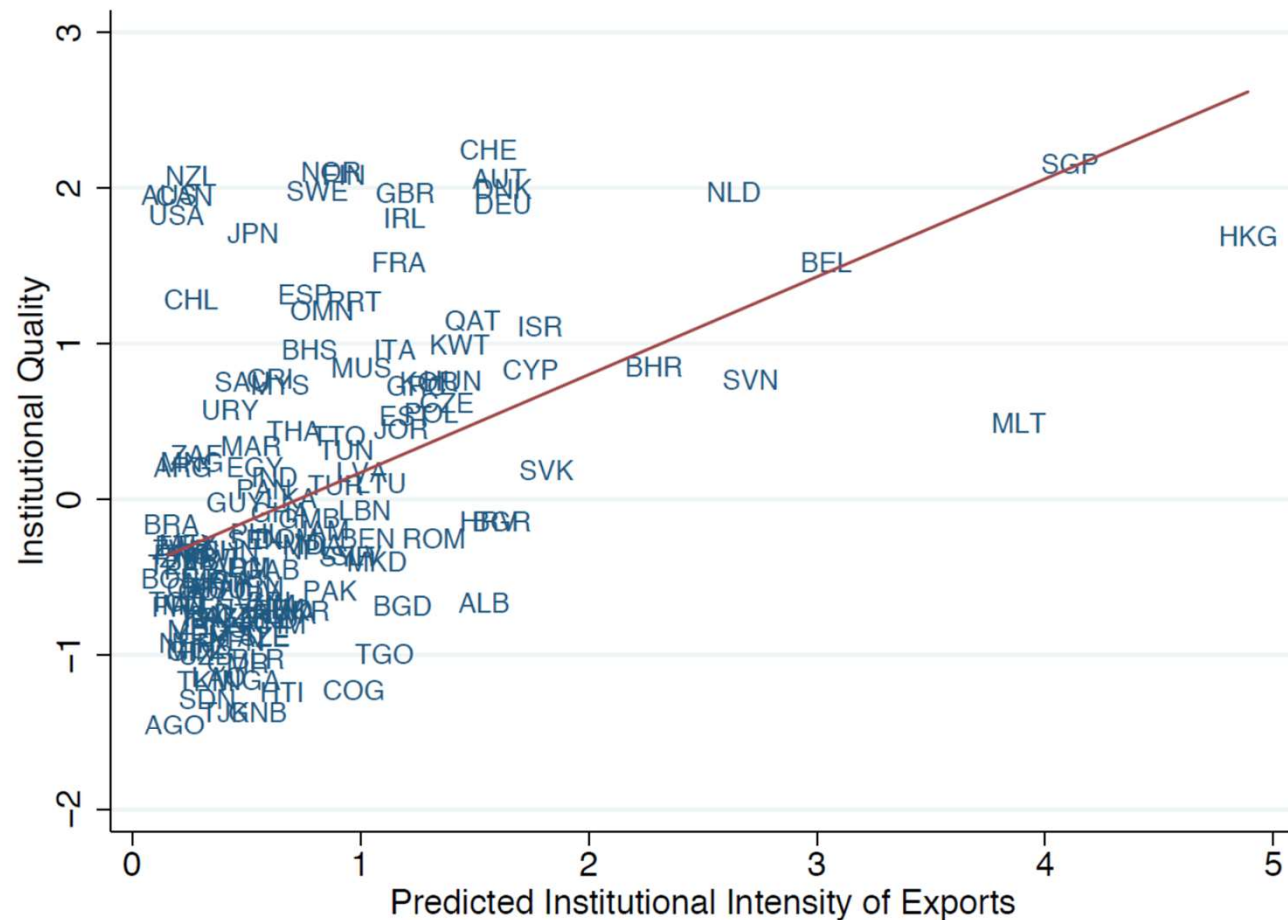


Notes: This figure presents the scatter plot of the quality of institutions, proxied by the Rule of Law index from the Governance Matters database of Kaufmann et al. (2005), against the log of exports plus imports as a share of GDP from the Penn World Tables.

Andrei A. Levchenko, 2013. "International Trade and Institutional Change," *Journal of Law, Economics and Organization*, Oxford University Press, vol. 29(5), pages 1145-1181, October

Positive association between institutions and the predicted institutional intensity of exports is much tighter

Figure 5. Institutional Quality and Predicted Institutional Intensity of Exports



Notes: This figure presents the scatter plot of the quality of institutions, proxied by the Rule of Law index from the Governance Matters database of Kaufmann et al. (2005), against the predicted institutional intensity of exports, *IIX*, constructed as described in the main text.

Empirical analysis confirms that opening up of countries with high IIX improves the institutional quality

	(1)	(2)	(3)	(4)	(5)	(6)	(7)
Dep. Var.: Institutional Quality							
Predicted IIX	0.197** (0.091)	0.221** (0.086)	0.319*** (0.082)	0.341*** (0.086)	0.215* (0.115)	0.275*** (0.095)	0.295*** (0.095)
Secondary Schooling	0.221*** (0.082)						
Distance to Equator		0.016*** (0.005)					
Fraction English-Speaking			0.664** (0.265)				
Polity2 Index				0.019** (0.007)			
Ethnic Fractionalization					-0.249 (0.193)		
Gini Coefficient						-1.511** (0.602)	
Proportion Catholic							-0.354** (0.177)
Proportion Muslim							-0.283* (0.155)
Proportion Protestant							0.082 (0.320)
Constant	-4.377*** (0.696)	-3.887*** (0.593)	-3.921*** (0.542)	-4.011*** (0.577)	-4.475*** (0.696)	-4.052*** (0.695)	-4.312*** (0.541)
Other Controls	Log(Trade/GDP), Log(Income), Legal Origin Dummies						
Observations	96	139	138	136	110	105	136
R-squared	0.82	0.79	0.78	0.78	0.78	0.77	0.77

Andrei A. Levchenko, 2013.

Notes: Robust standard errors in parentheses; * significant at 10%; ** significant at 5%; *** significant at 1%. Dependent variable, *Institutional Quality* is the index of Rule of Law sourced from Kaufmann et al. (2005); *Predicted IIX* is the predicted institutional intensity of exports; *Log(Trade/GDP)* is log of exports and imports as a share of GDP; *Log(Income)* is log of PPP-adjusted real per capita income from Penn World Tables; these two variables are average values over 1970-99. *French*, *German*, *Scandinavian*, and *Socialist Legal Origin* dummies are as defined originally by La Porta et al. (1998). *Secondary Schooling* is the average years of secondary schooling in the total population from Barro and Lee (2000); *Polity2 Index* is an indicator of strength of democratic institutions from the PolityIV database; *Ethnic Fractionalization* is sourced from Easterly and Levine (1997); the *Gini coefficient* of the income distribution is a measure of income inequality and is sourced from the World Bank's World Development Indicators. Variable definitions and sources are described in detail in the text.

Two main reasons why trade opening will lead to a change in institutions

1-trade can change agents' preferences over institutions.

Another reason why institutions improve or deteriorate after opening up relates to **who is in power** (Stefanadis, 2010)

If **productive agents are in power**, opening up (which creates export opportunities that require production) will improve institutional quality to ensure that production is maximized.

If **rents seekers are in power**, opening up will deteriorate institutions
Under autarcy the small elite is limited in how much it can suppress economic activity in the rest of the economy because they themselves consume the goods that the economy produces.

A trade opening implies that the prices of all goods are now set in the world markets, and thus the elite can buy from abroad instead.

The elite can expropriate domestic agents even more.

Hence the repercussions of opening up on institutions depend on the context

-the underlying comparative advantages

-who is in power

This point to the possibility of a **divergence in institutions as countries open**

-they will improve in some countries

-they will worsen in others

Two reasons why trade opening will lead to a change in institutions

2-Trade can change the relative political power of agents in the economy.

Numerous illustrations from **historical studies**: change can be positive or negative

Puga and Trefler (2014) on Medieval Venice, shows two stages.

