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*Discussion of Maury Obstfeld's*  
**Global Dimensions of US Monetary Policy**

**Monetary Policy Strategy, Tools & Communication Practices**

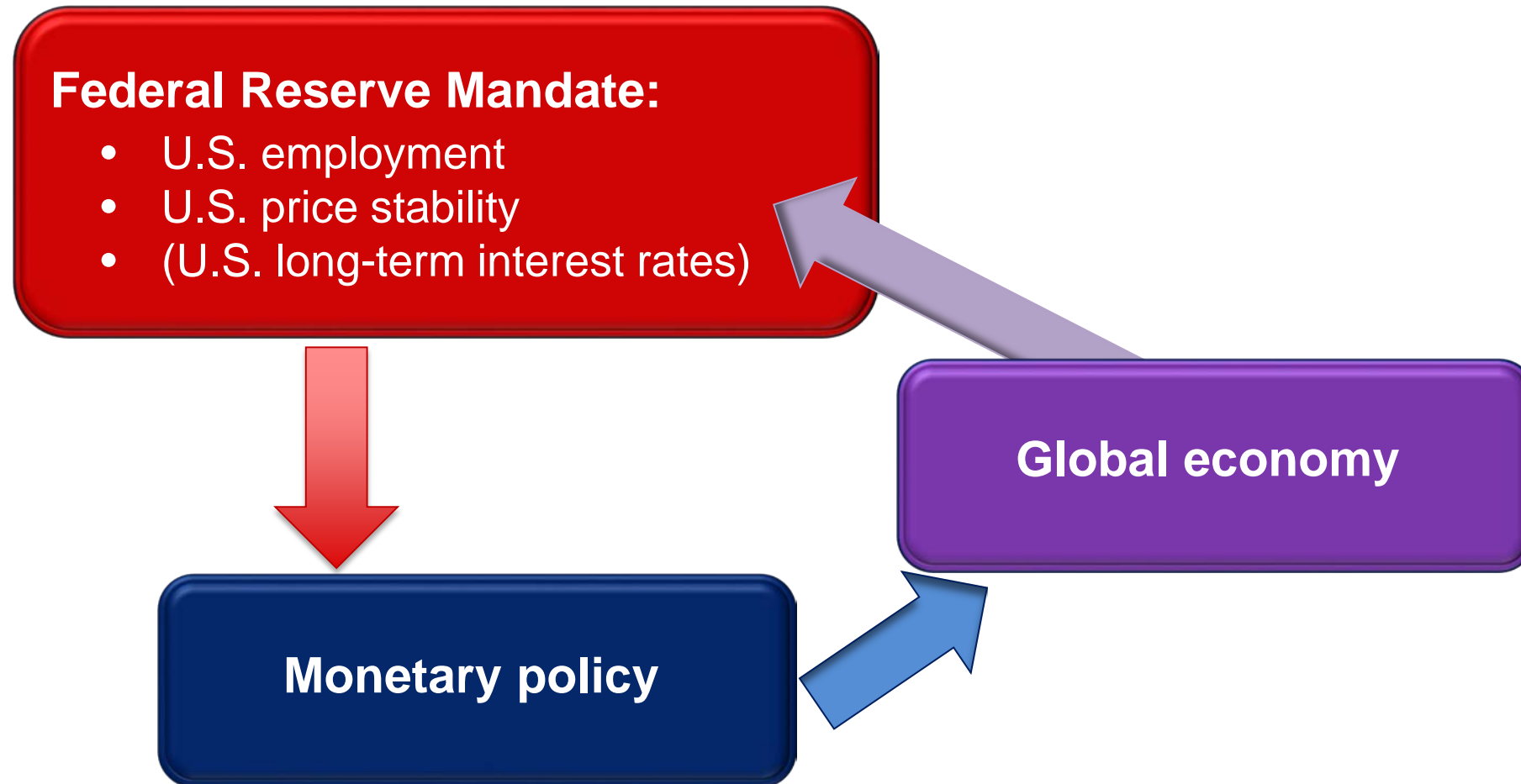
*A Fed Listens event*

**Federal Reserve Bank of Chicago**

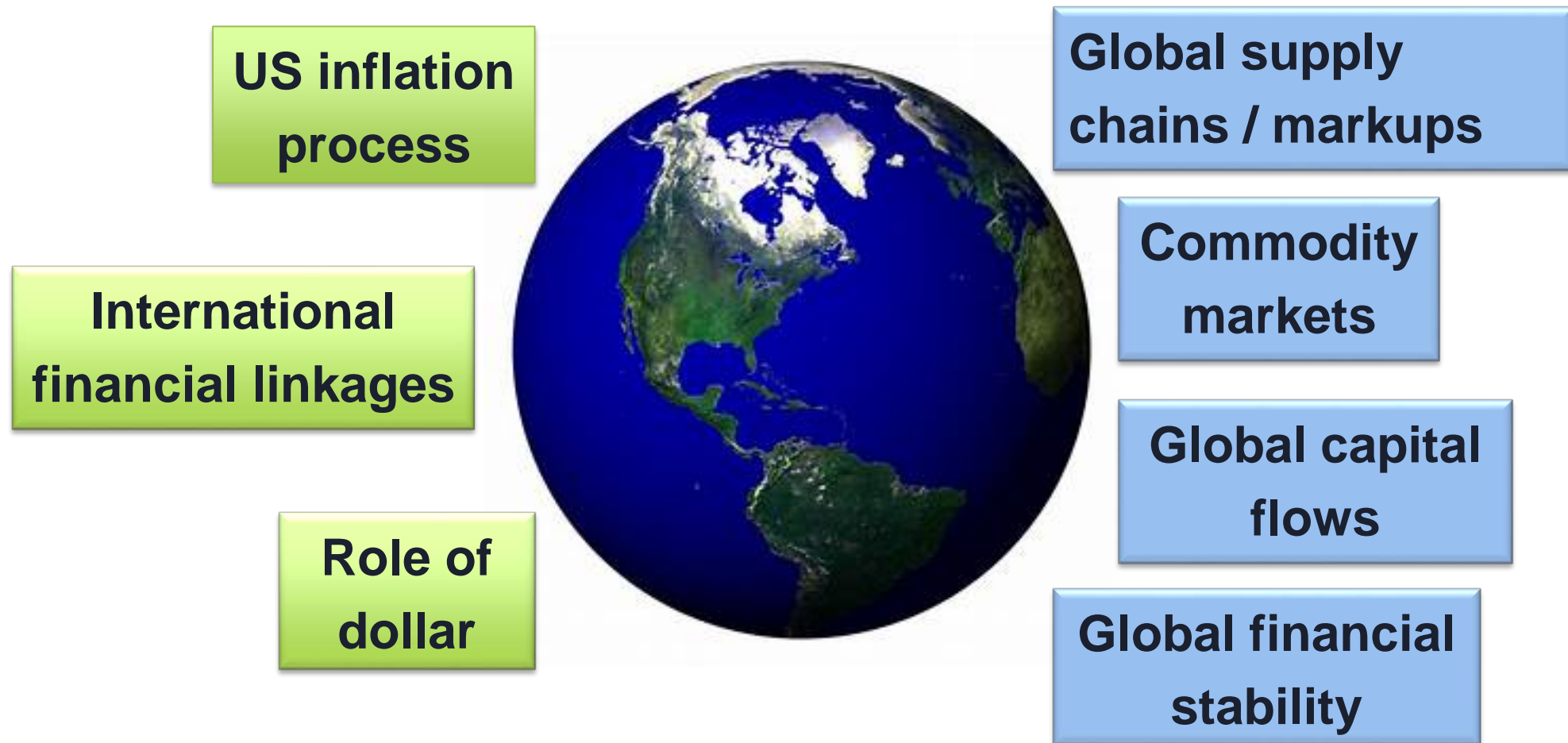
**June 4-5, 2019**



# Important Paper



# Many Potential Linkages



Source of globe image: <https://www.evl.uic.edu/pape/Gallery/PreLit.html>



# Obstfeld: Key Points

- **Overall: skeptical lens**
- **Key parts of analysis:**
  - **US inflation process:** more skeptical
  - **International financial linkages:** important role of global factor in  $r^*$  and current accounts
  - **Dollar's global role:** important “spillbacks” through dollar invoicing and funding
- **Conclusions**
  - Global influences matter
  - Can complicate monetary policy; “divine coincidence” less likely
  - **“much we still need to learn”**
  - An integrated picture of this “elephant” remains elusive



*Part I:*

*The Inflation Process*



# Global Aspects of US Inflation Process

- **3 main channels:**
  - Global competition
  - Wage behavior
  - Foreign prices
- **Important contribution: context of simple models**
  - Phillips curve: shifts vs. slopes
  - Can be counteracting effects
  - Bottom line: empirical estimates needed
- **Obstfeld results: correlates of US CPI**
  - Declining role of domestic wages and labor productivity
  - Mixed evidence on role of import prices (↑ post-2007)
  - **Unresolved: what explains the large residuals?**

