

Shifting Global Order: Resilience during the Transition

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Geoeconomics & Resilience

- **Economic Statecraft:** The use of economic instruments (e.g., trade policies, sanctions, foreign aid, investment) to advance a country's foreign policy goals.
- **Offensive: Economic Power Projection**
to influence other countries through its market size, technological capabilities, and financial resources.
- **Defensive: Economic Security - Resilience**
Protecting a nation's economic interests from external threats
 - Economic coercion, disruptions to supply chains, cyberattacks
- **Co-opetition:** states compete and cooperate - strategic rivalry or alliance.

Geopolitical Shift

- Shift in **Technology**

- Increasing returns to scale



market size matters



globalization
specialized

- Shift in **World Order**

- Common framework:

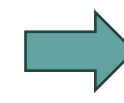
Multi-lateral

rule based

- Bargain:

Bilateral

transactional

 Geopolitical shift:

- *From* small countries (which play “some” role in multilateral organization)
 - *To* large countries/trading blocks

 - Large emerging countries take on center stage

Global Resilience Paradox: Finance and Trade and Finance

- **Pre: Mutual interdependencies** ⇒ to ensure peace/**international stability**
 - Finance: Dollar and US Treasuries at the center + Swaplines + multilateral organizations
Large reserve holdings, US invests in FDI – Bretton Woods II
“Balance of Financial Terror” (Summers)
 - Trade: “Just-in-time”, Global Value Chains “Wandel durch Handel”
Trade choke & counter choke points (# sufficiently high, exact # not relevant)

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- **Post:** individual country Resilience ⇒ less global resilience
 - Finance: Reserves (from US Dollar to gold, ...?)
 - Trade: “Just in case”, autarky, self-reliance
Minimize **choke points**
- *“Local/national resilience undermines global resilience”*
 - Global resilience as global common good
 - Underinvestment

From Unipolar to 5-polar World?

- **Hypothesis:** Unipolar world order is often followed by multipolar world with **5 poles** (stable and peaceful despite of shifting alliances and rivalries).

Why 5?

- Why odd number any power is pivotal if it switches camp (assuming symmetry)
- Why not 3? 2:1 is not sufficiently balanced
- Why not 7,9,...? Free-riding problem is too severe (Münkler, Morgenthau, E.H. Carr)

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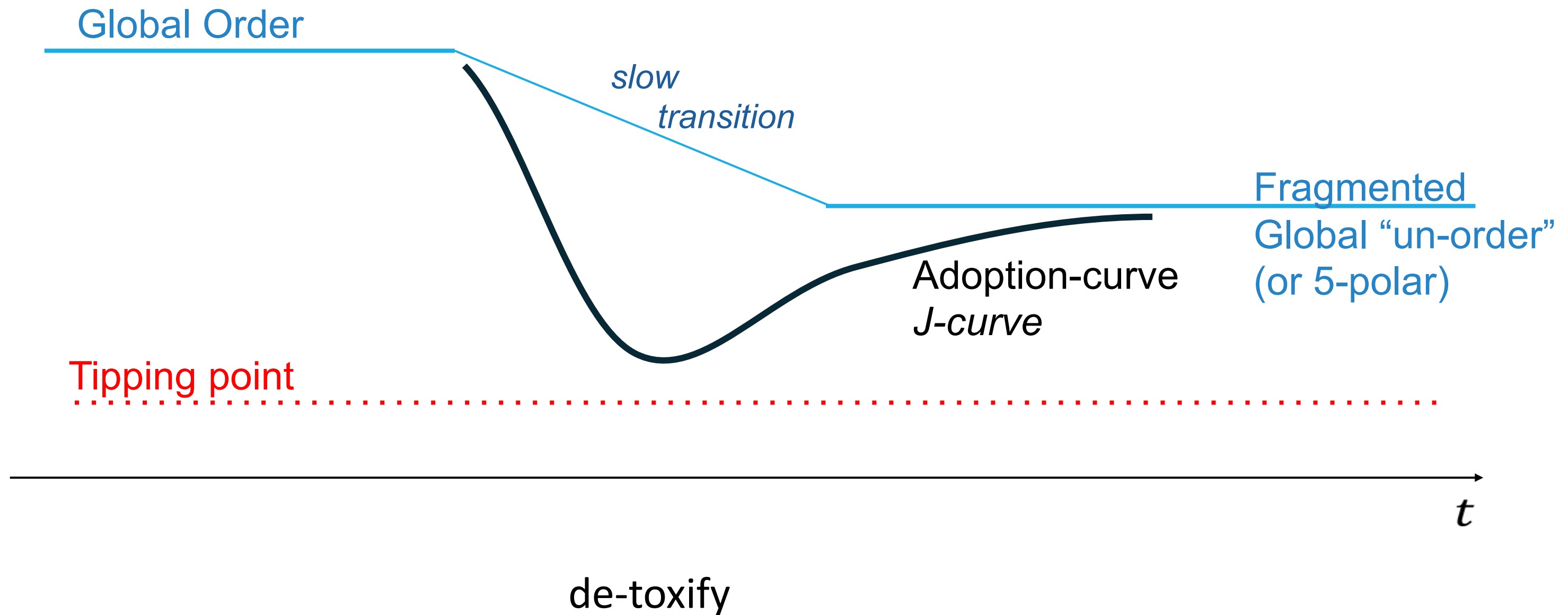
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- **Historical examples:** - always when unipolar momentum
 - *After Thirty Years War:* End of Vienna-Madrid Habsburg coalition of opponents
 - Austria-Hungary, Spain, France, England, Sweden (Spain replaced by Russia, Sweden by Prussia)
 - *After Napoleonic Wars* (+ interwar periods):
 - Austria-Hungary, Great Britain, France, Germany/Prussia, Russia
- **Future:**
 - US, China, EU, India, Russia (or Japan) Opponents: BRICS