The Mediterranean trading opportunities in the 10-12th centuries led to an establishment of a broad-based merchant class, that used its economic power to push for:

-constraints on the executive (by ending the practice of hereditary Doges): they instituted a **de facto parliament**.

-establishment of robust contracting institutions.

In the long run, however, wealth concentrated in a narrower set of merchant families, who used that concentrated wealth to **institute an oligarchy**.

Acemoglu et al. (2005) shows **institutional benefits from Atlantic trade** in the early modern era.

Opportunities created by that trade led to a rise of a merchant class in Great Britain and select other polities in Europe (such as the Netherlands)

They used their *trade-based wealth to acquire a seat at the political table*.

This merchant class was interested in :

- well-functioning contracting institutions
- protecting themselves from expropriation by the state

So they shaped the institutional formation accordingly which led to the establishment of modern capitalist institutions.

However trade opening does not always brings in power those that favor better institutions

Numerous examples where international trade contributed to **concentration of political power** in the hands of groups that were interested in setting up, or perpetuating, bad institutions

Best studied story is that of Caribbean sugar cane



Best studied story is that of Caribbean sugar cane

Sugar boom between 1650 and 1800

Caribbean islands appeared to be very suitable for sugar cane cultivation (85% of world sugar in 1800 originated from there).

In 1650 Caribbean islands were typically smallholder peasant societies

- farming foodstuffs for self-consumption
- perhaps tobacco for export

Introduction of sugar led to dramatic transformation:

-land use was given over almost entirely to sugar, so much so that many islands had to import food.

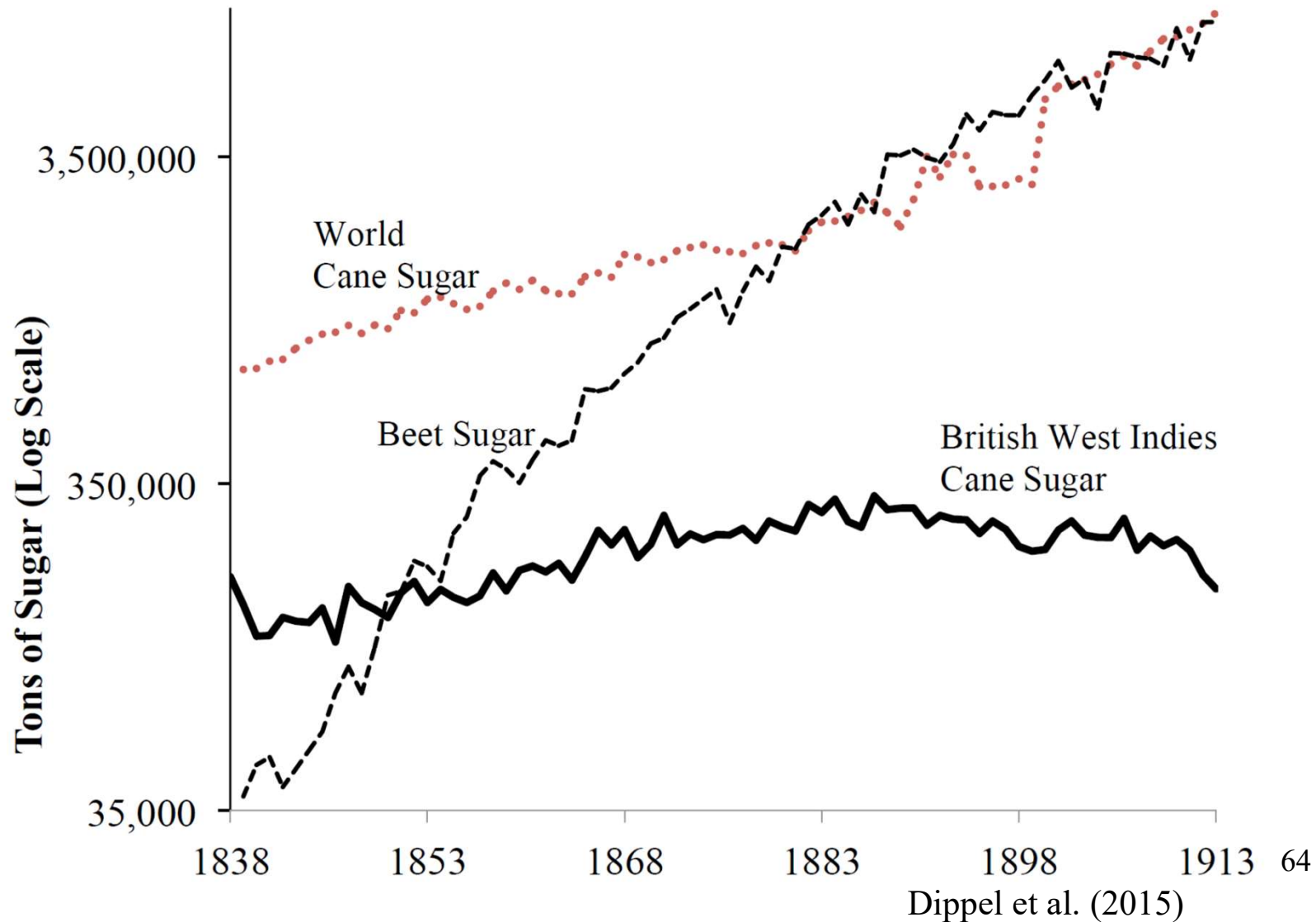
-*land ownership consolidation*: from smallholder patterns of land use to giant plantations (in the hands of white settlers)

-planters used their economic power to obtain political power and install the worst institutions (planter-dominated legislature, judiciary, and police):

Exploitation of indigenous population (no outside option)

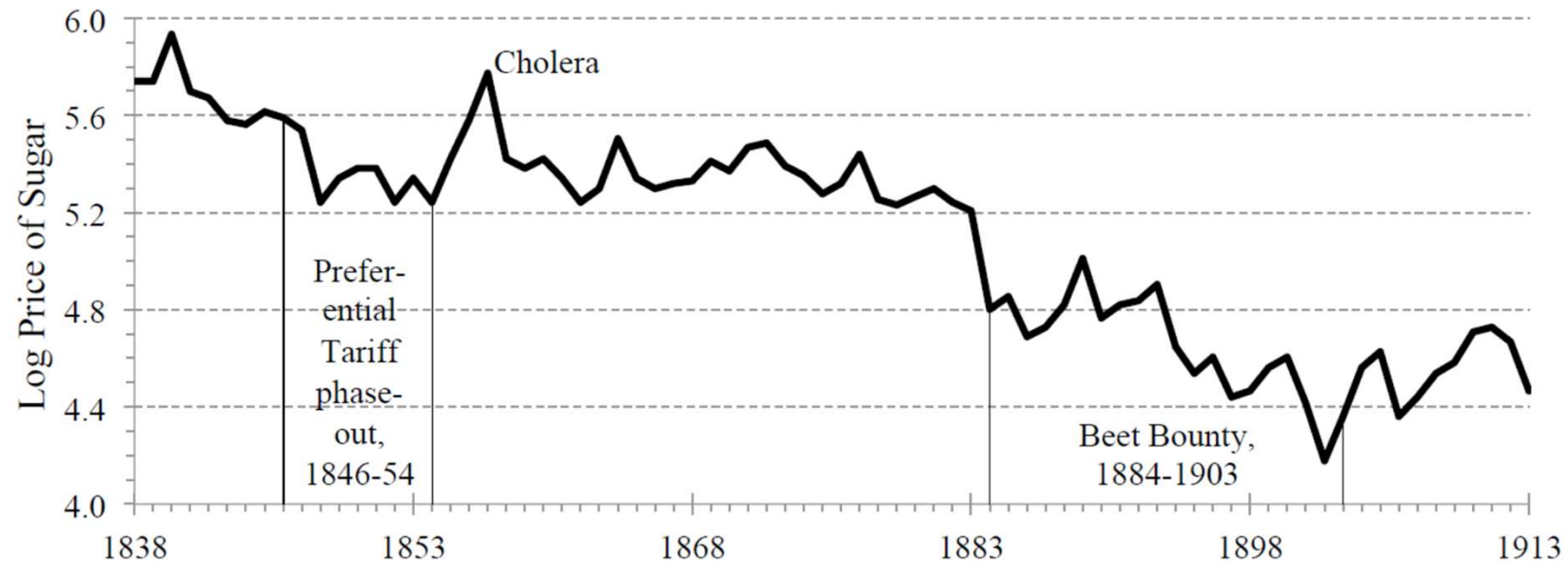
Slavery: 9/10 inhabitants of the Caribbean were slaves in 1800

During 18th, West Indies sugar faced increased competition from new sugar cane producers and from European beet sugar.



