

# Global Value Chains & the Nordics: *Past Trends, New Realities, Future Expectations*

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The ETLA logo consists of a blue square with the white letters 'ETLA' inside.

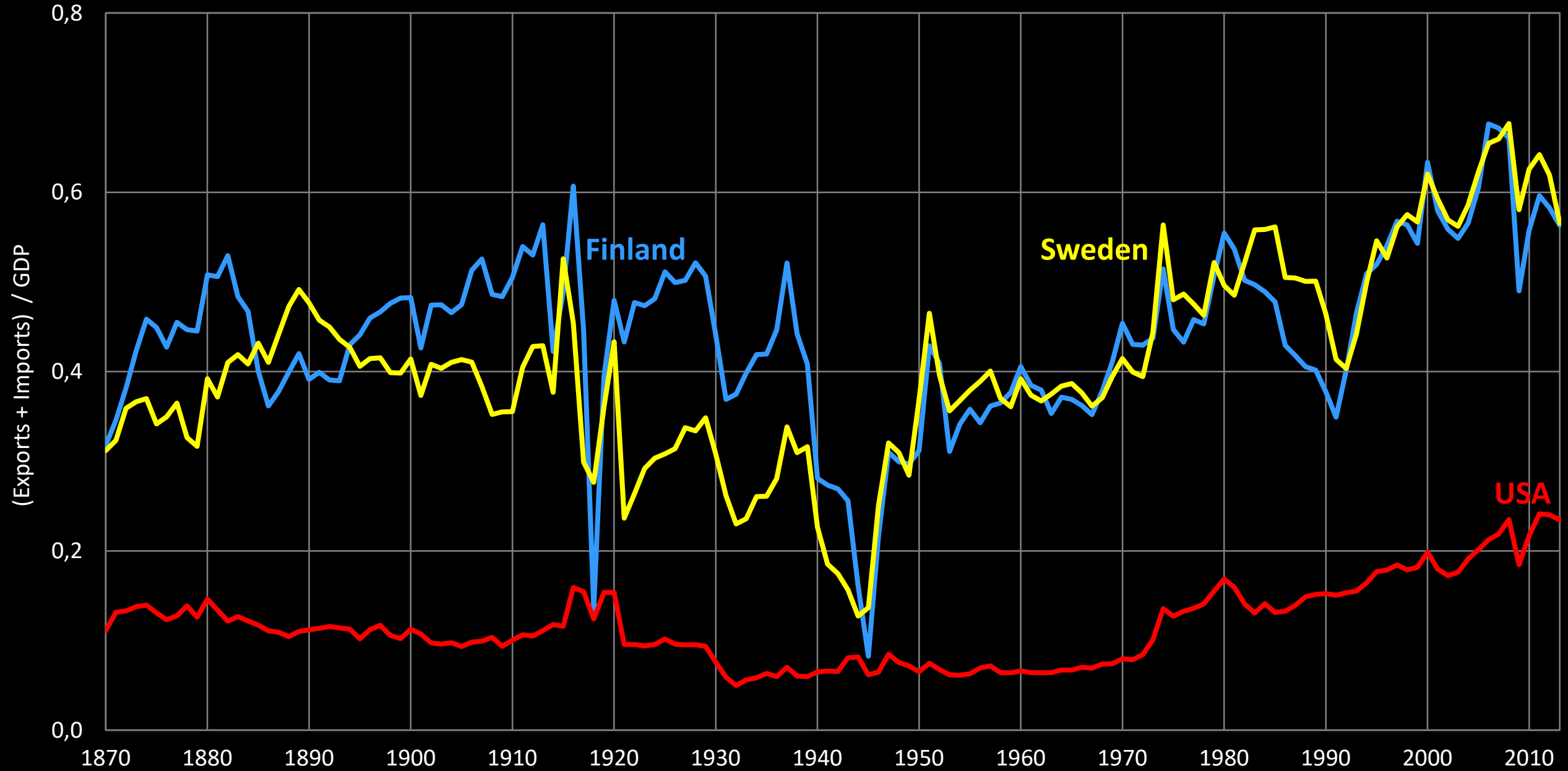
*The Nordic Region* -seminar  
Hanasaari, 22 May 2018