but transition can be thorny

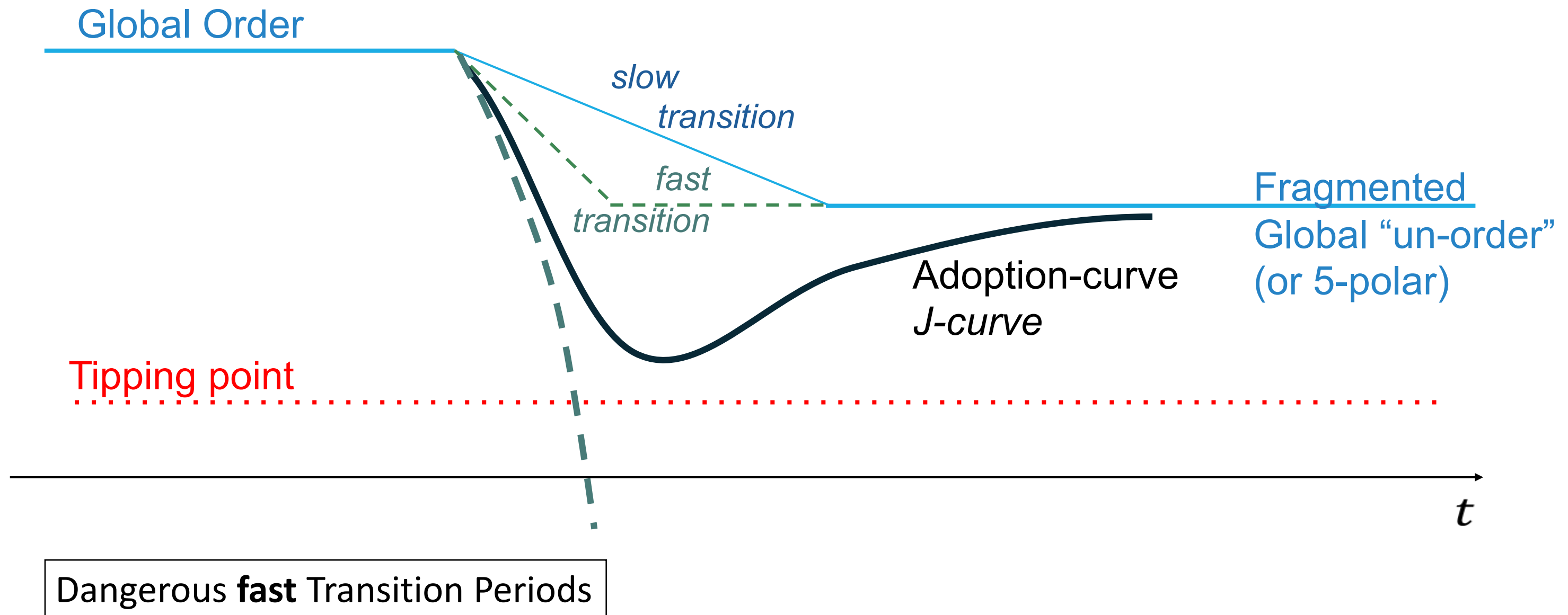
Resilience in Transformational Transition Periods

- From globalized world order (based on “balance of choke point threats”) to global “un-order”



Resilience in Transformational Transition Periods

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Roadmap

- Global Resilience Paradox
- Unipolar to multipolar world order
- Transition and Resilience

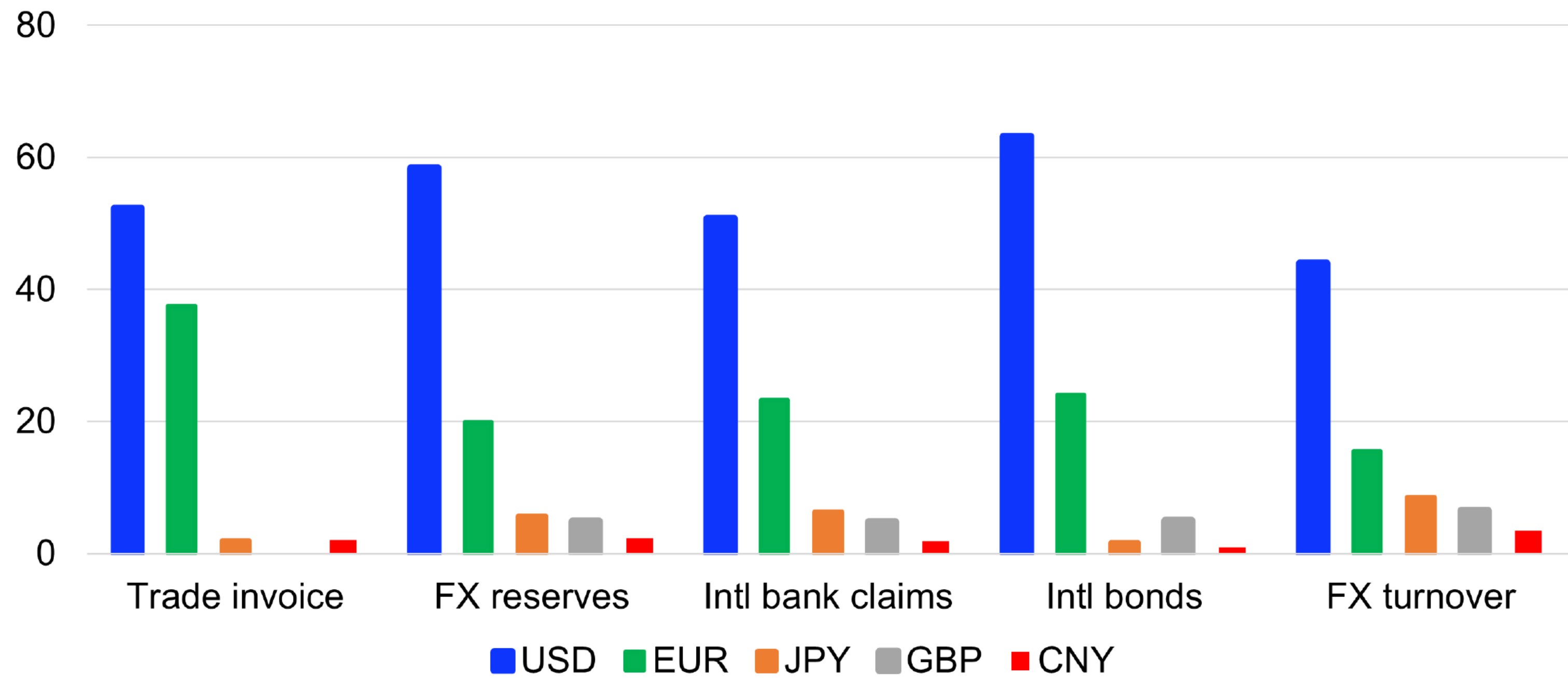
- Global Finance

- | | | |
|-----------------------|-------------|----------------------------|
| ■ Currency: | US Dollar | New digital currencies (?) |
| ■ Safe/Reserve Asset: | US Treasury | ESBies (GloSBies) |

- Global Trade

- Tariffs and choke points

Current Dominance of the US Dollar + US Treasuries



■ IMF calculations (data until 2023) – Gourinchas 2025

Currency: “Digital Currency Areas”

Positive (not normative)

Shaped by privacy regulation

- **US:** **Stablecoins** in US \$
 - programmable tokens of social networks/industry 4.0
 - Challenge: regulating stablecoins, platform **interoperability**
- **Europe:** **Digital Euro** (CBDC)
 - Consumer (not industry 4.0 focused)
 - Challenges:
 - Programmable/Smart contract integration is limited
 - CBDC as legal tender undermines smart contracts further
- **China:** **AliPay** and **WechatPay** + Digital Yuan
 - Consumer (convenience) + connection to consumer BigTech
- **EMDE:** Domestic CBDCs to fend off **digital dollarization**
 - Challenges: loss of monetary sovereignty and cheap funding

