Energy Prices, Business Cycles, and Financial Crises
The Argument for Cycle Attenuation

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Frequency and Causes of Crises
Globalizations Past and Present

Reckless Lending Era 1850s–1870s: Major currency and banking crises

Gold Standard Era 1880–1913: Some currency and banking crises

Between Wars 1919–1939: Numerous currency and banking crises

Bretton Woods 1945–1971: Many currency crises but no banking crises

Dollar Era 1973–present: Numerous currency & many banking crises

Trade surpluses, Reckless Lending, and Recent Crises 1980–present:

1980s **Scandinavia & Latin America:** Reckless lending fueled bubbles
that collapsed with oil prices, leading to currency and banking crises

1990s **Japan, Asia:** Supporting the Dollar and reckless lending fueled
bubbles, which burst with tightened monetary policy, banking crisis

2000s **Contagion** + record U.S. debt pose substantial global-systemic risk
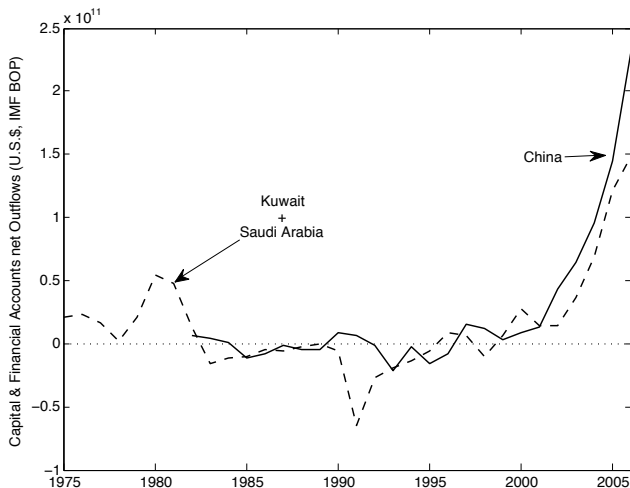
Coincidence of High Oil Prices with Financial Crises
Crises Severest 1850s-70s (before gold standard), and 1970s– (after Bretton Woods)
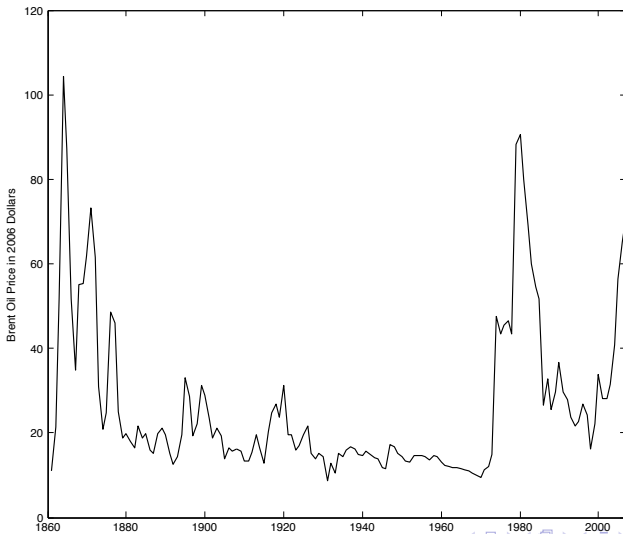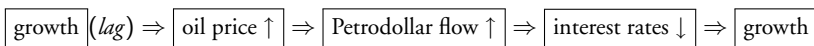
Asian Savings Glut and The Return of Recycled Petrodollars
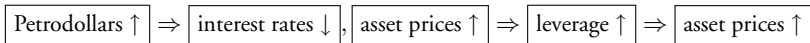## Contagion + Petrodollar Flows Have Contributed Substantially to Bubbles & Inflation
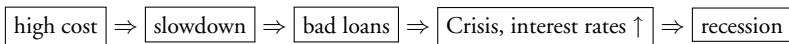
Cyclical Petrodollar Recycling and Financial Crises
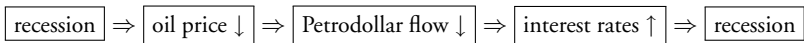
- Feedback mechanism during booms

  $\boxed{\text{growth}}\,(\textit{lag}) \Rightarrow \boxed{\text{oil price} \uparrow} \Rightarrow \boxed{\text{Petrodollar flow} \uparrow} \Rightarrow \boxed{\text{interest rates} \downarrow} \Rightarrow \boxed{\text{growth}}$

- Hubris (80's: *countries don't go bankrupt;* 00's: *house prices don't fall !*)