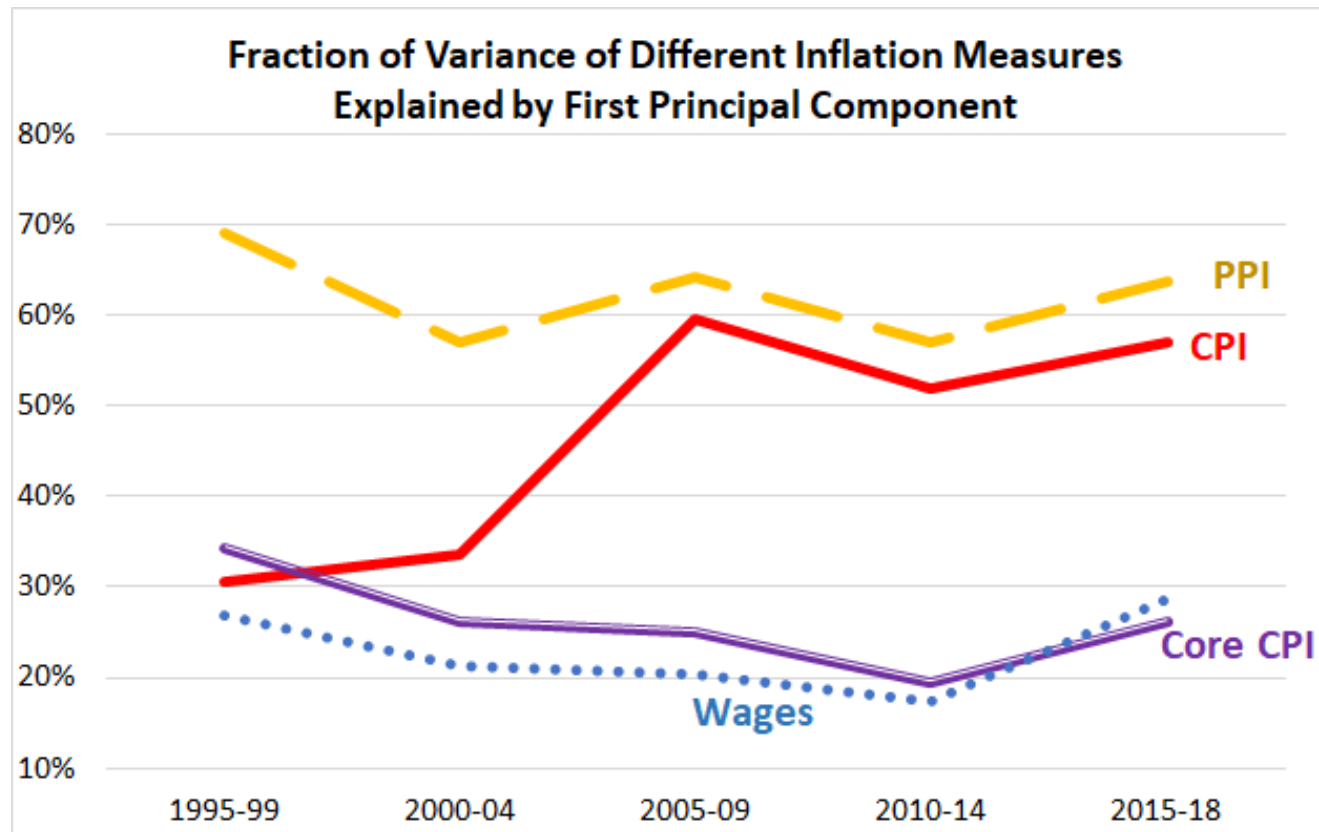


# Comments

- **More work needed!**
- **Some gaps:**
  - Changing role of global environment over time—dates matter
  - Changing role of markups/global competition?
    - Jackson Hole 2018 symposium papers: Van Reenen, Crouzet & Eberly, Philippon
  - Changing role of exchange rates?
    - Forbes, Hjortsoe & Nenova (2018), Ha, Stocker & Yilmazkuday (2019)
  - Changing role of commodity prices?
    - Miles *et al.* (2017), World Bank (2018), Coibion & Gorodnichenko (2015)



# Greater Role for Commodity Prices?



**Notes:** Fraction of variance of different inflation measures explained by 1<sup>st</sup> principal component for relevant measure of inflation. All measures of inflation are quarterly, annualized and seasonally adjusted. Wages is a measures of private-sector wage growth. Sample of 31 advanced economies. Source: Forbes (2019, forthcoming BPEA)





# Implication

- **One variable for “import prices” not enough**
- **Should better isolate different global influences**
  - Commodity prices (oil and others)
  - Exchange rate effects
  - Foreign output gap
  - Global supply chains/global competition



# Expanded Model

Standard domestic controls

$$\pi_t = \underbrace{\alpha_1 \pi_t^e + \alpha_1 \pi_t^L + \beta GAP_t^D}_{\text{Standard domestic controls}} + Constant + \epsilon_t$$
$$+ \underbrace{\gamma_1 ER_t + \gamma_2 GAP_t^F + \gamma_3 Oil_t^W + \gamma_4 Comm_t^W + \gamma_5 PriceDisp_t^W}_{\text{Additional global controls}}$$

Additional global controls

$\pi_t$  : CPI inflation (quarterly, annualized & seasonally adjusted)

$\pi_t^e$  : inflation expectations

$\pi_t^L$  : lagged inflation

$GAP_t^D$  : domestic output gap

$ER_t$ :  $\Delta$  in trade-weighted exchange rate

$GAP_t^F$  : foreign output gap

$Comm_t^W$ : commodity (ex. energy) price inflation (relative to CPI)