*Rent seeking by
Stablecoin companies*

offensive

defensive

Global Finance Resilience: Flexible Exchange Rates vs. Buffers

1. Exchange Rate Devaluation

- Implicit “transfer” at the expense of other countries

1. **Global risk sharing arrangement** (ex-ante perspective)

- Temporary & mutual
- Helps to bounce back (Phoenix miracle)
 - If debt is denominated in domestic currency (no “original sin”)

2. **Beggar-Thy-Neighbor**

- Continuously devalue

2. Fixed Exchange Rate & Buffers via Reserves

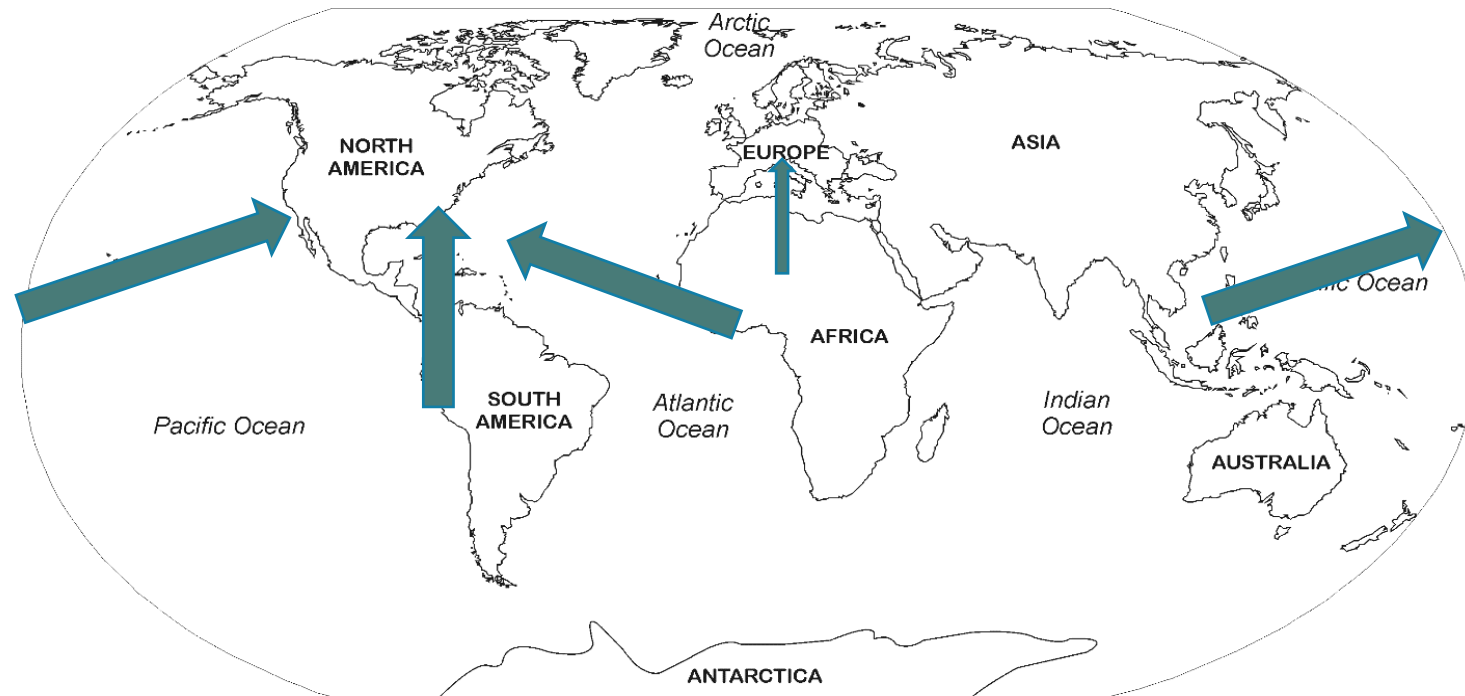
- Foreign reserves push resilience barrier further away
- ... but private sector issues more foreign denominated debt
- Push risk into the tails

Global Financial Architecture

- Flight-to-safe asset US Treasury
 - Risk-on, Risk-off
 - Tightening of US Monetary Policy
- Cross-border capital flows to safe asset
- Exorbitant privilege to issue global safe asset
- When risk rises
 - AD can issue safe asset at low interest rate
run stimulus program
 - EMDE has to pay high interest rate
run austerity program
 - The “poor” countries insure the “rich” against risk shocks.
- Source of the Problem:
Safe Asset (reserve assets) are **asymmetrically** supplied
 - Exorbitant privilege is not symmetrically distributed across countries

International: Flight to Safety

- Risk-on, Risk-off
- Flight-to-safe asset



- Problem: Safe asset is *asymmetrically supplied* by AE
- Flight-to-safety → cross-border capital flows
- Debt issues at times of global crisis
 - For AE at inflated prices eases conditions
 - For EME at depressed prices worsens conditions
- *Paradox: “Poor insure rich Paradox”*

What's a Safe Asset? What is its Service Flow?

- **Good friend analog:**

- Can sell at
 - (i) high price and
 - (ii) low-bid ask spread in crisis times (info insensitive)

1. In personal need: (idiosyncratic risk)

2. In crisis times: (systematic risk/hedge)

- Negative CAPM- β
- Precautionary savings
 - Low (cash flow) interest rate $r < g$ “Exorbitant Privilege”

- **Safe asset tautology:** it is safe because it is perceived to be safe

$$P_t = E_t[PV_{r^{**}}(\text{cash flow})] + E_t[PV_{r^{**}}(\text{service flow})]$$