  $\boxed{\text{Petrodollars} \uparrow} \Rightarrow \boxed{\text{interest rates} \downarrow}, \boxed{\text{asset prices} \uparrow} \Rightarrow \boxed{\text{leverage} \uparrow} \Rightarrow \boxed{\text{asset prices} \uparrow}$

- Eventually (Minsky moment; Ponzi finance)

  $\boxed{\text{high cost}} \Rightarrow \boxed{\text{slowdown}} \Rightarrow \boxed{\text{bad loans}} \Rightarrow \boxed{\text{Crisis, interest rates} \uparrow} \Rightarrow \boxed{\text{recession}}$

- Feedback mechanism during busts

  $\boxed{\text{recession}} \Rightarrow \boxed{\text{oil price} \downarrow} \Rightarrow \boxed{\text{Petrodollar flow} \downarrow} \Rightarrow \boxed{\text{interest rates} \uparrow} \Rightarrow \boxed{\text{recession}}$
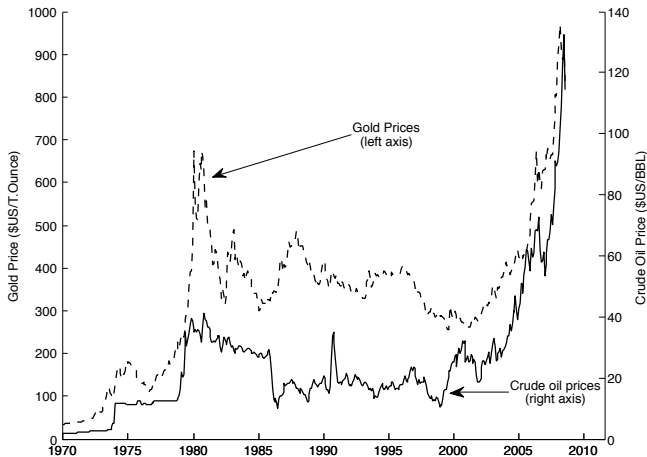
- Low cost of production + monetary and fiscal policies (*lag*) $\Rightarrow$
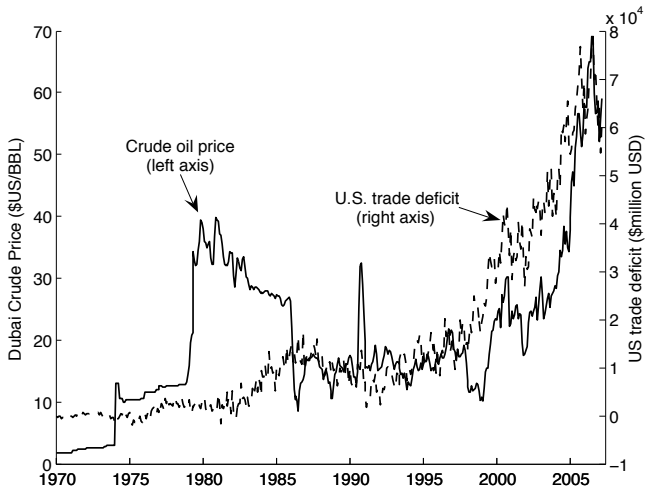 economic growth + geopolitical strife (*lag*) $\Rightarrow$ $\boxed{\text{oil price} \uparrow}$

Lag in Oil-Price Responses, Lag in Capacity Development
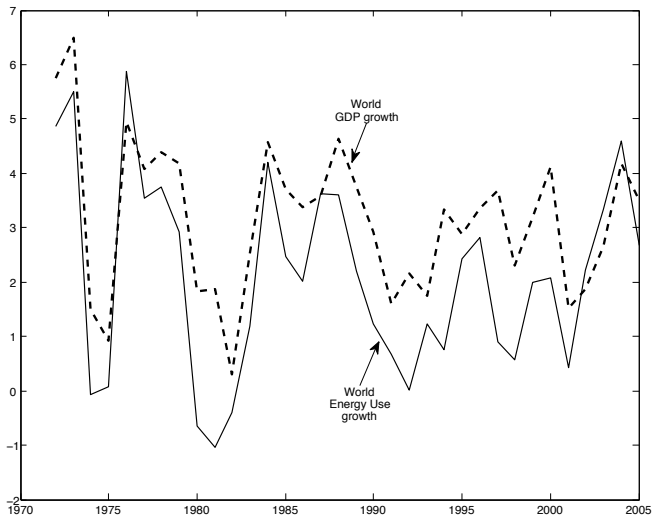## Declining Real Oil Prices Precede Jumps

