Problem Set 4: AD-AS and Crises

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Section 1: Money Supply

Based on the reading from Chapter 16 and Lecture 15.

Look at the following H6 report from the Federal Reserve:


For the most recent available month and one year before that, fill out the following table (use seasonally adjusted figures):

<table>
<thead>
<tr>
<th>Category</th>
<th>Most Recent</th>
<th>One Year Before</th>
<th>Percentage Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Currency</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Demand Deposits</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Traveler’s Checks</td>
<td></td>
<td></td>
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<tr>
<td>Checkable Deposits at Commercial Banks</td>
<td></td>
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<tr>
<td>Checkable Deposits at Thrift Institutions</td>
<td></td>
<td></td>
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</tr>
<tr>
<td>Savings Deposits at Commercial Banks</td>
<td></td>
<td></td>
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</tr>
<tr>
<td>Savings Deposits at Thrift Institutions</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Small-Denomination Time Deposits, total</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Retail Money Funds</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

What is M1 in the most recent year? _______________
    One year before? ____________________________
    Percentage change? ________________________

What is M2 in the most recent year? _______________
    One year before? ____________________________
    Percentage change? ________________________

What category most contributed to the increase in M2? _______________
Section 2: Effect of Shocks on Prices and Output

Based on reading from Chapter 20 and Lectures 16 and 17.

a) Suppose a temporary tax cut increases aggregate demand. Suppose the economy is initially in a long run steady state. In the space below, show how output and prices are affected in the short run and the long run.

b) Prices Output
   Short Run: up up
   Long Run: same same

c) A temporary oil price decrease causes an increase in short run aggregate supply. Suppose the economy is initially in a long run steady state. In the space below, show how output and prices are affected in the short run and the long run.

Prices Output
   Short Run: down up
   Long Run: same same
d) An increase in female labor force participation causes an increase in short run and long run aggregate supply. Suppose the economy is initially in a long run steady state. In the space below, show how output and prices are affected in the short run and the long run.

e)

![Graph showing the effect of increased female labor force participation on output and prices.](image)

Prices Output
Short Run: down up
Long Run: down up

f) Suppose a change in international strategic priorities reduces military spending and permanently reduces aggregate demand. Suppose the economy is initially in a long run steady state. In the space below, show how output and prices are affected in the short run and the long run.

![Graph showing the effect of reduced military spending on output and prices.](image)

Prices Output
Short Run: down down
Long Run: down same
Section 3: Fed Response to AD Shock

Based on reading from Chapter 21 and Lecture 18.

a) Suppose a stock market crash causes people to feel less wealthy, temporarily reducing aggregate demand. Demonstrate the short and long run effects in the space below, as in section 2.

\[
\begin{array}{c|c}
\text{Prices} & \text{Output} \\
\hline
\text{Short Run:} & \text{down down} \\
\text{Long Run:} & \text{same same} \\
\end{array}
\]

b) Now suppose that the Fed increases the money supply to bring output back to its original level. Demonstrate the effect of this in the space below.

\[
\begin{array}{c|c}
\text{Prices Output} & \\
\hline
\text{Short Run (before Fed intervention):} & \text{down down} \\
\text{Short Run (after Fed intervention):} & \text{same same} \\
\text{Long Run:} & \text{same same} \\
\end{array}
\]
Section 4: Fed Response to SRAS Shock

Based on reading from Chapter 21 and Lecture 18.

a) Suppose a storm damages a port, making it difficult to transport goods, and temporarily reducing short run aggregate supply. Demonstrate the short and long run effects in the space below, as in section 2.

b) Prices Output

Short Run: **up** **down**
Long Run: **same** **same**

c) Now suppose that, after the storm, the Fed increases the money supply to bring output back to its original level. Demonstrate the effect of this in the space below.

Prices Output

Short Run (before Fed intervention): **up** **down**
Short Run (after Fed intervention): **up** **same**
Long Run: **up** **same**
Section 5: Milton Friedman on the Great Depression

Please watch the following video:

http://www.youtube.com/watch?v=SWVoPrntBso

a) What is a “bank run”? ______________________________________________________
___________________________________________________________________________
___________________________________________________________________________
b) What role does consumer psychology play in bank runs? ________________________
___________________________________________________________________________
___________________________________________________________________________
c) What happened to the quantity of money in the aftermath of the Great Depression?
___________________________________________________________________________
___________________________________________________________________________
d) Why do runs on banks reduce the quantity of money? __________________________
___________________________________________________________________________
___________________________________________________________________________
e) According to John Maynard Keynes, what should the government do if private
spending is insufficient to maintain full employment? ___________________________
___________________________________________________________________________
___________________________________________________________________________
f) What does Friedman believe to be a fundamental weakness in the leadership system
of the Federal Reserve (during the discussion with Von Hoffman about Keynes and
Strong)? ___________________________________________________________________
___________________________________________________________________________
___________________________________________________________________________
g) Why does Friedman believe that the US government has taken such an active role in
the economy in the post-World War II era? __________________________
___________________________________________________________________________
___________________________________________________________________________
___________________________________________________________________________
___________________________________________________________________________
Section 6: The Giant Pool of Money
Please listen to this radio program and answer the following questions:


1) What does NINA mean?

2) What is the total amount of global fixed income securities (the size of the “giant pool of money”)?

3) What is a mortgage backed security?

4) Why did international fixed income investors (the “giant pool of money”) become interested in buying mortgage backed securities?

5) Why did mortgage originators (those finding people to take mortgages) not care about the riskiness of the mortgages?

6) Why did the bond rating agencies (e.g., Moody’s) inaccurately assess the risk of the mortgage backed securities?

7) Why did the large investment banks stop buying high risk mortgages?

8) What is a major barrier to renegotiating the terms of mortgages?
Section 7: Recent Business Cycles in your Assigned Country

What country were you assigned to study? __________________________

As preparation for your term paper, below describe three specific policies that you would recommend to your assigned countries to help improve the economy. For motivation, think about the examples of China, Argentina and South Korea, and what policies did and did not work there. Also, think about the particular challenges and the history of your country discussed in other assignments.

Below write a short description (2-3 sentences) on each of the policies you recommend. Remember that it must be a specific policy, not a goal. Refer to the guidelines in the term paper description when choosing your policy suggestions:

http://www3.nd.edu/~wbrooks/Description.pdf

1) __________________________________________________________________________
   __________________________________________________________________________
   __________________________________________________________________________
   __________________________________________________________________________

2) __________________________________________________________________________
   __________________________________________________________________________
   __________________________________________________________________________
   __________________________________________________________________________

3) __________________________________________________________________________
   __________________________________________________________________________
   __________________________________________________________________________
   __________________________________________________________________________