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# Finland & Sweden Have Been *Open Economies* for Centuries



## Steam revolution

- Reduction in **transportation** costs
- **Old Globalization** (goods imports & exports)

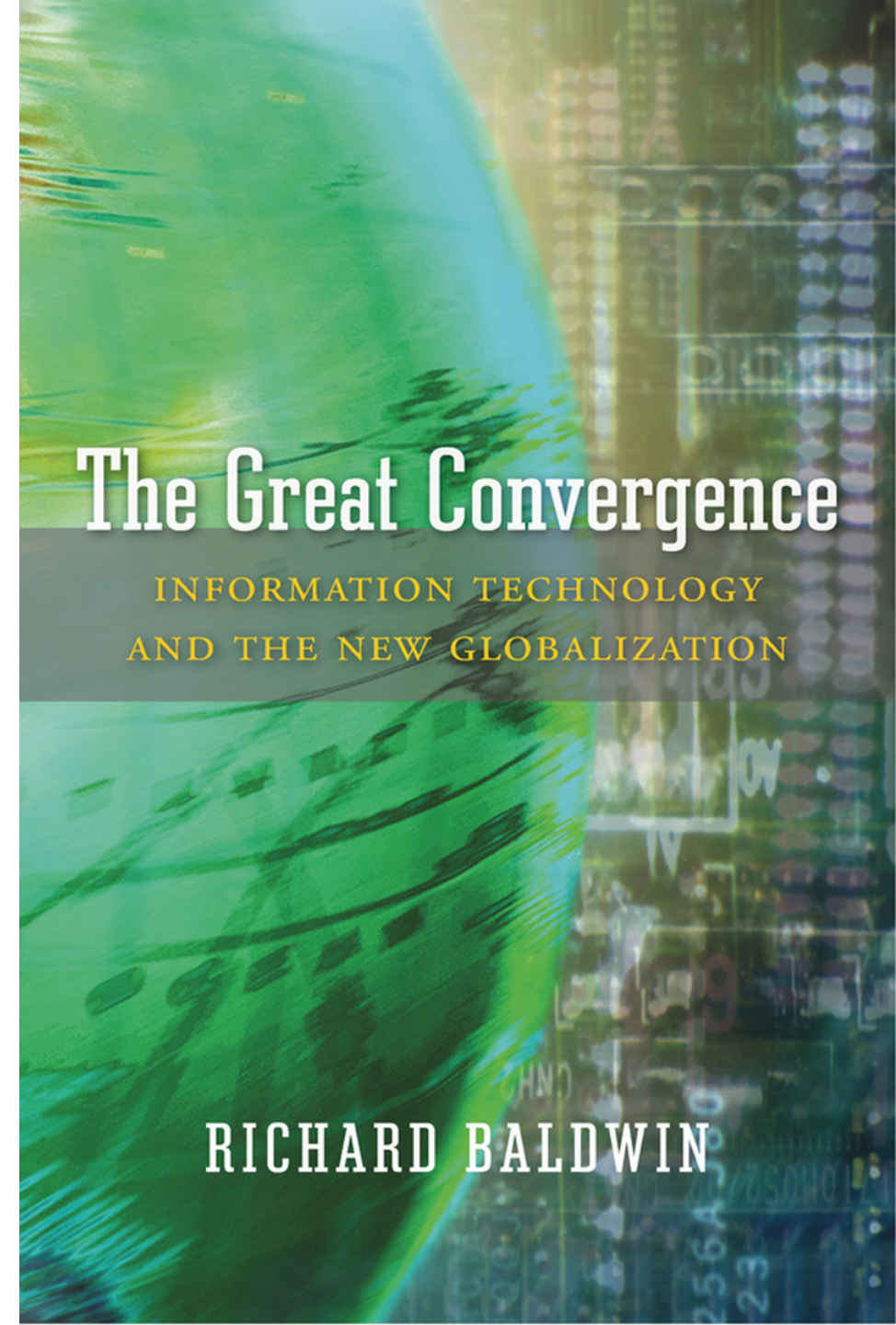
## Digital revolution

- Reduction in **communications** costs
- **New Globalization** (GVCs & MNEs)

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## Finland & Sweden:

- Leaders/winners of **Old globalization!**
- How does **New Globalization** play out?



