How to Stop Deflation with Fiscal Policy: Past Lessons for the Future

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Macro Policies

- Can we distinguish monetary from fiscal policy?
  1. both issue interest-bearing “safe” liabilities
  2. denominated in “dollars”
  3. ultimately backed by primary budget surpluses
  4. price level must clear both money & bond markets
- Variation in expected surpluses alters rate of exchange between nominal govt liabilities and goods
  - this is the price level
- Price level always determined by both MP & FP
- In thinking about P, key distinction between policies is who controls the levers
  - fiscal authority controls the backing that gives liabilities value

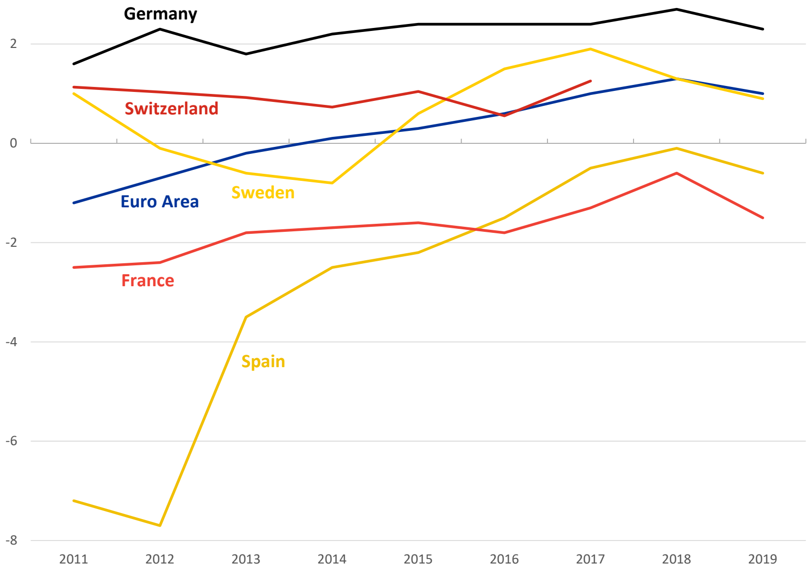
Two Examples of Joint Policies

1. Incoherent policies: European efforts to hit inflation targets
   - MP interest rates negative & large asset purchases
   - long-term bond yields also negative
   - inflation chronically below target
   - FP chronically tight, retiring debt
   - makes sense *only if* believe FP irrelevant for inflation
2. Coherent policies: U.S. recovery from Great Depression
   - abandoned convertibility to gold
   - created genuinely nominal government debt
   - MP at ZLB
   - FP expansionary, financed with new nominal bonds
   - FDR convinced people debt expansion **unbacked**

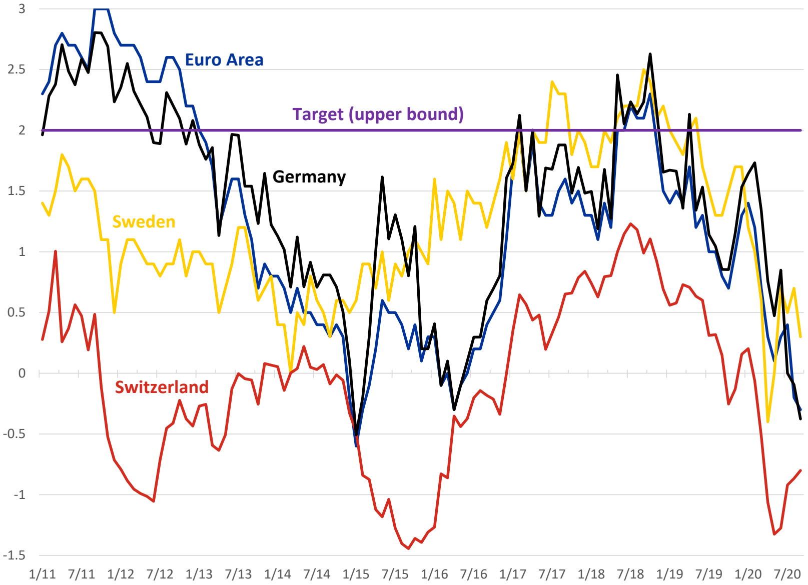
European Monetary Policy (pre-Covid)

- Negative policy interest rates
  1. Euro Area: since June 2014
  2. Sweden: since February 2015
  3. Switzerland: since December 2014
- Increases in central bank assets since 2006
  1. Euro Area: 4.5 $\times$
  2. Sweden: 5.1 $\times$
  3. Switzerland: 8.3 $\times$
- Basic theory: MP can raise inflation only if. . .
  - backed by appropriately expansionary FP
  - this is what “passive” FP delivers
  - Europe has been all about fiscal consolidation