This led to a secular decline in sugar prices

Figure 4: The Secular Decline in Sugar Prices



Notes: This figure plots the log of the London price of sugar. Two events stand out. As part of the repeal of the Corn Laws and the move to Free Trade, Britain's preferential tariff on West Indies sugar was phased out over the period 1846-54 (Curtin, 1954). Second, France and Germany subsidized domestic production of beet sugar during 1884-1903, which further drove down sugar prices.

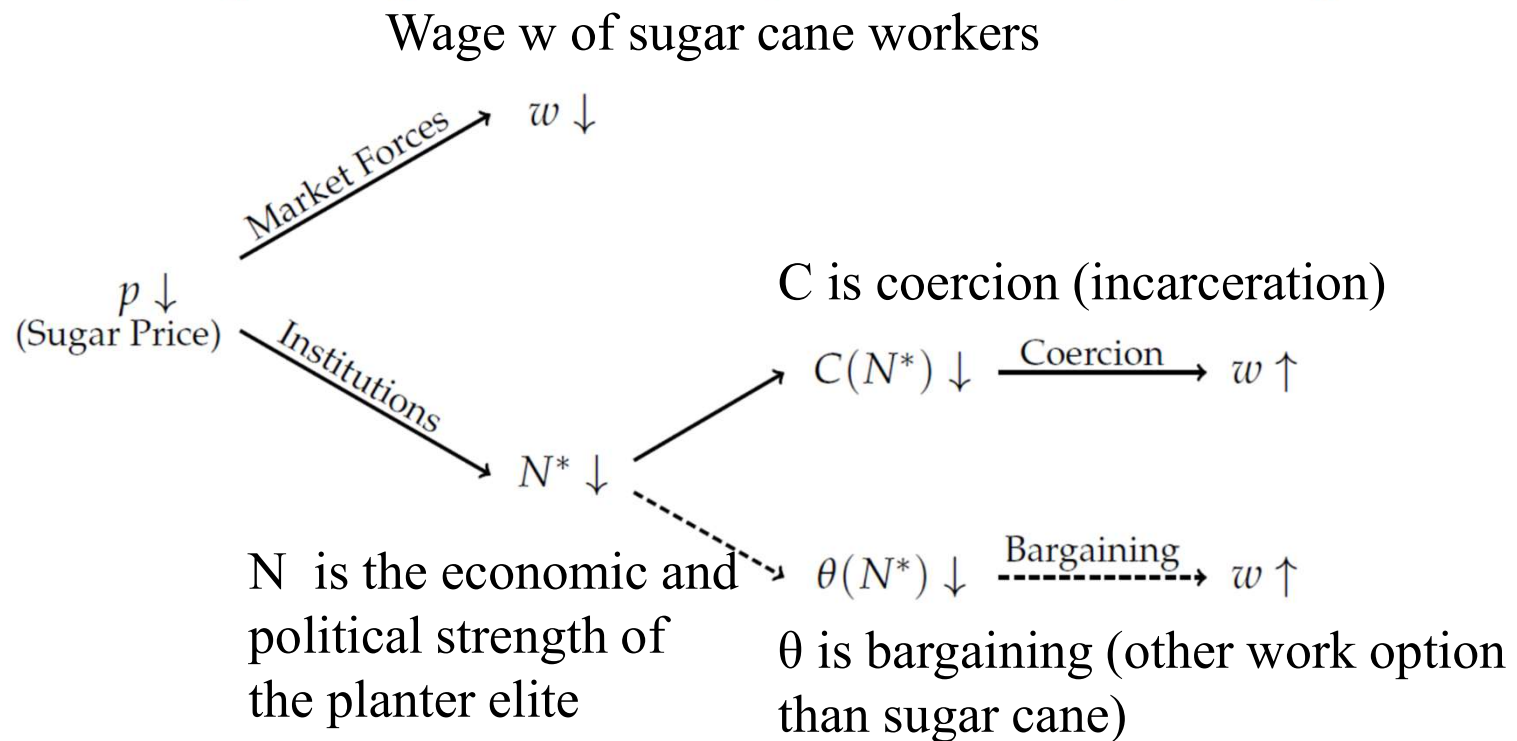
Dippel et al. (2015)

We have seen that enhanced export opportunities for sugar cane led to institutional deterioration.

What about the rising import competition and declining export opportunities?

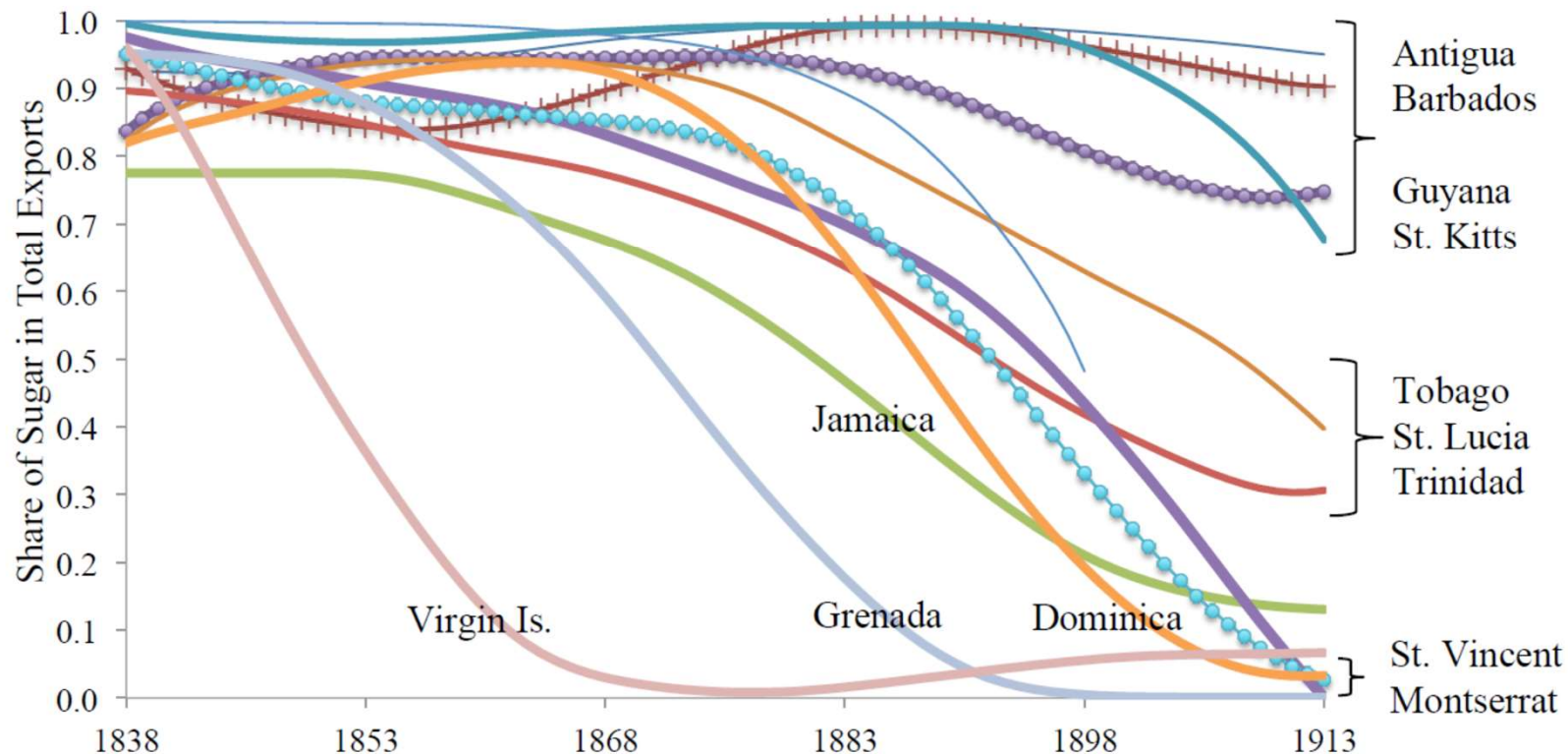
Dippel et al. (2015) propose the following model to understand the repercussions on the relative power of (poor) sugar cane workers with respect to (rich) planters/owners.