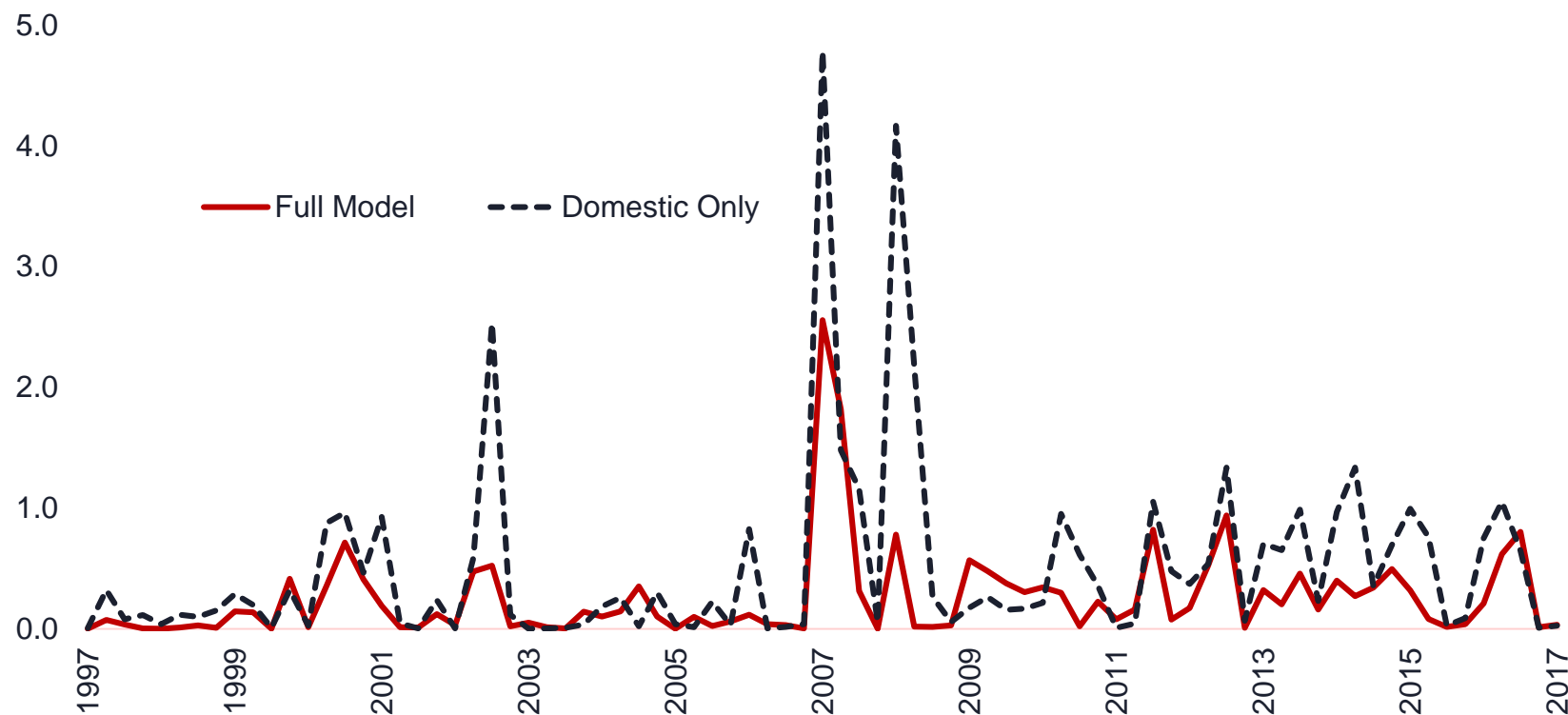
$Oil_t^W$ : oil price inflation (relative to CPI)

$PriceDisp_t^W$ : price dispersion in PPI in sample



# Errors in Phillips Curve Model

## *CPI Inflation, 43 countries*



**Source:** Figure 5(a) in Forbes (2018), paper prepared for BIS.

**Notes:** Graph shows median value of the squared deviation between actual and predicted inflation each quarter when Phillips-curve equation is estimated with 8-year rolling regressions. "Only Domestic Variables" is when the model only includes controls for inflation expectations, lagged inflation, and the domestic output gap. "Domestic + Global" adds 5 global variables.



*Part II:*  
*International Financial*  
*Linkages*



# International Financial Linkages

- **Paper focuses on 4 main channels:**
  - $R^*$
  - Current account balances
  - Real exchange rates
  - Dollar liquidity shocks
- **Also important: Implications for net worth & consumer spending** → monetary policy