European Fiscal Behavior



European Inflation

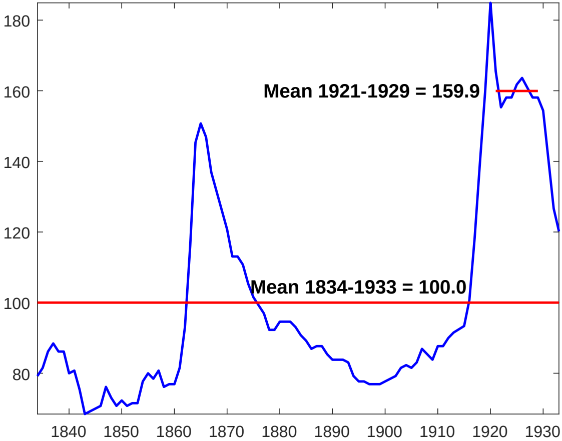


Policies Working Together

- Thesis: *unbacked fiscal expansion* triggered America's recovery from the Great Depression
- Two steps
  1. Monetary: reduced gold value of $, abandoned convertibility of gold, abrogated gold clauses
  2. Fiscal: expanded government spending financed with nominal bonds and convinced people bonds would not be backed by taxes until economy recovered
- Monetary component necessary for fiscal step
  - under convertibility: bonds are claims to gold
  - credibility requires bonds be backed fully by taxes
  - revoking convertibility made bonds genuinely nominal
- Policy explicitly state-dependent, lasting until economy & prices recovered
  - fiscal communication essential to implementation

The Policy Problem

- Gold standard $\Rightarrow$ price level mean reverting, but reversion can take decades



CPI since 1834 Coinage Act setting 1 oz. gold $=$ \$20.67, rescaled to make mean $=$ 100

The Policy Problem

- FDR & Congress concerned about debtors who incurred their debts at 1920s prices
  - deflation raised real costs of debt obligations
  - household debt-income ratio peaked at 80% in 1933
  - farm foreclosures tripled in 1933
- Policy objective called for *permanent* increase of the price level to level 60% above long-run average
  - requires substantial permanent revaluation of dollar price of gold
  - without revaluation, gold cover ratio would fall below legal standard
- Cannot permanently raise price level under classical gold standard

VAR Evidence from 1930s

- Surpluses quantitatively important
  - S most important source of P & Y (17%), aside from own innovations
  - S most important source of M (39%)
  - S most important source of G (27%), aside from own innovations
  - S close to exogenous, explaining 92% of itself
- Historical decompositions: S most important contributor to paths of P & Y, aside from own innovations
- Estimated output multipliers large—3 to 4—and significant

What Is Unbacked Fiscal Expansion?

- **Definition:** *Unbacked fiscal expansion (UBFE)*
  1. *increase spending—purchases or transfers,*
  2. *issue nominal bonds to cover the deficit, and*
  3. *convince people surpluses will not rise in future to pay off the bonds*
- New nominal debt is not expected to be backed by higher primary surpluses
  - higher nominal debt raises aggregate demand $\Rightarrow$ higher prices & output
- Unbacked fiscal expansion can permanently raise price level, as FDR desired

Keynesian Hydraulics + Debt Dynamics

- UBFE challenges conventional wisdom: recovery unrelated to fiscal policy
  - Brown (1956), Romer (1992), Hausman (2016)...
  - fiscal deficits too small to close gap in output
- Conventional view: "Keynesian hydraulics"
  - narrowly construed transmission mechanism
  - real spending $\uparrow \Rightarrow$ real demand $\uparrow \Rightarrow$ multiplied output $\uparrow$
  - expansion in nominal demand from higher nominal debt provides no additional stimulus
  - implicitly, taxes extinguish wealth effects from debt
- Broader view: hydraulics + impacts of debt dynamics
  - unbacked fiscal expansion raises wealth & demand
- Multipliers substantially larger when fiscal expansion unbacked