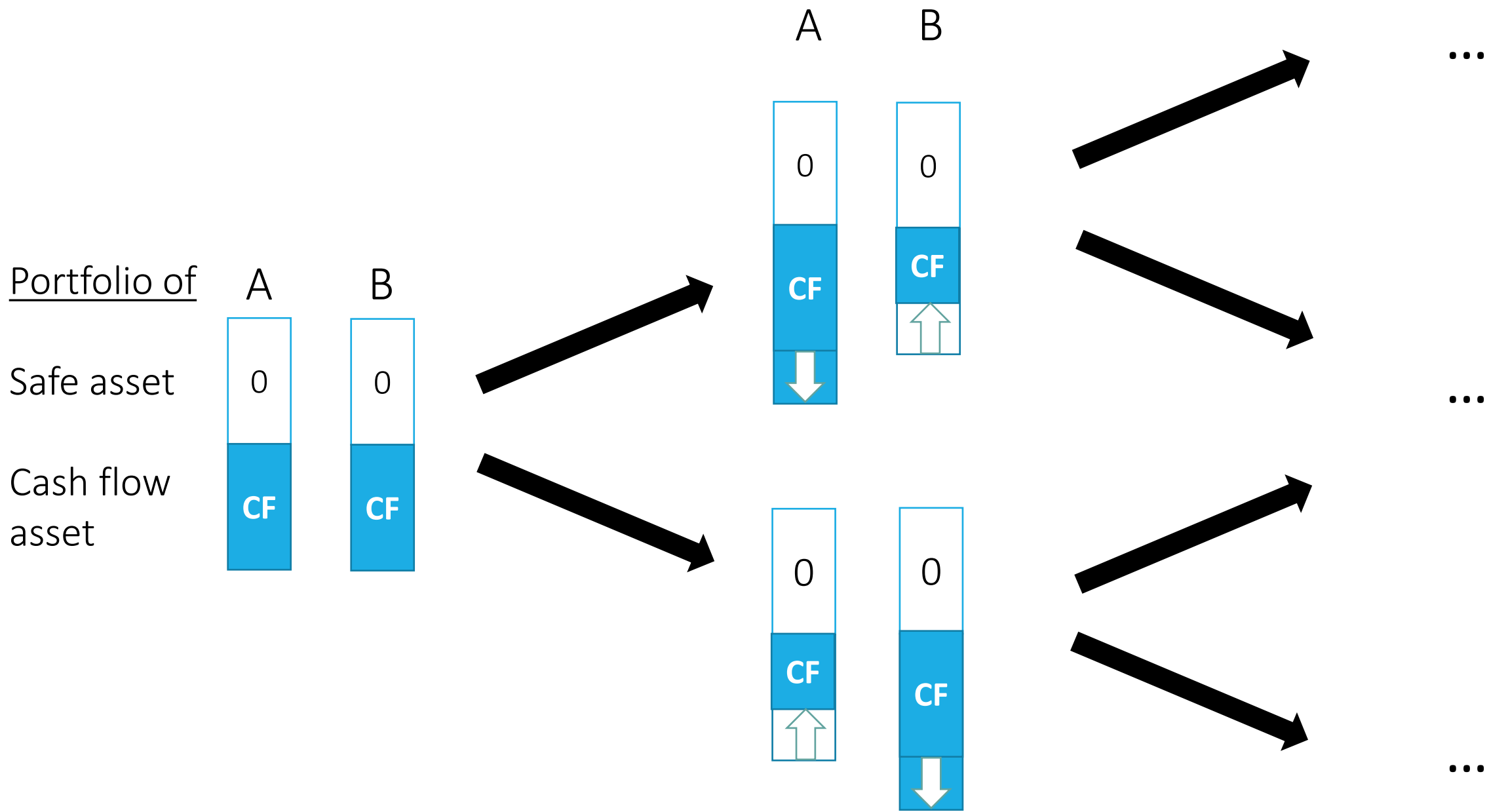
Example: interest = 0

What's a Safe Asset? What is its Service Flow?

■

$$\frac{B_t}{\wp_t} = E_t[PV_{r^{**}}(\text{primary surpluses})] + E_t[PV_{r^{**}}(\text{service flow})]$$

Example: = 0



See Brunnermeier, Merkel, Sannikov (2020). “Debt as safe asset”

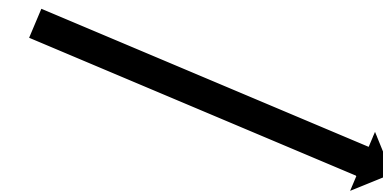
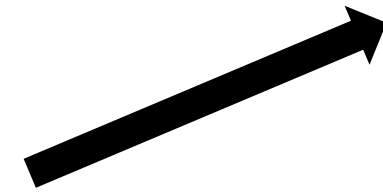
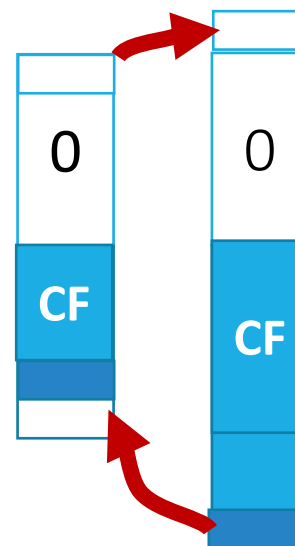
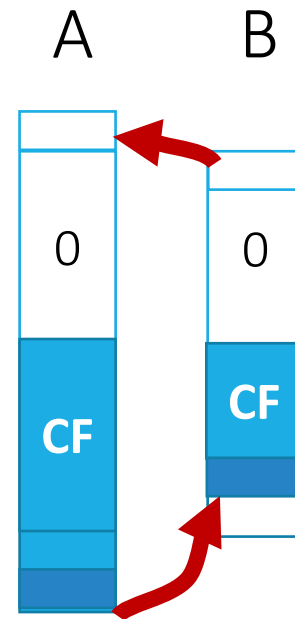
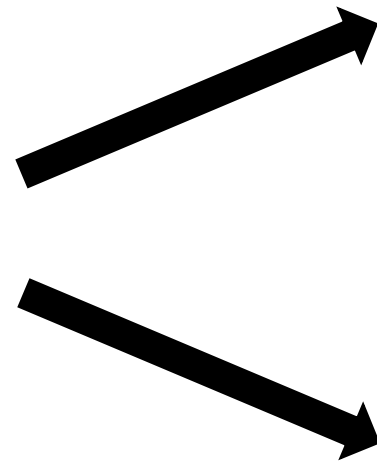
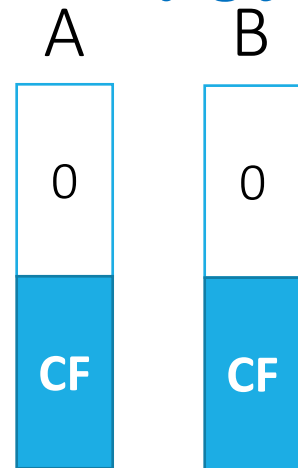
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- Value come from **re-trading**

- Insures by partially completing markets

Reduces $Var_t[\tilde{g}_c]$



...

...

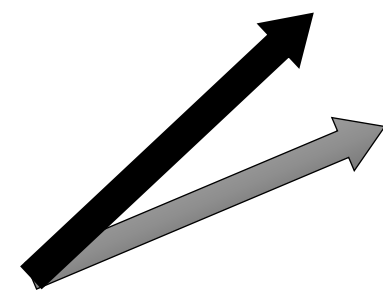
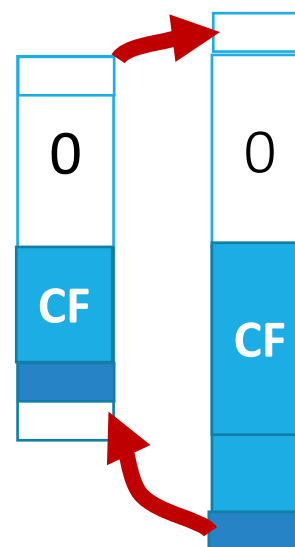
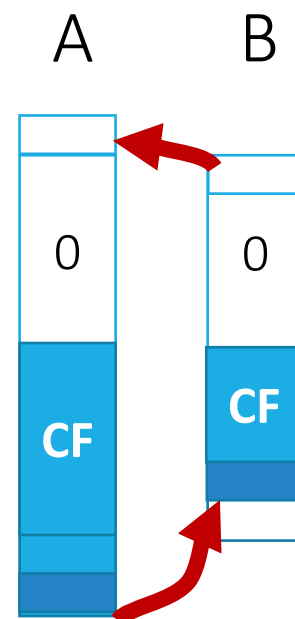
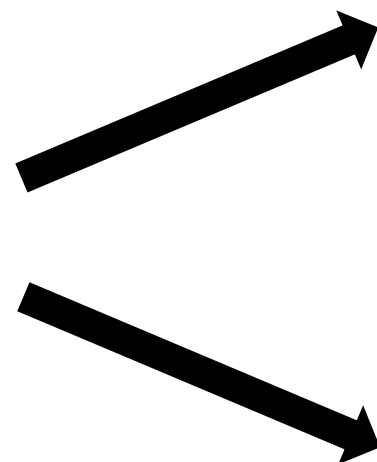
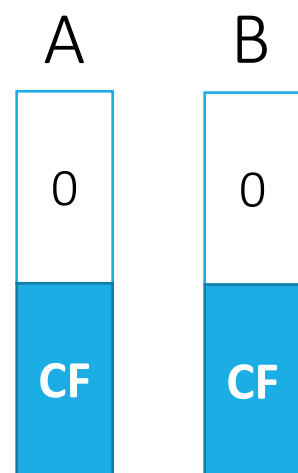
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- Can be “bubbly” = fragile