Figure 10: The Impact of Sugar Prices, Productivity, and the Outside Option on Wages



Dippel et al. (2015) exploit the relative evolution of Virgin Islands compared to other Caribbean islands to extract the causal effect of the negative price shock on the power of workers (wage and risk of being incarcerated).

Figure 6: The Share of Sugar in Total Exports and its Differential Decline



Dippel et al. (2015)

Notes: This figure reports the share of sugar in total exports. Nevis is not reported because it stayed between 0.95 and 1.00 throughout. Also, Nevis merged with larger St. Kitts in 1883 and Tobago merged with larger Trinidad in 1899. Each series is lowess smoothed. (The smoothed data faithfully reproduce trends in the raw data as can be seen by comparing the smoothed data with the unsmoothed data of figure 7.) Data are from the *Colonial Blue Books*.

Virgin Islands' early exit from sugar was due to **exogenous hurricanes** in early 19th century which destroyed the colony's sugar infrastructure and left planters too indebted to rebuild given the low price of sugar.

So sugar's differential decline in Virgin Is. is explained by exogenous agro-climatic factors and not fundamental differences in comparative advantages.

Results suggest that Virgin islands saw

- relative rise in workers' wage (w. r to planters)
- decline in coercive institutions
 - reduced number of incarcerations
 - more freedom given to indigenous population
 - reduced share of slaves in the population

This confirms the role of globalization in shaping institutions notably via the terms of trade (relative prices):

- this affects relative economic powers
 - this affects relative political powers
- and hence institutional quality

But the direction of the impact (improvement or deterioration) depends on the context.

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The course so far has highlighted **several channels** through which opening up shapes poverty and inequality.

Whether opening benefits the poor or increases inequality within a country is to be **context specific**. It depends on:

- nature of changes in trade policy or patterns and the mechanisms involved
- the mobility of workers and capital across firms, industries, and geographic locations
- the position of affected individuals in the income distribution of a country.

New models and new empirical analysis improve our understanding of the channels through which trade can affect poverty and inequality

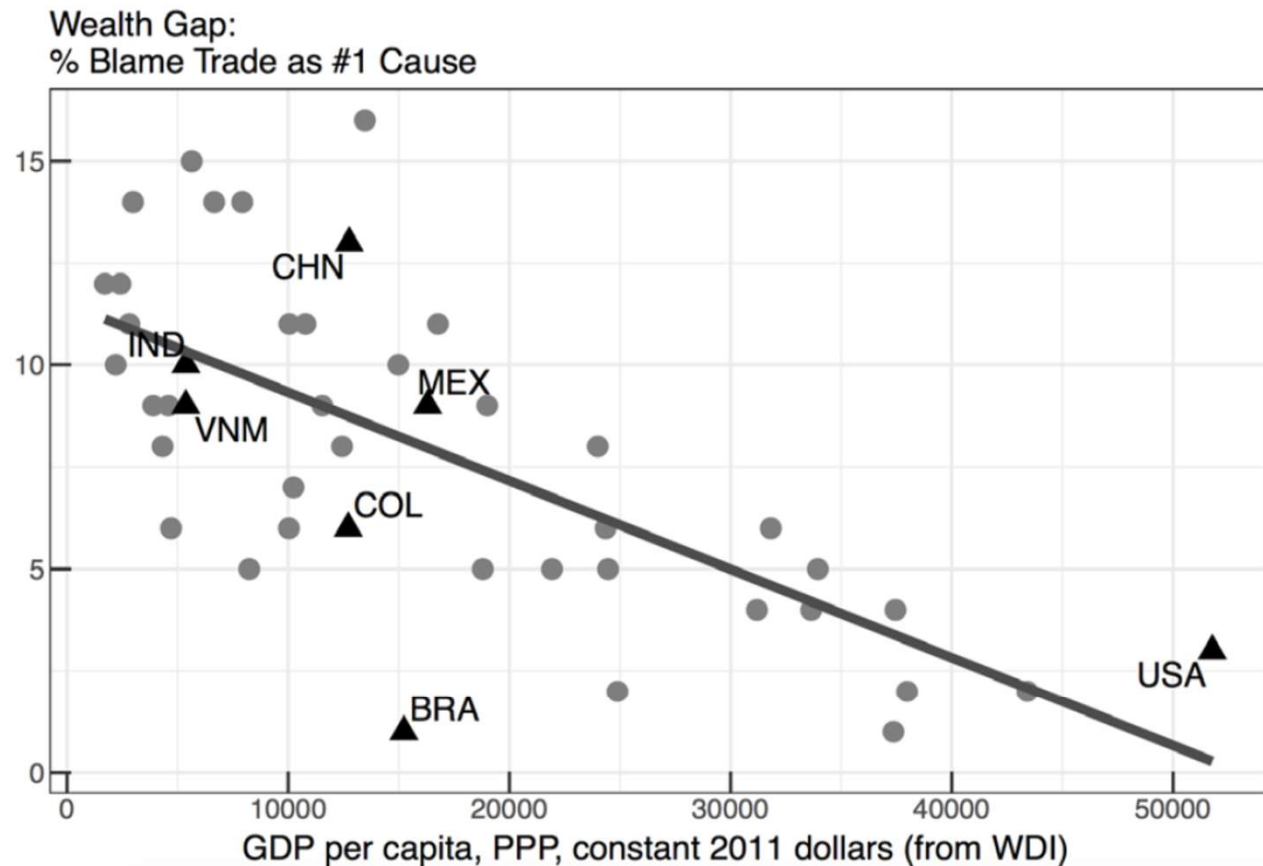
and the factors that impede individuals from sharing more equally the benefits

The academic consensus is that although opening contributes to inequality within a country, it is not its main driver.

This is consistent with surveys showing that the public does not perceive trade as the main culprit for inequality between rich and poor within a country.

Figure 6: Percent that Blames Trade as Number One Cause for Inequality

Less than 8% on average of the respondents consider trade as the number 1 cause of inequality



Note: The figure plots the percent of individuals in a country that blame trade as number one cause of wealth gap between rich and poor in that country against a country's income per capita and the best fit line. Based on 2014 PEW Global Attitudes survey and World Development Indicators. The figure singles out the responses of a handful of countries: Vietnam (VNM), China (CHN), Brazil (BRA), India (IND), Colombia (COL), Mexico (MEX), the United States (USA).

Pavcnik N., 2017, The Impact of Trade on Inequality in Developing Countries, Proceedings of Jackson Hole Economic Symposium. (also NBER Working paper 23878).

Note that lower income countries tend to view trade slightly more as the main driver of inequality than higher income countries.

Although we saw earlier that they were more favorable of trade's benefits in general and more likely to perceive trade as beneficial to worker livelihood in own country.

Possible explanations

-poverty in most developing countries has declined, especially extreme poverty over the past four decades

-no experience of large downturns in economic activities or quickly rebounded during the 2007–08 financial crisis which avoided the usual calls for protectionism that arise during economic downturns

-the effect of trade on income inequality might not yet be a first order concern for developing countries,.

Although opening is not the primary contributor to changes in aggregate inequality

There are adverse effects of import competition especially as they appear to be **highly geographically concentrated and long-lasting**

Also they **spill over** to factors such as education of the next generation, community crime, and adult health.

