HK212.tex

### Escaping from deflation and a liquidity trap

Lars E.O. Svensson www.princeton.edu/~svensson

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• Avoiding deflation

• Escaping from deflation and liquidity trap

• The foolproof way of escaping from a liquidity trap

 $\bullet$  Comparison with other proposals

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# Avoiding deflation

- Positive credible inflation target
  - Margin for deflation
- Inflation-forecast targeting
  - Looking ahead, responding in time, preemption
- Price-level targeting vs. inflation targeting
  - Unanticipated fall in price level below target: Automatic increase in inflation expectations, fall in real interest rate

## Escaping from deflation and liquidity trap

- Deflation and recession: Expansionary stabilization policy
- Expansionary fiscal policy
  - Increase aggregate demand: Fiscal expansion (money financed, Ricardian equivalence)
  - Lower "effective" real interest rate: Time-varying VAT/investment credits (Stiglitz, Feldstein)

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- Expansionary monetary policy (exchange-rate policy)
  - Create inflation expectations, lower real interest rate (short and long)
  - Currency depreciation (net export, UIP: lower real interest rate)
  - Increase other asset prices (long bonds, equity, property)

#### Means

- Positive inflation target (Krugman, Posen)
- Monetary base expansion (Meltzer)
- Tax on money (Goodfriend, Buiter)
- Currency peg (McKinnon)

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### The foolproof way of escaping from a liquidity trap

- Academic article, *Monetary and Economic Studies* 19(S-1), February 2001, 277-312: "The Zero Bound in an Open-Economy: A Foolproof Way of Escaping from a Liquidity Trap"
- Non-technical summary of Graham Lecture, Princeton University, April 5, 2001: "The Foolproof Way of Escaping from a Liquidity Trap: Is It Really, and Can It Help Japan?"
- FT Personal View, Sep 25, 2001: "How Japan Can Recover"
- FT editorial, Oct 1, 2001: "Let the Yen Fall"
- www.princeton.edu/~svensson/japan/japan.htm

- Currency depreciation
  - \* Monetary-base expansion, FX interventions, portfolio-balance (PB) effect (Meltzer, Bernanke, Orphanides-Wieland)
  - \* Exchange-rate rule (McCallum)
  - \* The foolproof way (FPW): Price-level target, temporary depreciation/peg, exit strategy (Svensson)

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- 1. Announce price-level target path, upward slope = inflation target
  - Best nominal anchor: Avoid run-away inflation
  - Undo "price-level gap"
  - Provides exit strategy from exchange-rate peg
- 2. Announce depreciation and temporary exchange rate peg
  - Jump-start economy, increase output and price level
  - Sizeable initial real depreciation
    - Feasible (initial excess demand for currency)
  - Expected real appreciation
  - $\bullet$  Inflation expectations
  - Lower real interest rate
- 3. Announce exit strategy: When price-level target path reached, shift to float and inflation/price-level targeting

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# Comparison with other proposals

- Krugman: Announce inflation target, future monetary expansion
  - Why credible?
  - Price-level target path better anchor than inflation target
    - \* Accumulated inflation: Avoid run-away inflation
    - \* Long-run inflation expectations independent of timing
    - \* Price gap to undo
  - Devaluation and exchange-rate peg demonstrates commitment
    - $\ast$  Do, not just say
    - \* Induces expectations of real appreciation and inflation

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- McKinnon: Permanent bilateral peg
  - Would escape liquidity trap by  $i_t = i_t^*$
  - No real depreciation to jump-start economy
  - $-\operatorname{No}$  price gap to undo
  - $-\operatorname{Sustainable?}$
  - $-\operatorname{Optimal}?$
  - Temporary peg, exit strategy
  - $-\operatorname{Unilateral}$

- Meltzer, McCallum, Bernanke: FX interventions/open-market operations to depreciate currency
  - Temporary peg more structure, benchmark
  - Portfolio-balance effects (endogenous risk premia) not needed
  - McCallum reaction function

$$\tilde{s}_t = s_{t-1} + \nu_0 - \nu_1(\pi_{t,t-1} - \pi^*) - \nu_2(x_{t,t-1})$$

- \* Time-varying exchange-rate target/instrument  $\tilde{s}_t$ : Commitment to buy/sell unlimited amounts of FX at time-varying rate  $\tilde{s}_t$
- \* More complex commitment and benchmark, less verifiable
- \* Parameter values?
- \* Interest-rate setting?
- \* Exit strategy?

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- Quantitative easing (Meltzer, Nakahara, current BOJ, Orphanides-Wieland)
  - Money and T-bills (close to) perfect substitutes
  - Volumes, targets?
  - $-\operatorname{Exit\ strategy?}$

- Coenen-Wieland C-R 2002: 3-region model, deflation/liquidity trap in Japan, comparison of 3 proposals,
  - Orphanides-Wieland: Monetary base expansion
  - $-\operatorname{McCallum}$ : Exchange-rate rule
  - Svensson: The foolproof way
  - All work
  - FPW works even if it starts 11 qtrs into deflation/recession
    - \* Especially if crawling peg
  - Relatively small international effects on inflation and output gaps
- $\bullet$  FPW not just direct stimulus of net export and direct effect on CPI

Political problems (Japan, region, US)

- Beggar thy neighbor? Regional and US reactions?
  - Lower long-run real interest rate requires real depreciation
  - Current-account effects of real depreciation ambiguous
  - Region, U.S. and world gain in long run
- Other policy changes/reforms needed for Japan
  - Financial-sector clean-up (Swedish way)

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## Summary

- Avoiding deflation/liquidity trap feasible
- Escaping deflation/liquidity trap feasible: There is a foolproof way
- It can help Japan (but is not enough alone)
- Any political problems can be solved