→ Finland's intermediate imports

→ Finland's intermediate exports

→ Germany's final exports

One example of a global value chain

Unique for each variation & time

Lots of intermediate imports/exports

Task by task optimization by ABB

Finland:  
Assembly

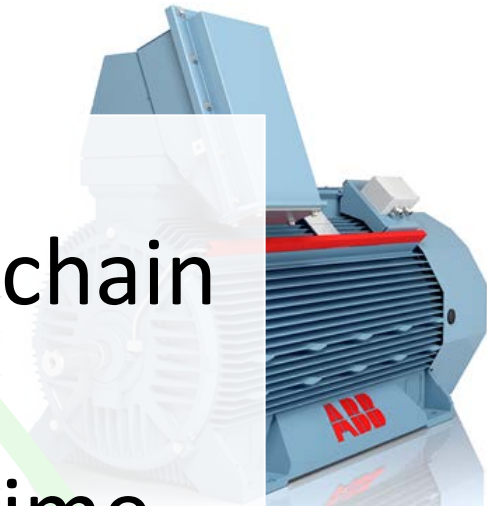
Estonia:  
Cables

Germany:  
Pump

Czech Rep:  
Castings

Saudi Arabia:  
Oil refinery

India:  
Castings



**1/3** of business employment  
directly serves GVCs

**40%** of gross exports  
consist of imports

**40%**  global corporate  
**50%**  employment abroad

**20%**  business value-added  
**30%**  by foreign-owned units

# How to Study GVCs?

- **Micro:** Specific products
  - Enables the analysis of, e.g., transfer pricing
- **Meso:** Surveying multinational enterprises
  - Enables some generalization
- **Macro:** Global input-output data
  - Provides an “on average” aggregate view

**Mapping out the whole global supply chain** from raw materials / idea generation to final purchase/use  
– All direct & indirect hard & soft inputs

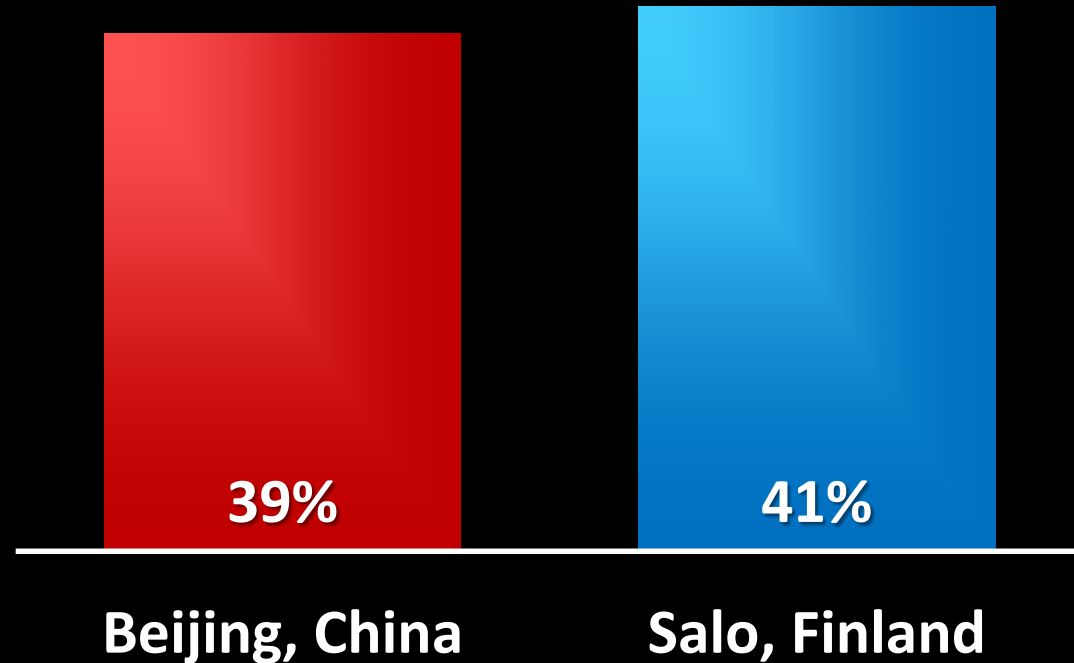
**Value added** by **actors** (firms/individuals), **functions** (R&D...)  
& **geographies** (locations/countries)

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**Nokia N95 smartphone**: 600 components,  
dozens of separate pieces of software,  
mill. of lines of embedded software



The assembly location – **China versus Finland** – makes little difference for Finnish Value Added !?