*Part III: Spillbacks —  
Implications of the Dollar's  
Global Role*

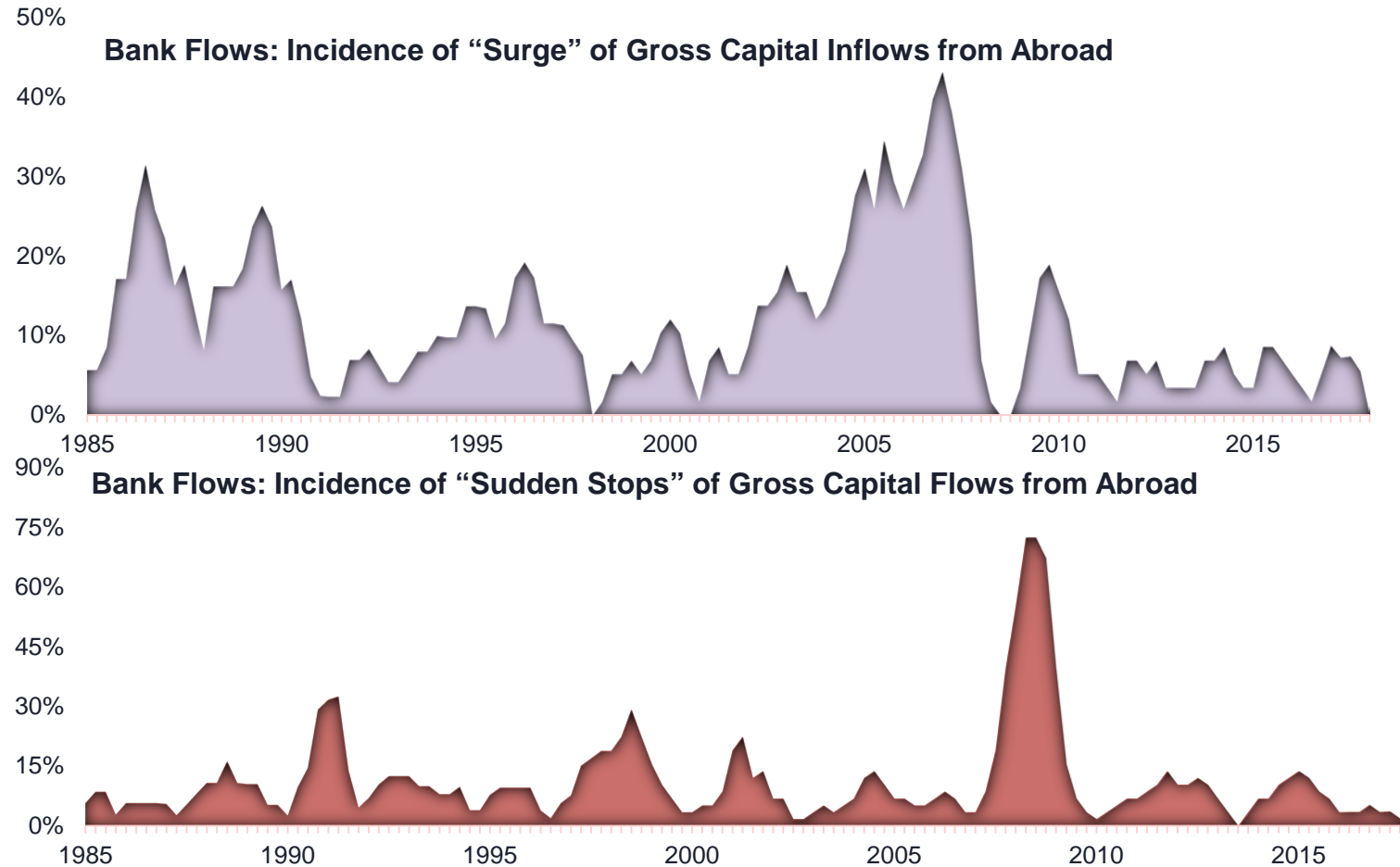


# Spillbacks

- **Paper focuses on spillbacks through dollar's role:**
  - Dollar invoicing
  - Dollar funding
- **But also other potentially important spillbacks:**
  - Commodity markets
  - Capital flows
  - Crisis risk in other countries
- **Reduced spillbacks recently?**
  - Fewer sudden stops and surges in capital flows?
  - Updated episodes, based on Forbes and Warnock (2012)