Is resorting to protectionism a solution? NO

Evidence that trade increases aggregate income and growth

Efficiency gains from reallocation between sectors and within sectors (between firms)

Opening up improves firm outcomes, such as productivity and innovation

Beyond that, protectionism too would generate winners and losers.

How can we ensure equality of opportunity and broader sharing in gains from trade?

1-Compensation

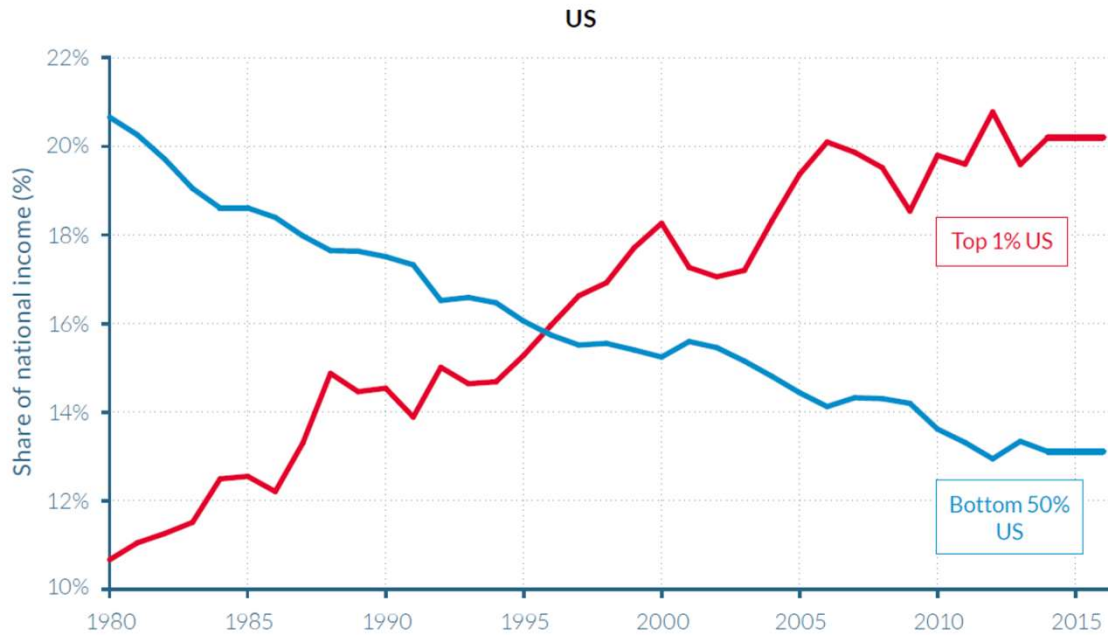
In the US evidence of a rise in **transfer payments** in response to increased import competition:

- unemployment and trade adjustment assistance
- disability benefits, retirement benefits,
- other government income assistance, and medical benefits.

But these income transfers offset only about 10 percent of the income loss for a household without children (Autor, et al. 2013, 2016).

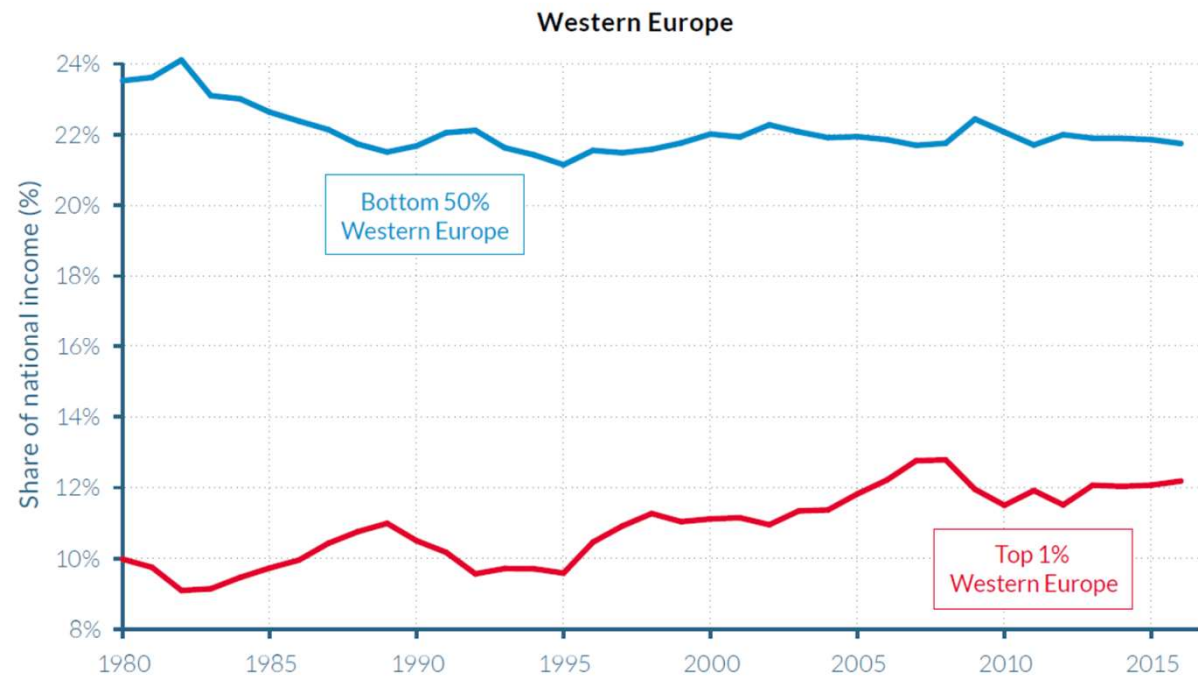
In Europe, more generous social transfers may explain why inequality did not rise as fast as in the US.

Top 1% vs. Bottom 50% national income shares in the US and Western Europe, 1980–2016:
Diverging income inequality trajectories



Fast rise in inequality in the US

Much less in Western Europe where **state redistribution** and **regulations** help limit abuses of dominant positions by companies



How can we ensure equality of opportunity and broader sharing in gains from trade?

2-Active labor market policies

This includes **retraining** and other forms of active labor market programs such as **subsidies to encourage firms to recruit** laid-off workers.

Unfortunately little impact in most cases despite high cost (especially vocational training which is very expensive)

Literature review by McKenzie (2017)

He looks at 3 interventions:

- vocational training to improve the technical skills
- employment subsidies to the employers
- public information on jobs, skill certification, organization of job fairs, and transportation services

Goal of these programs is to reduce frictions in the labor market and promote mobility

Groh et al. (2016) Randomized Control Trial in Jordan on a short-term (6-month) subsidy of firms to recruit workers

Expectation of a lasting impact on employment if :