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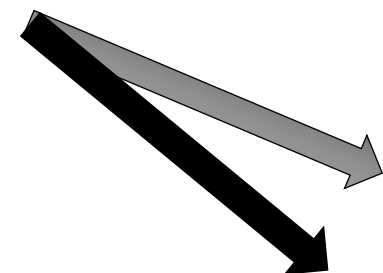
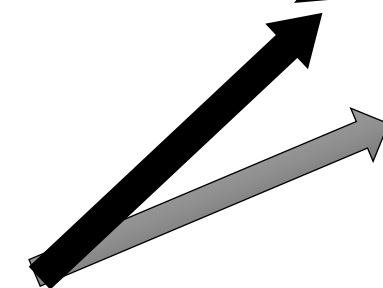
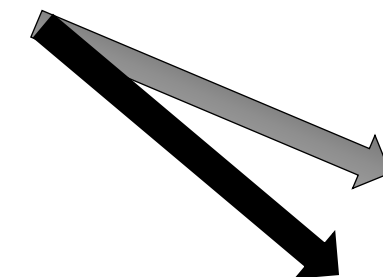
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In recessions:

Risk is higher

- Service flow is more valuable
- Cash flows are lower
(depends on fiscal policy)

...

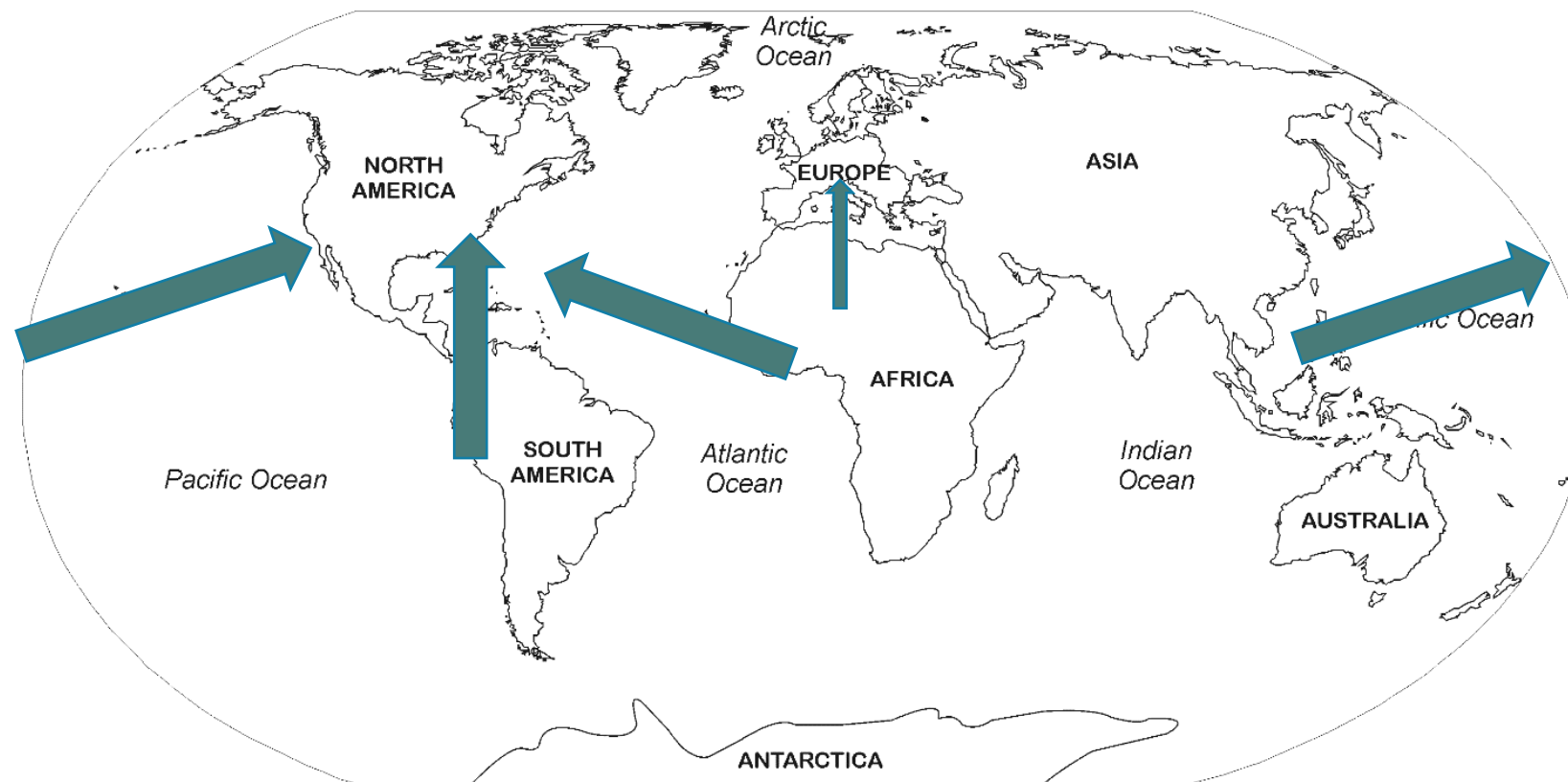


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International: Flight to Safety

- Risk-on, Risk-off Flight-to-safe asset
- Problem: Safe asset is *asymmetrically supplied* by AE
Flight-to-safety ➡ cross-border capital flows



Two Approaches

- Approach 1: “Buffer Approach” *(traditional)*
 - Lean against sudden stop (flight-to-safety) capital outflows

In a uni-polar world

- Precautionary Reserves
- IMF liquidity lines
- Central Banks Swap line arrangements