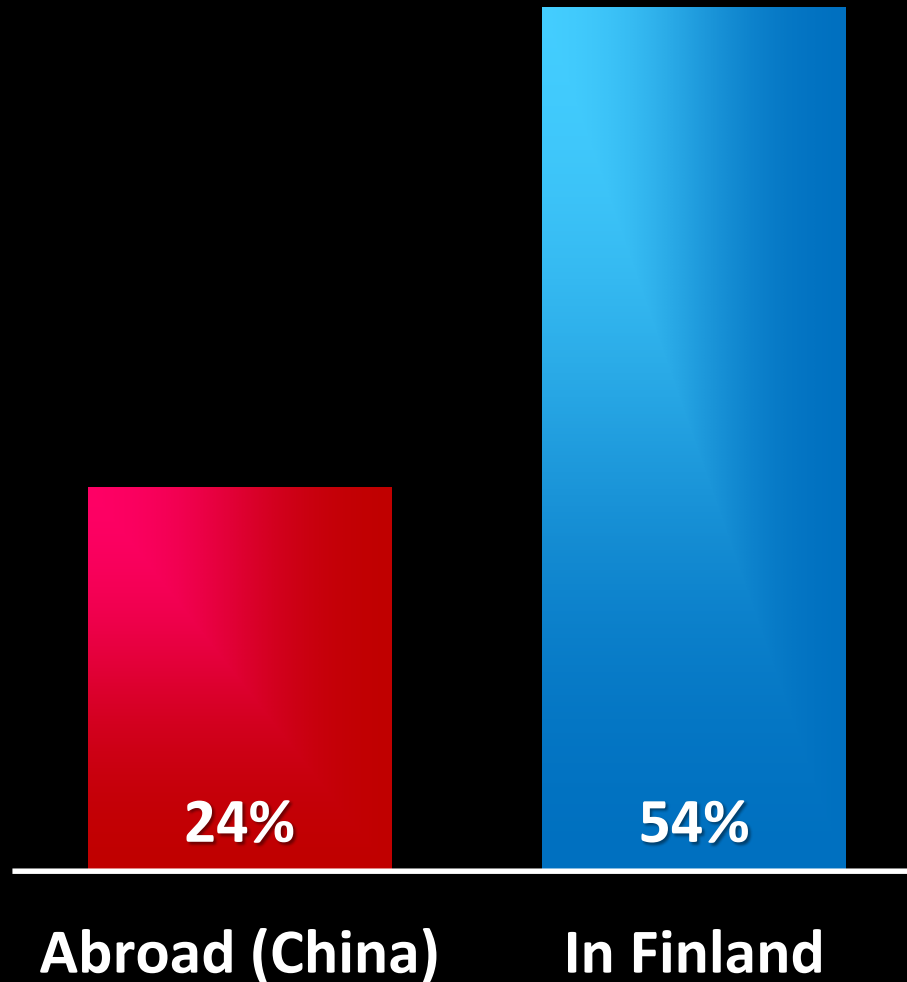
Source: Ali-Yrkkö, Rouvinen, Seppälä & Ylä-Anttila 2011 <http://v.gd/oLoC2n>



Are engineering products, such as **this burner** by Finnish **Oilon**, any different?