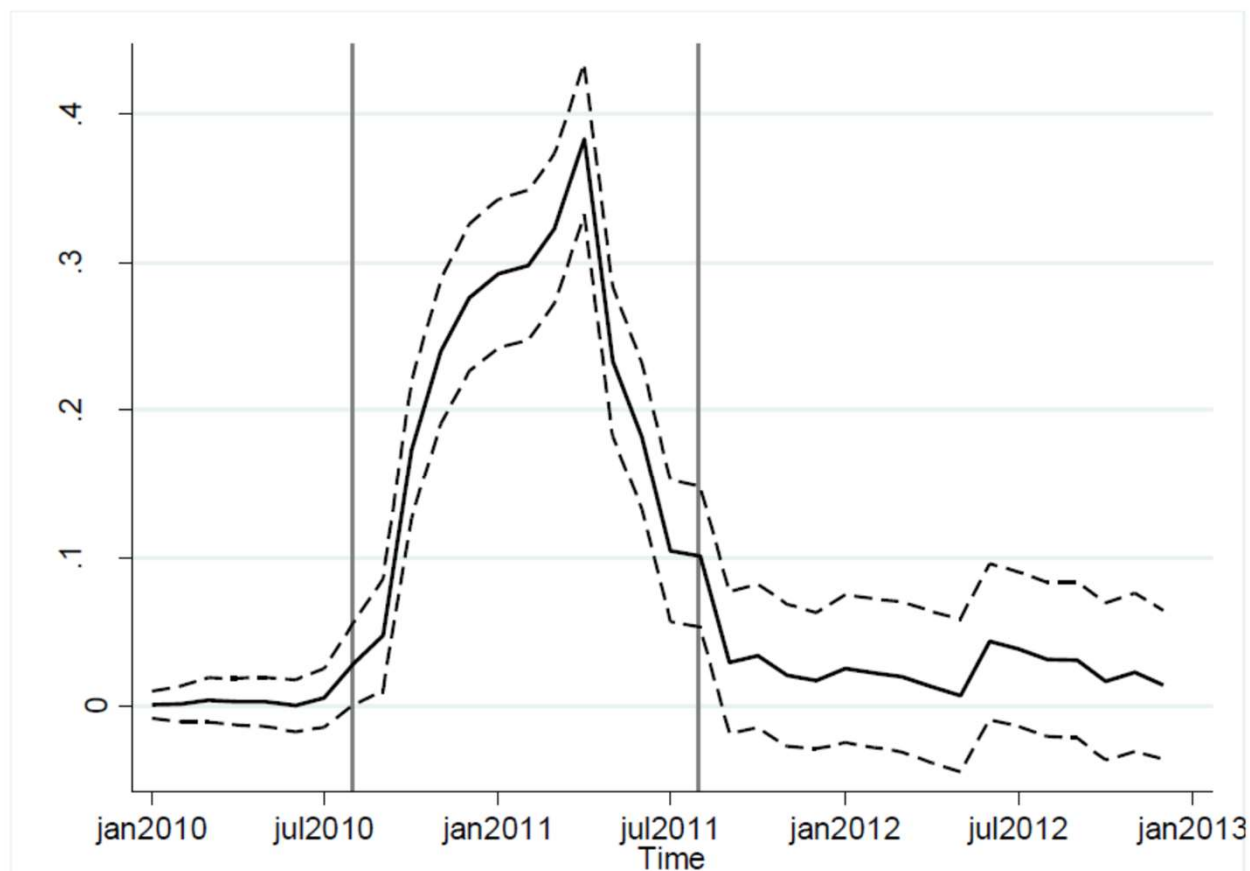
- experience gained acts as a stepping stone to longer-term employment (higher productivity)
- firms learn about the quality of workers and those who are good matches.

Results: Half of the individuals given the voucher used it

38% increase in employment during the period of the subsidy

However, once the subsidy ended, effect disappeared quickly as firms fired workers, other workers quit

Figure 1: Trajectory of Impact from a Wage Subsidy Program in Jordan



Groh, Matthew, Nandini Krishnan, David McKenzie and Tara Vishwanath, 2016, Do wage subsidies provide a stepping stone to employment for recent college graduates? Evidence from a Randomized Experiment in Jordan” Review of Economics and Statistics 98(3): 488-502.

No long-term significant impact on employment.

Subsidies did not provide the stepping stone to additional work that theory might suggest if the main problems is labor frictions.

One successful program was recruitment campaign that provided information about job opportunities in Business Process Outsourcing in urban areas of India (Jensen, 2012)

The program was targeted to young rural women.

Presentations were offered on the BPO sector and the possible jobs

-call center operator, secretarial services, transcription and online technical support

-more skilled activities, such as accounting or software development

They also mention **level of compensation**; information on the names of specific firms looking for workers; strategies for how to apply for jobs (how to create and submit resumes, plus lists of websites and phone numbers)

The also gave **interview skills lessons and tips**; assessment of English language skills; and a question-and-answer session.

The program was evaluated by RCT (random selection of villages where program was offered)
 It led to increased mobility and labor force participation

TABLE II
 EFFECT OF THE INTERVENTION ON EMPLOYMENT, BY AGE AT ROUND 2

	BPO employment			Works for pay away from home		
	(1) 18–24	(2) 25–44	(3) 45–60	(4) 18–24	(5) 25–44	(6) 45–60
<i>Panel A: Women</i>						
Treatment	0.046*** (0.008)	0.003 (0.003)	~	0.024** (0.011)	0.0029 (0.0089)	–0.006 (0.014)
Observations	1,278	2,233	1,029	1,278	2,233	1,029
Control group mean	0.004	0.002	0.00	0.21	0.24	0.22
R^2	0.022	0.000	~	0.054	0.001	0.000
<i>Panel B: Men</i>						
Treatment	–0.007 (0.005)	0.002 (0.004)	~	0.003 (0.011)	0.007 (0.024)	–0.004 (0.035)
Observations	1,442	2,469	1,104	1,442	2,469	1,104
Control group mean	0.008	0.003	0.00	0.47	0.56	0.52
R^2	0.001	0.000	~	0.000	0.001	0.000

Notes: Heteroskedasticity-consistent standard errors accounting for clustering at the village level in parentheses. Age ranges are for age at round 2. The dependent variable is an indicator for whether an individual in round 2 had a job in the BPO sector in columns (1)–(3), and whether they worked for pay away from home in round 2 in columns (4)–(6). ~ indicates that the coefficient could not be estimated because no one in the age*sex category had a BPO job. *Significant at 10% level; **significant at 5% level; *** significant at 1% level.

The intervention increased schooling of younger girls in these village

TABLE IV
EFFECT OF THE INTERVENTION ON HUMAN CAPITAL

	(1) Enrolled in training (18–24)	(2) Enrolled in school (6–17)	(3) BMI for age (5–15)	(4) Height for age (5–15)
<i>Panel A: Women</i>				
Treatment	0.028*** (0.008)	0.050*** (0.015)	0.24*** (0.070)	0.063 (0.066)
R^2	0.010	0.004	0.007	0.001
Observations	1,278	2,264	2,031	2,031
Control group bean	0.005	0.76	–1.25	–2.02
<i>Panel B: Men</i>				
Treatment	0.003 (0.004)	0.010 (0.011)	–0.020 (0.076)	0.005 (0.052)
R^2	0.000	0.001	0.000	0.000
Observations	1,442	2,511	2,295	2,295
Control group mean	0.004	0.81	–1.29	–1.99

Notes: Heteroskedasticity-consistent standard errors accounting for clustering at the village level in parentheses. All dependent variables measured in round 2; the number ranges in parentheses indicate the (round 2) age range over which the regression is estimated. The regressions contain only an indicator for coming from a treatment village, with no additional covariates. BMI for age and Height for age are z-scores. *** Significant at 1% level.

Long run repercussions on women empowerment (later marriage and lower fertility)

TABLE V
EFFECT OF THE INTERVENTION ON MARRIAGE AND FERTILITY, AGES 18–24 IN ROUND 2

	(1) Married	(2) Had child	(3) Desired fertility
<i>Panel A: Women</i>			
Treatment	-0.051** (0.024)	-0.057** (0.026)	-0.35*** (0.078)
R^2	0.003	0.003	0.018
Observations	1,278	1,278	1,226
Control group mean	0.71	0.43	3.0
<i>Panel B: Men</i>			
Treatment	-0.002 (0.025)	-0.009 (0.018)	0.027 (0.066)
R^2	0.000	0.000	0.000
Observations	1,442	1,442	1,437
Control group mean	0.44	0.15	3.3

Notes: Heteroskedasticity-consistent standard errors accounting for clustering at the village level in parentheses. All dependent variables measured in round 2. The regressions contain only an indicator for coming from a treatment village, with no additional covariates. *Significant at 10% level; **significant at 5% level; ***significant at 1% level.

