Please write clearly. The exam is designed for 80 minutes but you have 90 minutes to answer it. Take your time before writing. I have a strong preference for short and focused answers. Extensive demonstrations of knowledge of material only vaguely related to the questions will be penalized. Good luck.

**True/False/Unclear (30 points/minutes)**

1. The subprime mortgages crisis, by itself, should not lead to a significant aggregate contraction

2. Many have argued that the rise in European unemployment during the 1970s and 1980s can be explained by an increase in firing costs. This makes no sense since firing costs increase employment by reducing job destruction

3. The reason Ss models lead to faster aggregate price responses to monetary shocks than Calvo type models is the so called selection effect

4. Bubbles are likely to arise in situations where the marginal product of capital is high

5. In the Shapiro-Stiglitz model of efficiency wages, unemployment is voluntary since workers are indifferent between shirking and not

**Discuss (10 points/minutes)**

The following is the first paragraph of an article published in the WSJ (12/09/07). Discuss.

“BEIJING – In its first move since officially moving to a tight monetary policy this week, China’s central bank said it would raise the share of deposits that banks must keep on reserve for the 10th time this year to help cool the economy.”

**Bank Runs (40 points/minutes)**

Recall the Diamond-Dybvig setup discussed in class (try to use the same notation – and make the same assumptions as in class unless otherwise stated).

6. Characterize equilibrium consumption of early and late consumers when there are no markets (ex-ante or ex-post)

7. Repeat your characterization but now for the case where financial markets are open after liquidity shocks are realized. Compare with Autarky

8. Suppose that idiosyncratic (liquidity) shocks are observable and contractible, and that agents form a coalition at date 0 (a “bank”).
   (a) Describe the optimal allocation of resources to early and late consumers. Is there perfect insurance?
   (b) Is there a run equilibrium as well?

9. How does your answer to the previous question change when idiosyncratic shocks are unobservable? (no math needed here)