The Absence of Automatic Exchange-Rate Cycle Attenuation
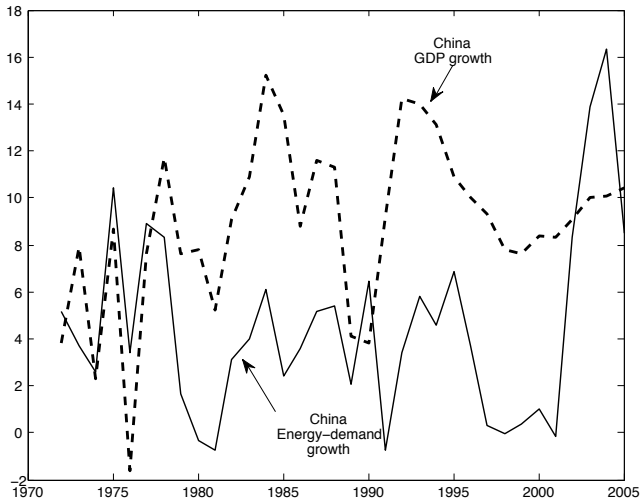## Trade Deficits, Debts, Debased Dollars, and Oil

Self-Perpetuating Cycle, Magnified during Financial Crises
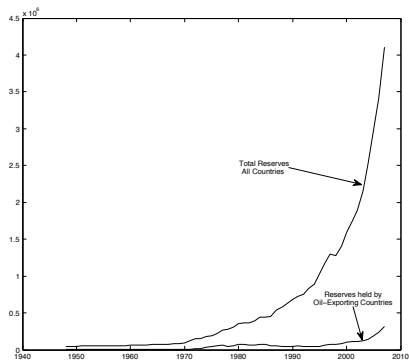Amy's Presentation Will Cover Current Decline in Demand

China's Dependent Business Cycle
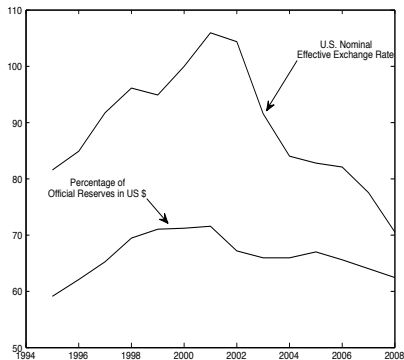
The Dangerous Mirages of "Economic Miracles"

Beginning of the End for the Dollar Era?
Compare to British Pound A Century Ago

Total Official Reserves (millions of SDRs)

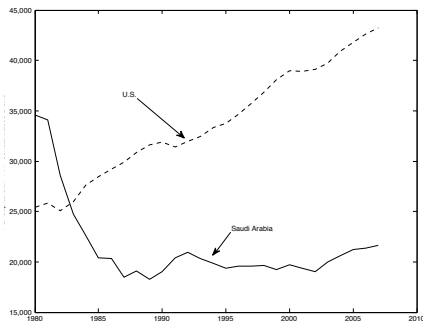Percentage of Official Reserves in U.S.$

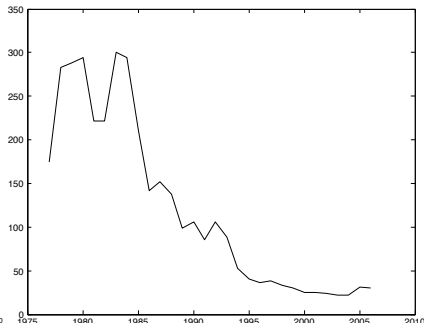# Inevitable Cycle, Amplitude Ramifications
Ramifications for Middle-East

Upswing amplifiers: Cheap-money driven bubbles and financial crises
Amplification catalyst: Amnesia/hubris: "This time is different"
Downswing amplifiers: Socioeconomic & geopolitical costs

Saudi vs. U.S. Real Per-Capita GDP

Real Per-Capita Egyptian Worker Remittances

The Need for Counter-Cyclical SWF Investments
Avoiding Extreme Fluctuations through Cycle Attenuation

Paradox 1: Middle-East Sovereign Wealth Funds invest pro-cyclically
(data collected by Chhaochharia and Laeven, 2008)

- Focus on private equity deals in Middle East
- Focus on oil & gas (ADIA), financials (KIA),
  utilities (QIA)
- U.S. exposure too much (KIA) or too little (ADIA)

Paradox 2: Banking crisis flight to safety led to Dollar appreciation!

Attenuate: Invest in fuel-production capacity during recessions

Diversify: Invest in alternative energy, green technology, etc.

Balance: America & Middle East need to consume less and invest
more, Asia needs to consume more and save less