Jensen (2002)

Conclusion

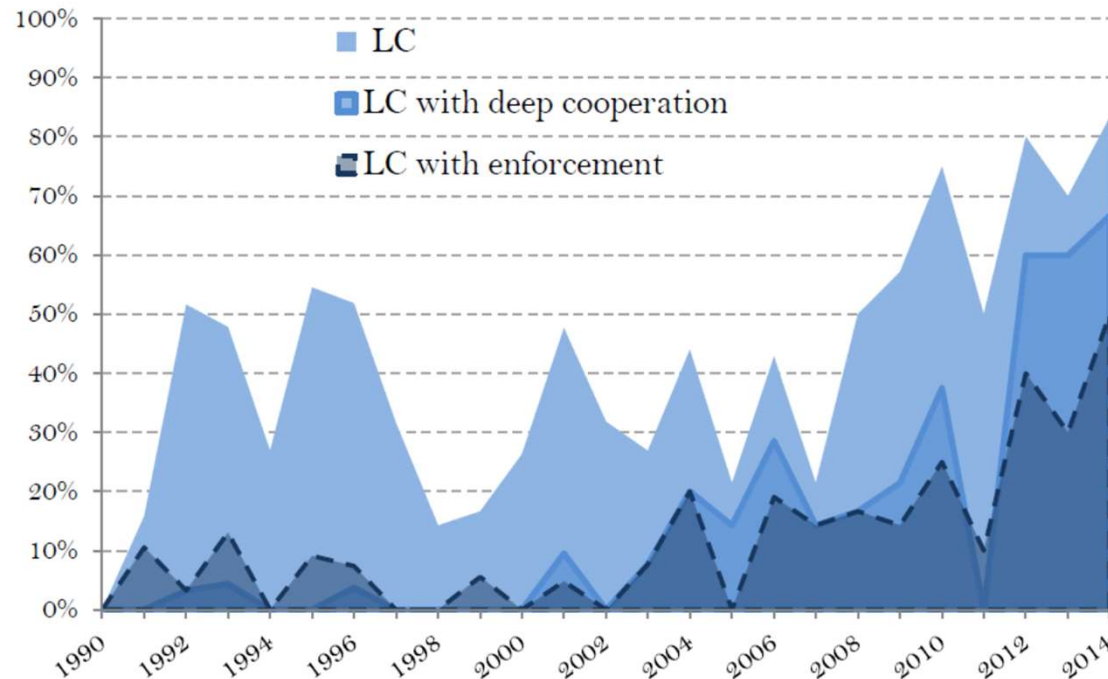
Promising to attempt to reduce the spatial mismatches and diffuse the negative/positive trade shocks, which tend to be spatially concentrated

Subsidies to recruit in depressed areas may not work as firms do not wish to recruit for structural reasons not frictions.

2-Active labor market policies

What about labor clauses to promote workers' rights in trade agreements?

Figure 2. Share of LC in total TAs per year, 1990-2014



They have grown in importance but some worry that they can be counter-productive as they could raise costs and deter trade.

Note: "LC" includes all agreements with at least one labor provision. "LC with enforcement" refers to TAs with LC including both (i) Judicial or quasi-judicial dispute settlement mechanisms and (ii) sanction measures ("monetary compensation" or "trade sanctions" or "other appropriate measures"). "LC with deep cooperation" refers to TAs with LC including cooperation-related labor provisions and a comprehensive institutional framework establishing a separate committee for the implementation of the labor-related commitments and allowing the involvement of third parties.

Source: authors' computation based on LABPTA dataset.

Table 3. Estimation of the impact of North-South LC with enforcement and cooperation on South-North manufacture trade flows, 1995-2014

VARIABLES	(1)	(2)	(3)	(4)
	ln m_{ijt}	ln m_{ijt}	ln m_{ijt}	ln m_{ijt}
LC	0.308** (0.146)	0.333* (0.172)	0.211* (0.124)	0.160* (0.093)
LC with enforcement	-	0.068* (0.039)	-	-0.357 (0.255)
LC with deep cooperation	-	-	0.829*** (0.280)	0.887*** (0.285)
ln (Distance) _{ij}	-1.340*** (0.0795)	-1.348*** (0.0810)	-1.444*** (0.0806)	-1.444*** (0.0800)
Contiguity _{ij}	0.686* (0.356)	0.710** (0.356)	0.500 (0.399)	0.513 (0.402)
Common Language _{ij}	0.690*** (0.111)	0.685*** (0.111)	0.697*** (0.112)	0.696*** (0.112)
Past Colonial _{ij}	1.130*** (0.178)	1.131*** (0.178)	1.100*** (0.175)	1.099*** (0.176)
Common Colonial _{ij}	0.553*** (0.180)	0.582*** (0.180)	0.504*** (0.181)	0.494*** (0.181)
Depth of TA _{ijt}	1.199*** (0.201)	1.183*** (0.206)	0.866*** (0.265)	0.896*** (0.263)
Sample	South to North	South to North	South to North	South to North
Observations	24,128	24,128	24,128	24,128
R-squared	0.863	0.863	0.864	0.864
<i>importer - year Fixed Effects (it)</i>	<i>yes</i>	<i>yes</i>	<i>yes</i>	<i>yes</i>
<i>exporter - year Fixed Effects (jt)</i>	<i>yes</i>	<i>yes</i>	<i>yes</i>	<i>yes</i>

Note: Standard errors in parentheses are clustered at the dyad level; *** stands for statistical significance at the 1 percent level; ** for statistical significance at the 5 percent level and * for statistical significance at the 10 percent level.

Source: authors' computation.

Carrère C, Olarreaga M and Raess D., 2018, Labor clauses in trade agreements: worker protection or protectionism? University of Geneva, mimeo.

If anything, the inclusion of labour clauses in bilateral and regional trade agreements tends to **increase**, not reduce, exports from low-income country to high-income countries.

Consistent with the literature showing that **better working conditions increase labour productivity** in low-income countries, as well as demand for those products in high-income countries

How can we ensure equality of opportunity and broader sharing in gains from trade?

3-Provision of public goods

Government could in principle help individuals and communities smooth these adverse shocks, and more generally, invest in local infrastructure and the provision of public goods (health, education)

Reduction of schooling fees would prevent school drop out of kids after a negative shock on the family income

Higher quality of education and training (not only for those negatively impact by opening, but all) would facilitate structural transformation as newly created jobs are more skilled than farming job.

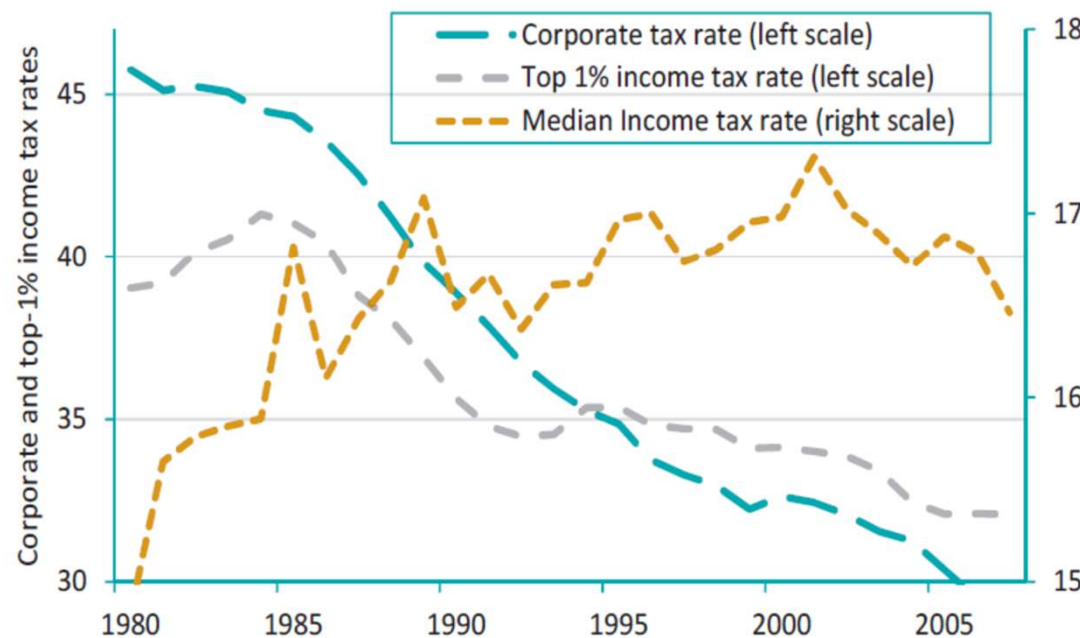
One key dimension is to avoid full decentralization as local governments of areas negatively impacted would not have the resources to finance the necessary public goods. Need for **spatial redistribution inside countries.**

It is important to note that **unfortunately globalization tends to reduce the fiscal capacity of developing countries' governments**

The immediate repercussion of import tariff reduction is a cut in fiscal revenue

Moreover it seems that tax systems around the world become less redistributive as a consequence of globalization

Figure 17: Corporate taxation and labour income taxation for top 1 per cent and median worker



This is due to the high international mobility of rich people and corporations. This raises the fiscal competition between countries and leave the middle class paying taxes. **This calls for international cooperation not competition**

Egger P, Nigai S and Strecker N (2019). "The Taxing Deed of Globalization." *American Economic Review* 109(2):353-90.