# Reduced Spillbacks through Banking Flows?



**Source:** Based on updated data and methodology from Forbes and Warnock (2012). Data through 2018Q3.



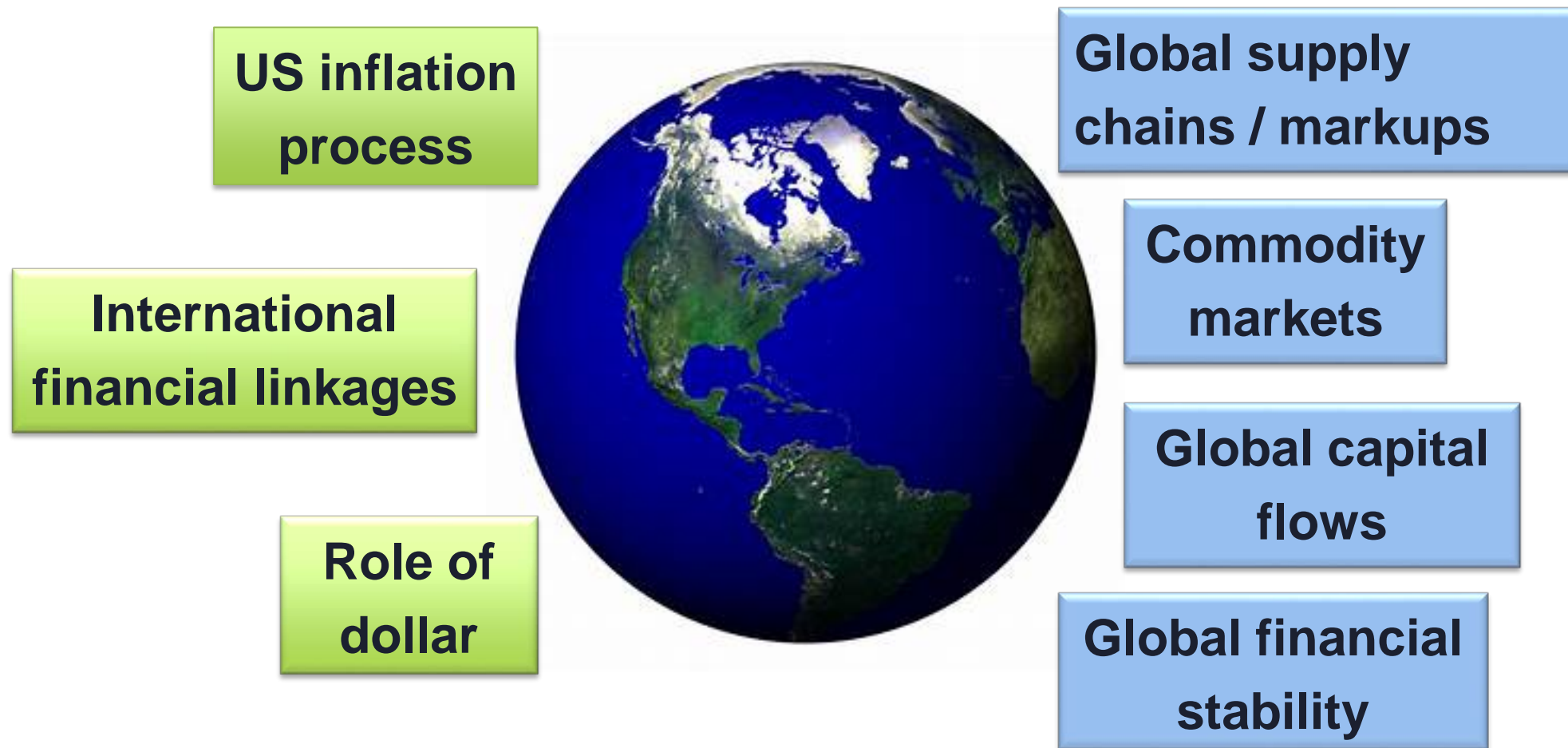


# *Final Thoughts*



# “Much We Still Need to Learn”

*What has  
changed?*



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