} Official sector

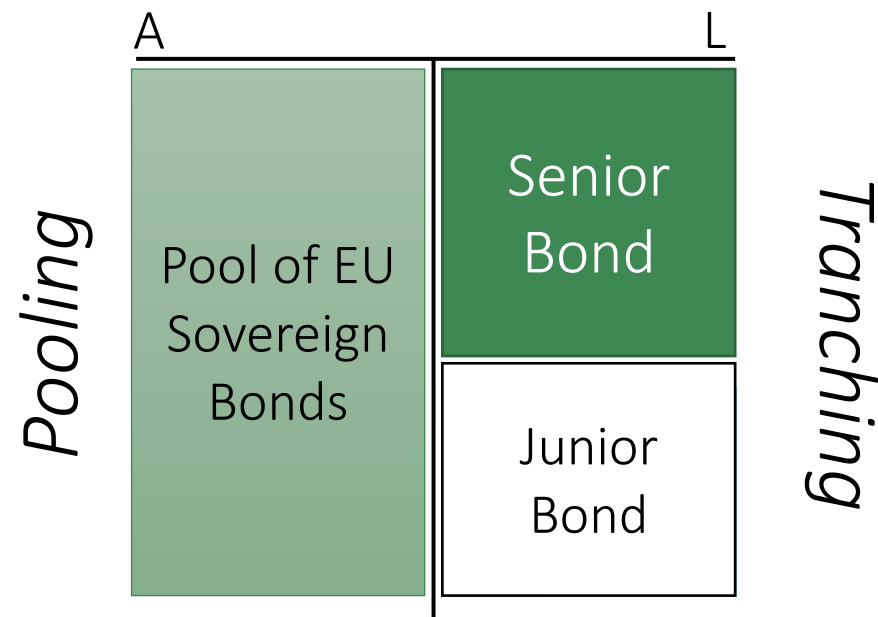
In a multi-polar world

- “Design” more safe assets ESBies/SBBS in Europe

- Approach 2: “Rechanneling Approach” *(new proposal)*
 - “Global Safe Asset from & for Emerging Economies”

Europe: ESBies/SBBS

- EU as one of the poles provides a deep and liquid safe asset market
- ESBies/SBBS (Sovereign Bond Backed Securities) Euro-nomics group 2011, 2016, 2017

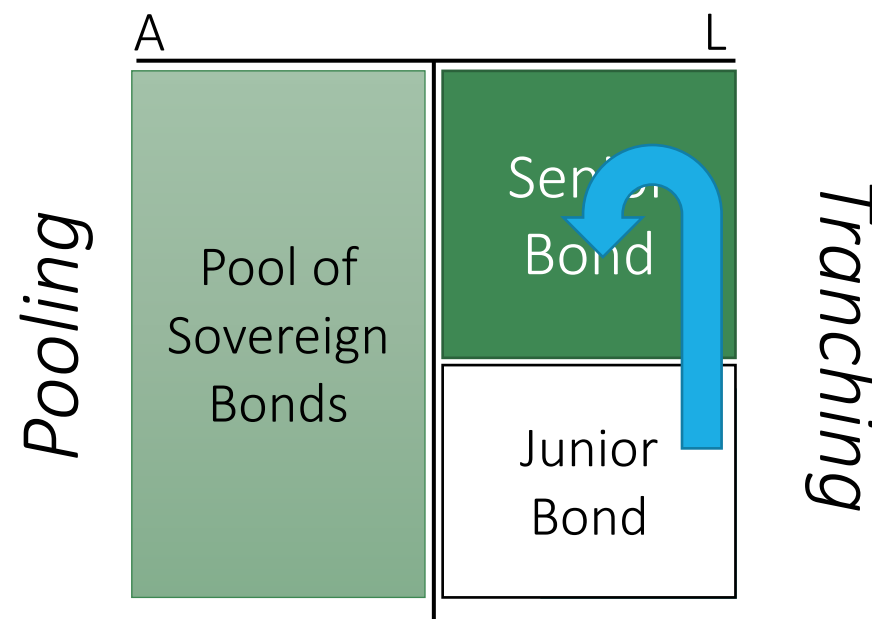


- What role does the ESM play?
- Regulatory requirements
- Europe will also enjoy “exorbitant privilege” - less asymmetric supply of safe asset

China will open financial account

Emerging Economies: Rechannelling Approach with GloSBies

- Address root cause: Safe asset is supplied asymmetrically
- Create globally supplied safe asset for EME via pooling & tranching