# Assembly locations more important in cases of *10 Engineering Products*



## *Why?*

*Localization of parts/supplies  
& supporting services*

*Role/location of IPRs*

*Location of the profit center*

*Transfer pricing practices*

- **Corporate sweet spots in GVCs**

- *Brand owner, orchestrator*
- *Interfacing with customers*
- *Gatekeeper in the chain*
- *Core tech provider*

- **Value capturing jobs**

- *High-level "supporting" service tasks*
- *Creation & management of intangibles*



# Stylized observations

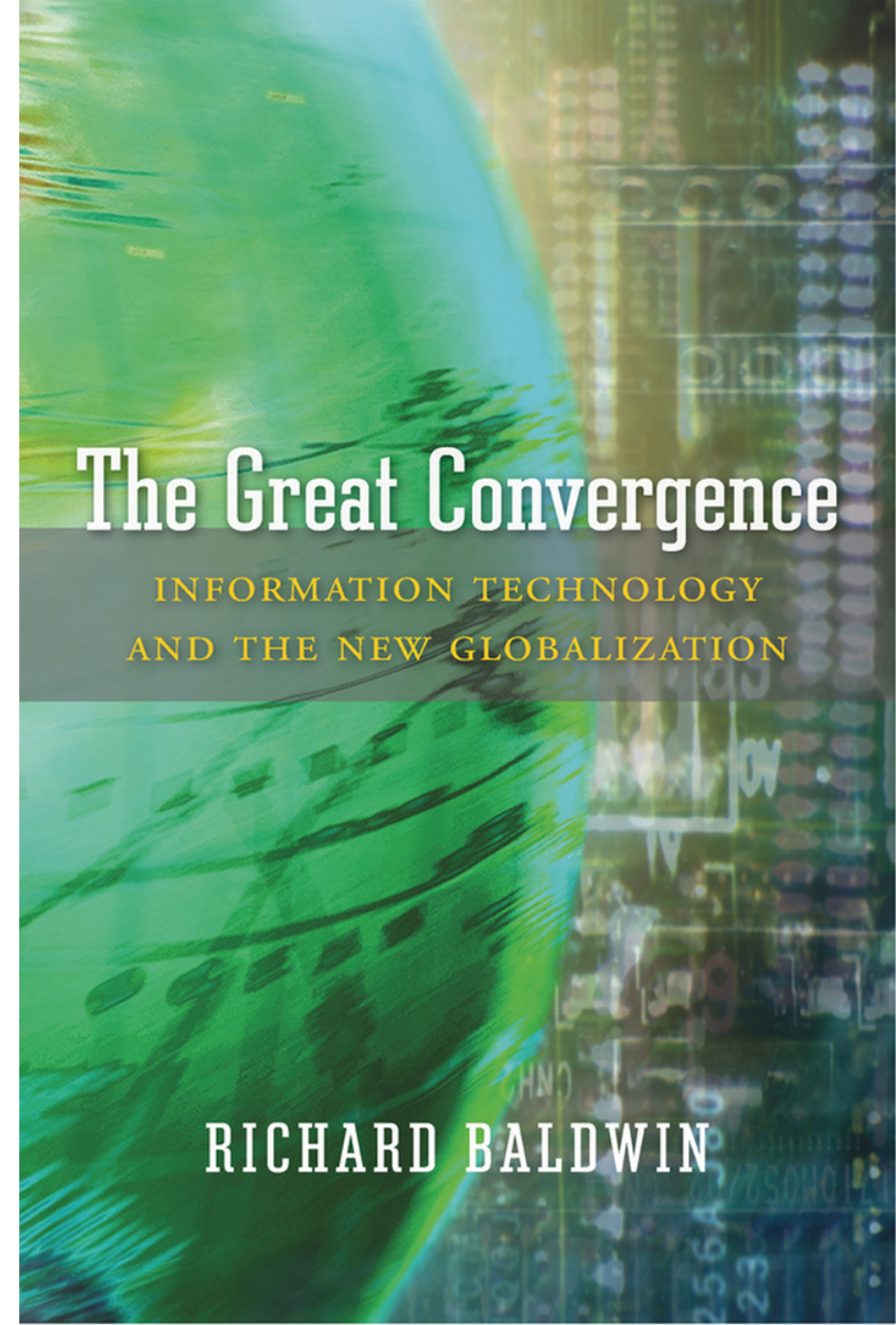
- Intangibles dominate also in manufactures
  - Internal & market services, creation & appropriation of IP
- Value migrates to earlier/later stages (cf. “smile”)
  - Direct assembly/processing has diminished over time
- Intensity of interaction within value chains varies
  - Trad. services often internationalize via ownership; value added in digital is fluid

The Way Forward?