How can we ensure equality of opportunity and broader sharing in gains from trade?

4-Ensure equal opportunities for firms to export markets

Improving the access of small firms to global markets is also likely to help reduce income inequality:

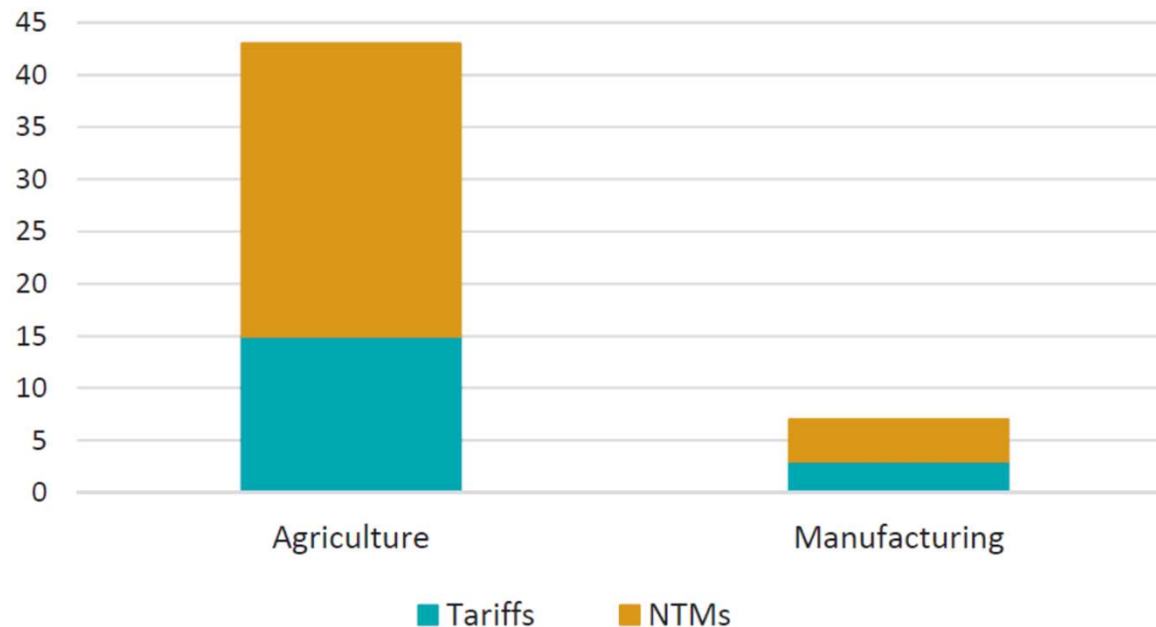
-small firms generally employ mostly unskilled labor (the share of skilled workers in large firms is typically >50%, twice that of small firms)

-participation of more firms will limit power concentration among international “oligopoly” firms which use their market power to capture price rents.

One promising way to improve the access of small firms to global markets is to **reduce non-tariff barriers** because they correspond to fixed costs and hence induce a selection (exclusion of the smallest firms)

Non-tariff barriers are more prevalent now than tariffs

Figure 14: Relative trade restrictiveness of tariffs and NTMs in high-income countries



Source: Kee, Nicita and Olarreaga (2009). NTMs are expressed in “tariff-equivalent” units. The level of NTMs in agriculture is equivalent to an additional 28 per cent tariff.

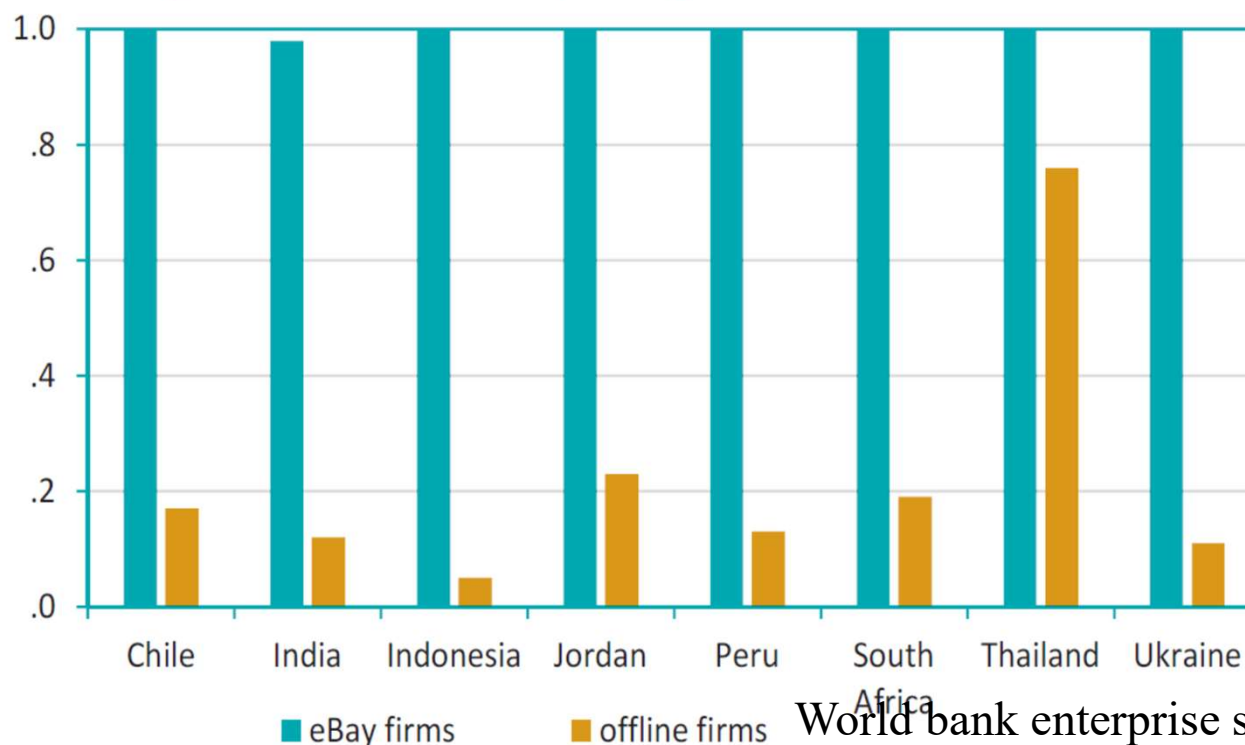
NTM imposed by rich countries (often for protectionist reason and not health or environmental reasons) have discriminatory effect:

- hurt the poorest countries more (barriers are sunk costs)
- hurt the smallest firms (and unskilled workers) more

Another promising way to support small firms is to promote **online trade**.

Online platforms reduce the **cost of reaching foreign consumers** for firms that do not have the capacity or the volume to otherwise promote their products in foreign markets.

Figure 16: Share of exporting firms online and offline



Supporting the rapid increase in online exports in low-income countries (IT infrastructure, access to finance, education) would help reduce the wage gap between skilled and unskilled workers.

THE END

The exam will be a two-hour exam.

To prepare for the exam, working on the slides is sufficient. I do not expect you to read in-depth the academic papers that I presented in class.

The list of references is given in case you wish to go further into the details but I will not ask in the exam for notions that I did not cover during the class and on the slides.

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