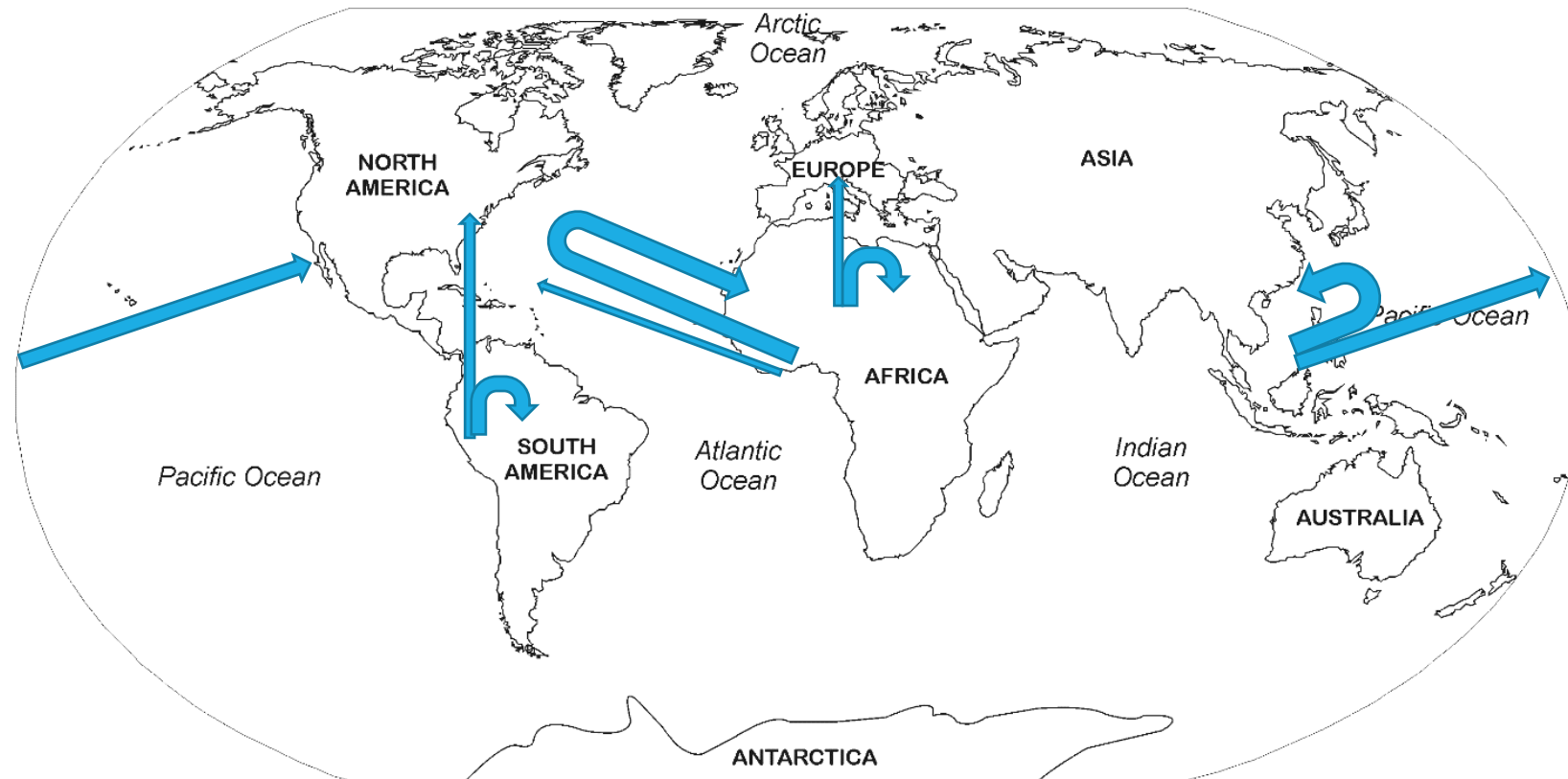


Rechannel:

Instead of cross-border
Across asset classes

International: Flight to Safety

- Risk-on, Risk-off ➡ Flight to **safe asset**
- Channels back some of flight-to-safety capital flows
fewer **cross-border** capital flows



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- Uni-polar to multi-polar world order
- Transition and Resilience

- Global Finance

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- Global Trade

- Tariffs and choke points

Trade: Response to Possible Choke/Threat Points

- **Counter threat/choke points**
 - Old world order before global fragmentation
 - “balance of choke points” (In Finance: Analogy to Summers’ “balance of finance terror”)
- **Reshoring**
- **Friend-shoring** increase trade elasticities
- **Multi-sourcing** (lack of coordination of others)
Winston Churchill: “Safety and certainty in oil lie in variety and variety alone”
- **Storage** – intertemporal substitution
 - Resilience: depends how quickly one can adapt to “attack”

Threats (opponent) vs. Risk (nature)

plays worst

random draw



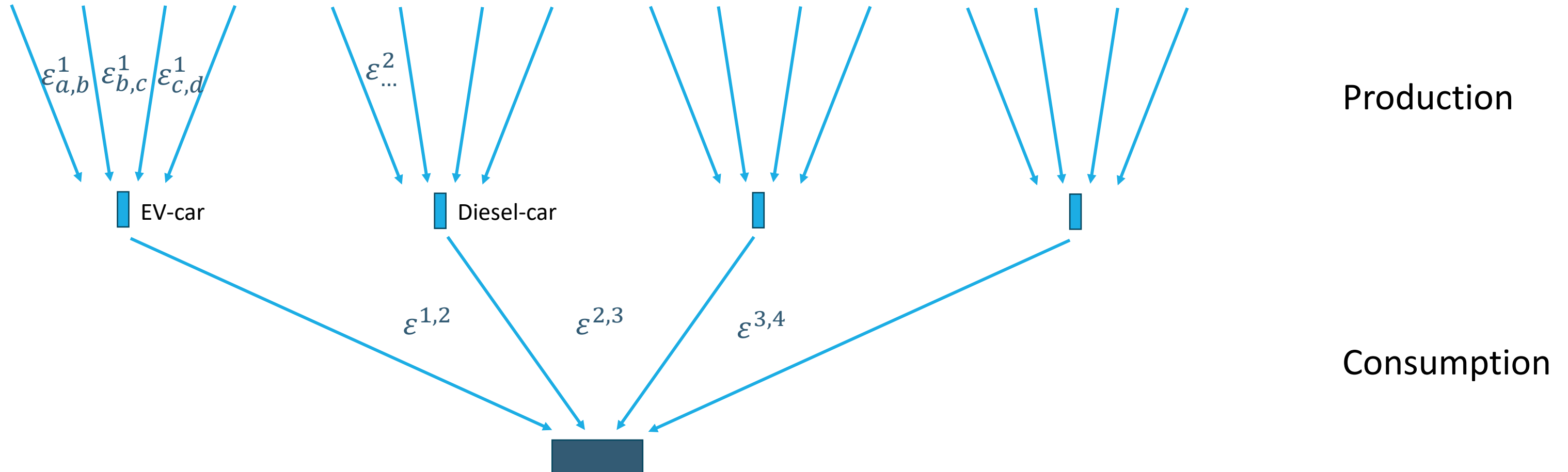
**Resilience
management**

Trade: Choke Point Analysis 101 direct production

- Elasticity of substitution (Leontief, Cobb-Douglas, Perfect Substitutes)
 - For firms: with other input goods
 - For consumers: with other consumption goods
- Time dimension: Intertemporal Elasticity of Substitution (product specific)
“Le Chatelier's Principle”
 - Learn to adjust/adapt Resilience connection
 - Price stickiness leads to delayed adaptation
- Next: Choke-points in a production chain

Trade: Choke Point Analysis 101 production chain

- Choke-points in a production chain

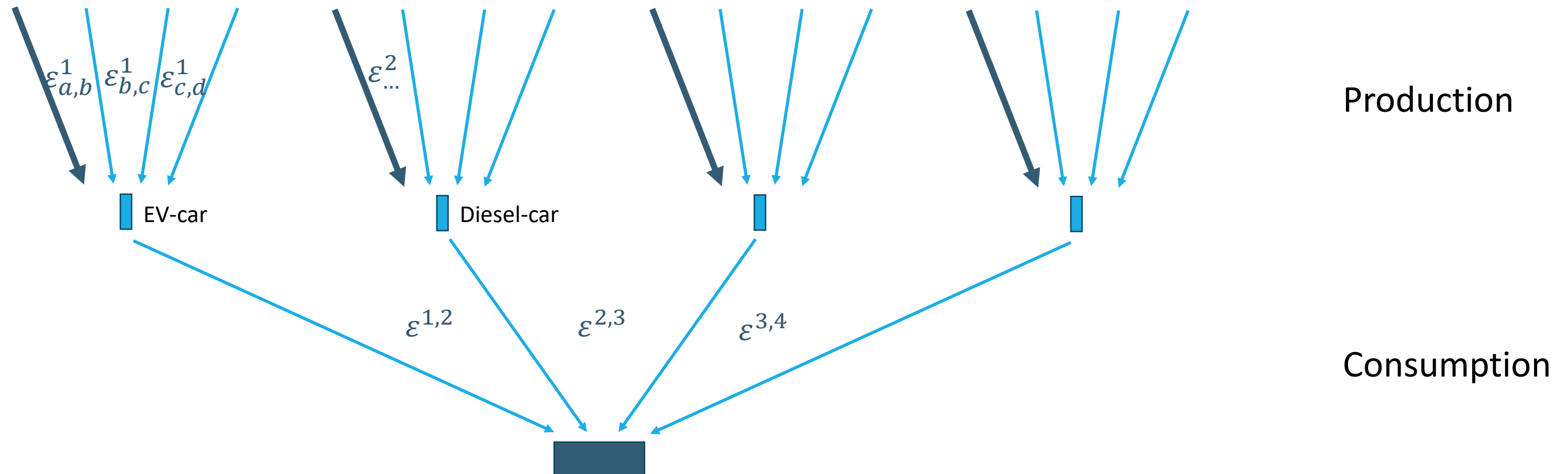


- If $\varepsilon^{1,2} = \infty$, then elasticities of substitutions of production $\varepsilon_{a,b}^1, \dots, \varepsilon_{c,d}^1$ don't matter.
- Essential consumption good, ($\varepsilon^{1,2} = 0$, Leontief): antibiotic