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# New Glob. → Changes become:

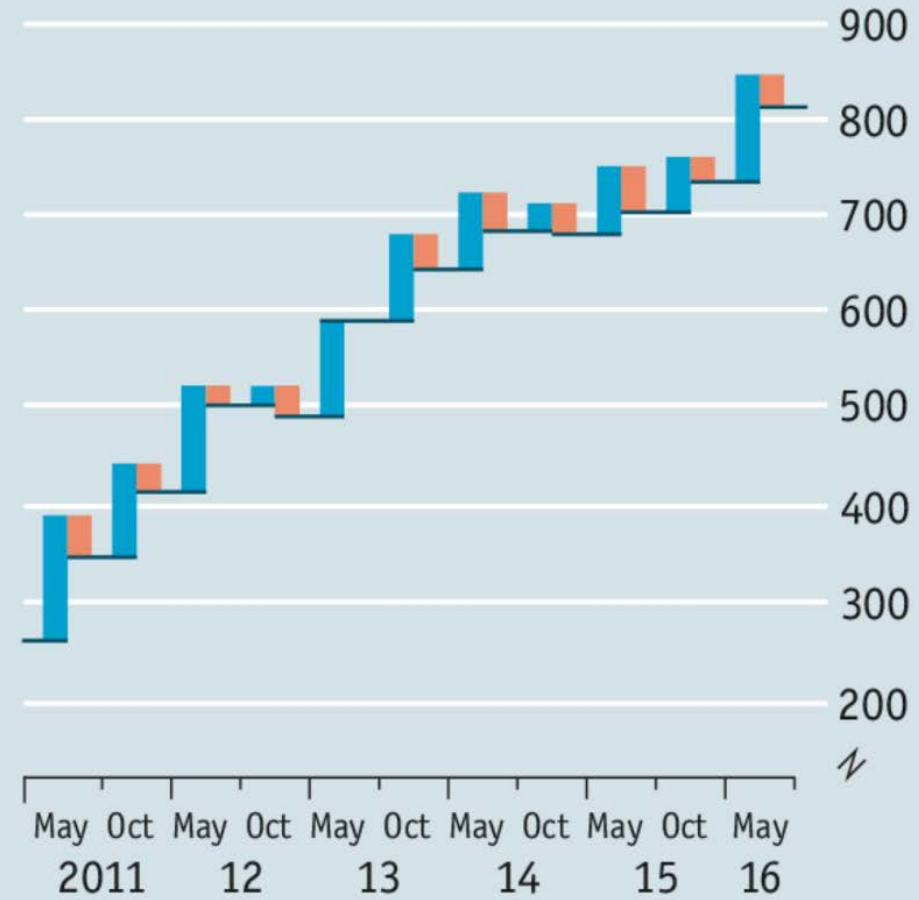
- More **sudden**
  - Shocks with immediate consequences
- More **individual**
  - We no longer go up & down “as countries”
- More **unpredictable**
  - Winners & losers hard to know *a priori*
- More **uncontrollable**
  - National policies are less influential



# One step forward, two steps back

G20 trade-restriction measures since 2010

Added Removed



Source: WTO

## Rising no more

Share of exports that participate in cross-border supply chains, %



Sources: IMF; UNCTAD



# Policy? Old & Consistent with *New Globalization*

- Enterprise
  - *Laissez-faire*
  - Market competition
  - Creative destruction (*try often, scale or fail fast, try again*)
  - Public investments in education, research & infrastructure
  - Financial/business environment conducive to private investment
- Labor
  - Ease of hiring & firing
  - Cherish labor market churning
- Social
  - Incentive-compatible social transfers
- Trade
  - Reduce hindrances for **all** cross-border flows

- 
- Hard question: *What if other countries play dirty?*

# Final observations

- Brexit & Trump:  
**free trade became a casualty...** with consequences on GVCs
- Global value chains are **not about to disappear**  
& the phenomenon still has **room to grow**
- **Fin & Swe well-positioned** in competing for  
GVCs' high value added activities

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- Needed: **Internal agility & sustained investment**  
**at the new front line of global competition –**  
**individuals' skills & competences.**

# *Thank you!*

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