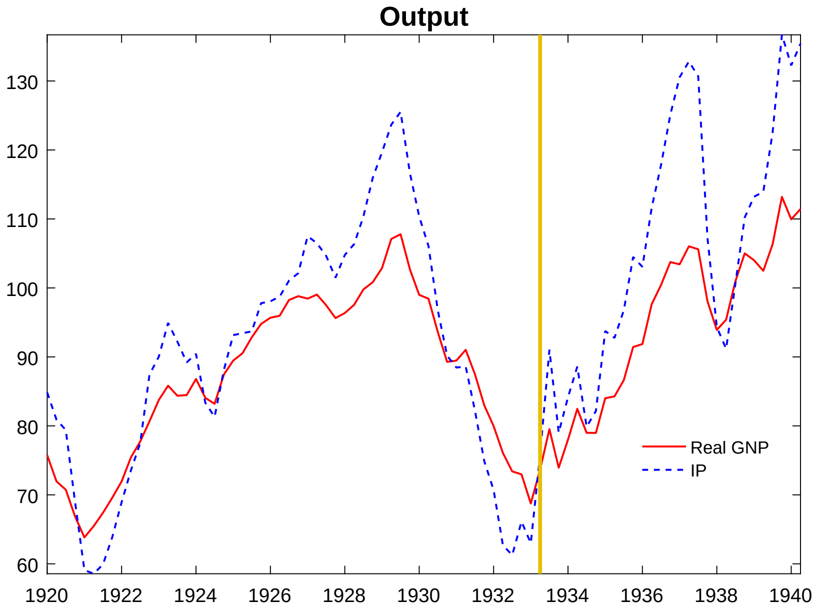
FDR's Triple-Barreled Approach

1. Executive branch—with Congressional blessing—took control of monetary policy
   - Fed universally regarded as "inept"
   - Executive reduced gold content of dollar
   - abandoned convertibility
2. Ran "emergency" deficits financed by nominal bonds
   - relief through works programs & infrastructure
   - "emergency" communicated temporary & state-contingent nature of the fiscal policy
3. Political strategy made unprecedented fiscal policy credible
   - recovery *the* priority: "more grave" than WWI
   - feared "agrarian revolution" & "amorphous resentment" of economic institutions
   - faced "a choice between rise in prices or rise in dictators"; recovery a "war for survival of democracy"

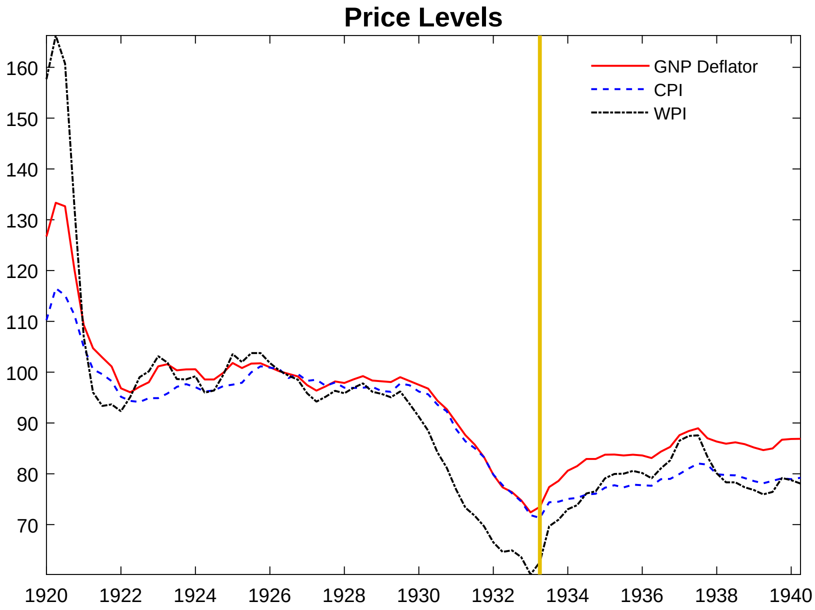
Recovery Was Stunning

- Recovery coincides with departure from gold
  - April 1933 the economy turned around
  - over course of 1933, Treasury & FDR steadily raised dollar price of gold from $20.67 an ounce
  - FDR was clear there would be no return to gold
- Abrogated gold clauses in debts & set price of gold at $35.00 an ounce
  - a 59% devaluation of the dollar value of gold
- U.S. dollar depreciated sharply: from 3.3 to 5.1 $\$/£$ in the year starting December 1932
  - ushered in commodity price increases
- Jalil-Rua: inflation expectations rose sharply 1933Q2
  - contemporary news accounts & business forecasts
  - attribute much to FDR's speeches, fireside chats, press conferences