} ➡ Choke point

Trade: Choke Point Analysis 101 production chain

■ Choke-points in a production chain

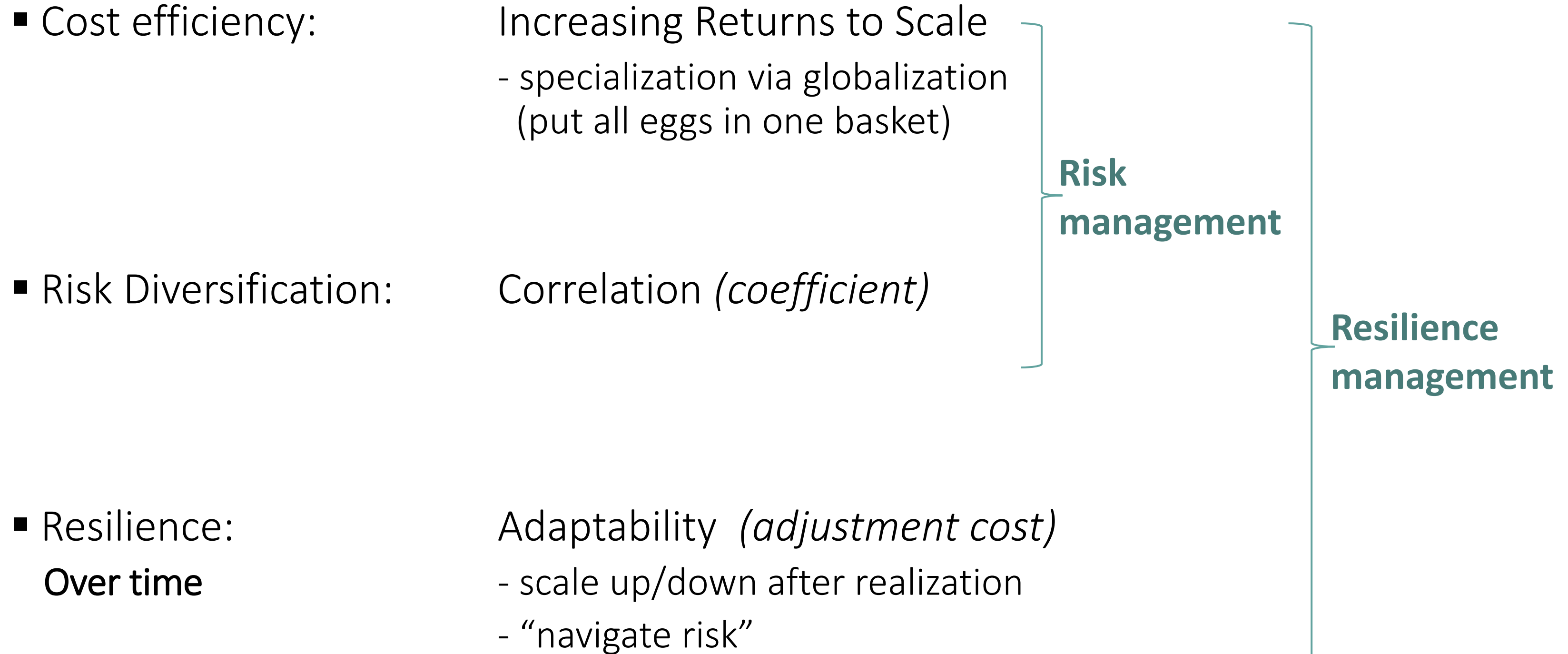


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 - Universal/essential input: Microchip, oil, ..., $\varepsilon^{2,3}, \varepsilon^{3,4}$ don't matter, but systemic if essential input
- } → Choke point

- Input-output table/matrix – elasticity networks

- Do we need a mega matrix of $\frac{N^2}{2}$ cross price-elasticities?
- For first-order **tail impact**: large shocks lead to asymptotic impact on GDP, Drew-Becker (2023)
it does **not** depend on
 - ε : - exact estimate of ε
 - Links: - not intensity
 - Up/down
 - Size: - granularity in steady state**but on**
 - only if $\varepsilon > 1$
 - existence
 - how downstream
 - granularity/size in extreme tail scenario

Cost Efficiency, Risk- and Resilience Management



Cost Efficiency, Risk- and Resilience Management

- Cost efficiency: Increasing Returns to Scale
 - specialization via globalization (put all eggs in one basket)
 - opposite of fragmentation via
 - **reshoring, friendshoring**
 - Risk Diversification: Correlation (*coefficient*)
 - **multi-sourcing**
 - Resilience: Adaptability (*adjustment cost*)
 - scale up/down after realization
 - “navigate risk”
 - prepare/invest in adaptability prior
- Risk management**
- Resilience management**

Trade Tension: Free Globalization vs. Industrial policy

- The West's best response to China's **strategic industrial policy**
following different economic model & values
- Don't throw out rulebook, but fine-tune - sophisticated **response**:
 - Buy cheaply subsidized Chinese products... and say "thank you" (e.g. solar panels),
 - **except if**
 - Static: **current** choke (threat) point (antibiotics,...)
IRS that leads to permanent trade imbalance
 - Dynamic: **future** choke point threats
loss of innovation leadership, destruction of own IRS and standard setting
In this cases impose tariffs and conduct own industrial policy
 - For products for which China has already innovation leadership
Impose FDI requires (similar what China did in earlier)

Conclusion: Geoeconomics and Resilience

- Change in world order
 - Interdependency: multilateral, globalization “Balance of choke points”
 - National resilience: bilateral, transactional, small countries suffer – Multipolar world
 - (Fast) transitions can hit tipping points if J-curve effect is too pronounced.
 - Global resilience is a common good.
- **Global Finance:** “Balance of financial terror” & Implications for global safe asset
 - Provide alternative for US Treasury ESBies GloSBies
- **Global Trade:** Choke point analysis
 - Elasticity of substitution: along production chain/across network (tricky)
 - Time dimension: resilience to bounce back
 - After shock: rebuild new links
 - Prior to shocks/moves: invest in adaptability Threat sufficient to avoid **systemic** shock (since against opponent, not nature/random)