

Week Seven

EPA143A

EXOGENOUS MONEY versus ENDOGENOUS MONEY

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Required readings:

K. Fury. 2013. A Reading on Money and Money Creation. *Forum for Social Economics* 42 (1): 38-58.

EPA143A LECTURE NOTE W-7

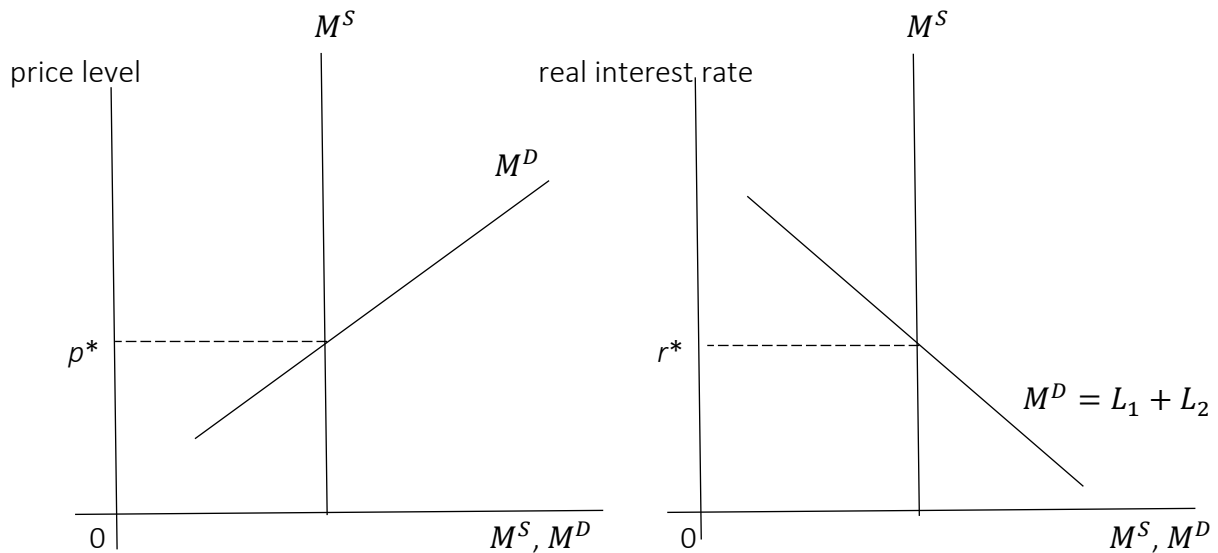
Supplementary videos:

- <https://www.youtube.com/watch?v=SkAzDrrKkME> an explanation and a critique of the money multiplier model
- Josh Ryan-Collins, Tony Greenham, Richard Werner, Andrew Jackson (2011) Where does money come from? <https://www.youtube.com/watch?v=l7L3ZtCSKks>

The EXERCISES **W-7.1** and **W.7-2** for Week 7 are given below.

EXERCISE W-7.1

- Consider the following Figure and explain what will happen to money demand and the price level (or the interest rate) if the central bank increases money supply.



- Consider the following balance sheet of commercial bank:

ROBA Bank – June 2, 2020

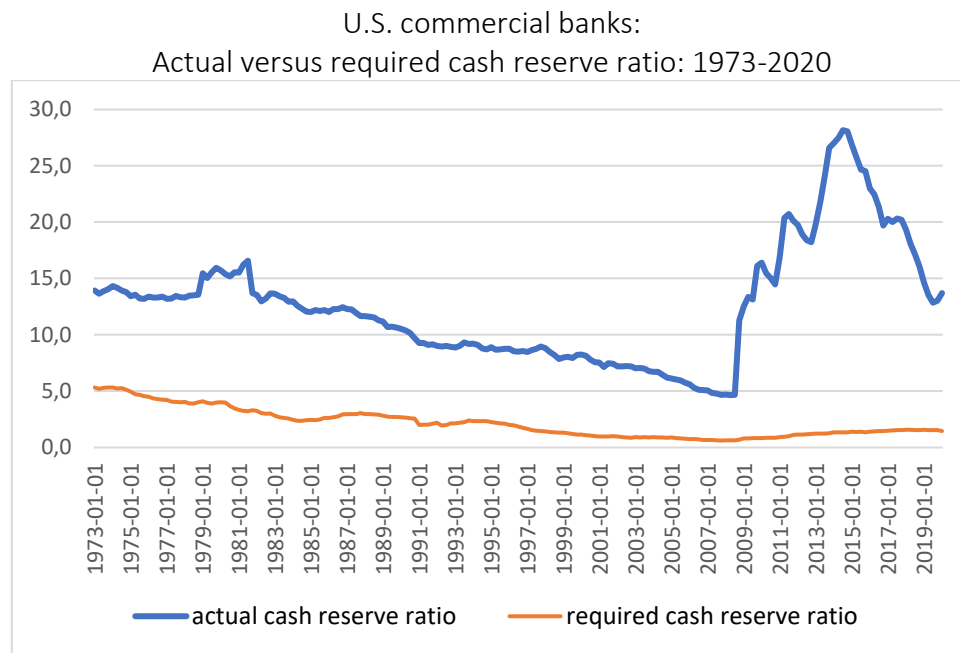
assets = 'active'

liabilities = 'passive'

cash reserves = €100 m		deposits = €1000 m	
loans = €1200 m		inter – bank loans = €200 m	
govt. bonds = €200 m		equity = €300 m	
total = €1500 m		total = €1500 m	

Assume that the Money Multiplier Model holds true and that ROBA Bank is fully loaned-up on June 2, 2020. The central bank buys €25 million bonds from Mrs. Cato Rich who deposits the money in her ROBA Bank account on June 2, 2020. How much deposit money will the commercial banking system create? How large is the money multiplier in this case?

3. Consider the following Figure:



Explain in detail why we can conclude based on this figure that (a) commercial banks are normally less than fully loaned-up; (b) the money-multiplier is not stable or predictable; and (c) central banks cannot therefore directly control or manipulate money supply.

EXERCISE W-7.2

1. Consider the following balance sheet of commercial bank:

Koschmerz Bank – June 2, 2020

assets = 'active'

liabilities = 'passive'

<p>cash reserves = €100 m</p> <p>loans = €1200 m</p> <p>govt. bonds = €200 m</p> <p>total = €1500 m</p>	<p>deposits = €1000 m</p> <p>inter – bank loans = €200 m</p> <p>equity = €300 m</p> <p>total = €1500 m</p>
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Assume that on Koschmerz Bank decides to give Mr. Al Toorich a loan of €10 million for a start-up firm. Explain how Koschmerz Bank creates €10 million new money (by issuing debt). Indicate how its balance sheet changes due to this.

2. Koschmerz Bank has to manage its liquidity in order to meet its cash reserve requirement (which is fixed at 10% of deposits). Describe two ways in which the extra liquidity can be obtained.
3. Consider the initial balance sheet of question 1 (we assume Mr. Toorich did not come). Suppose Koschmerz Bank has to write off €150 million of earlier loans, because the debtors have defaulted. What happens to its balance sheet? Explain why this problem can be seen as a solvency problem?
4. Explain how the solvency problem can cause a subsequent liquidity problem for this bank.
5. Explain why the central bank is called the lender-of-last-resort.
6. Explain the role of credit-rating agencies in monitoring the creditworthiness and risk profile of commercial banks.
7. What are the two main implications for macroeconomic theory and policy if money creation is indeed endogenous?