Real Economic Activity



Nominal Economic Activity



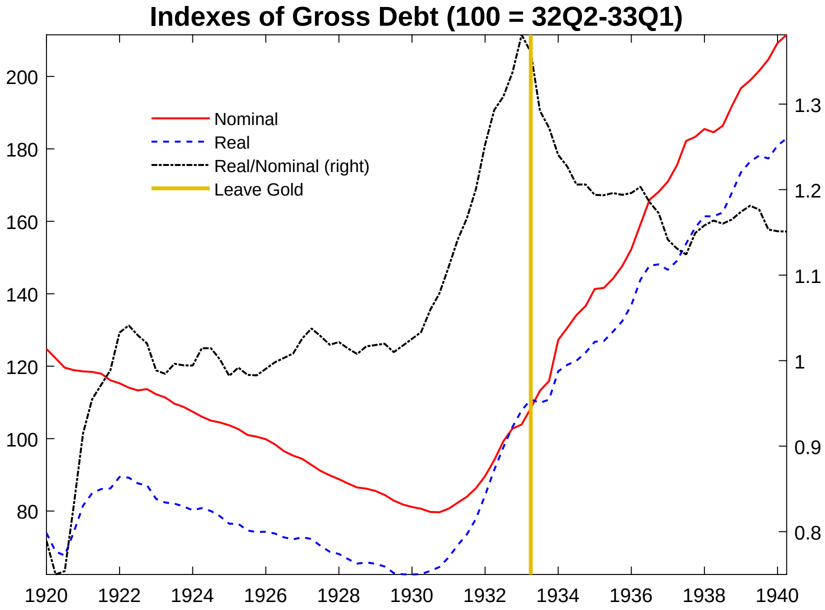
Corroborating Evidence

- Revaluation of government bond portfolio at heart of UBFE
  - surprise changes in price level
  - surprise changes in bond prices (expected inflation)
  - changes in real discount rates
- How do facts about government debt line up with UBFE?

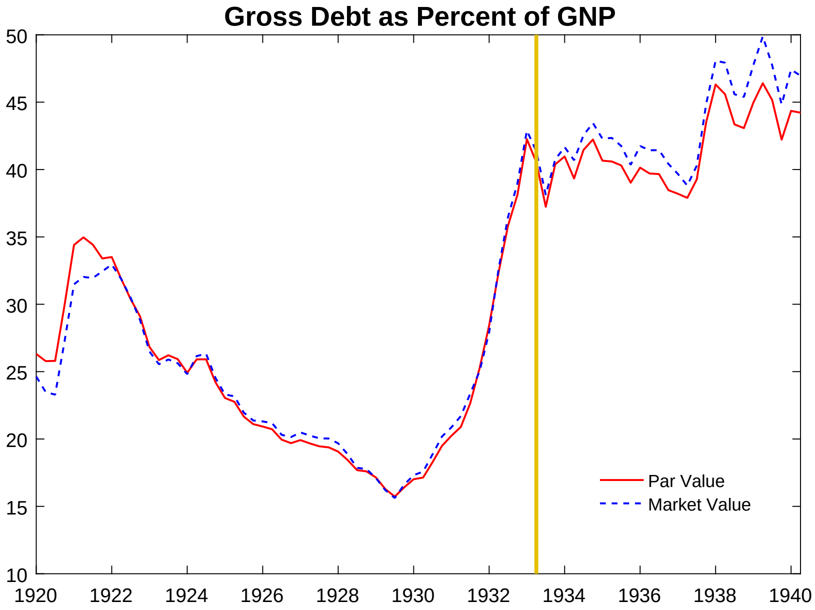
Government Debt Facts

- Construct detailed government bond portfolio data
- Data consistent with UBFE story
  - nominal debt grew 20% faster than real debt
  - debt-GNP ratio stabilized at 40%
  - post-GS: real returns more negative
  - post-GS: surprise devaluations large & negative
  - post-GS: surprise inflation & lower bond prices important
  - post-GS: relative price of bonds fell—bonds lost value

Government Bond Valuation



Debt Stabilized Under UBFE



Lessons for Today

1. Initially FDR was single-minded in pursuit of higher prices & employment; willing to experiment
   - fiscal policy state contingent
   - clear deficits would not be offset by surpluses
2. Joint monetary-fiscal behavior triggered recovery
   - doubling of nominal debt critical
   - anchoring fiscal expectations
3. Policy makers do not understand fiscal inflation
   - perceive it is a slippery slope: easily leads to runaway inflation

Lessons for Today

4. Governments today lack single-mindedness
    - objectives bounce between stimulus and austerity
    - fears of sustainability taint policy actions
    - renders fiscal policy impotent for stimulus
5. Fiscal backstop against deflation
    - no purely monetary cures to serious deflation
    - commitment to trigger UBFE in face of falling prices