Chapter 25
Rational Expectations: Implications for Policy

25.1 The Lucas Critique of Policy Evaluation

1) Whether one views the activist policies of the 1960s and 1970s as destabilizing or believes the economy would have been less stable without these policies, most economists agree that
   A) stabilization policies proved more difficult in practice than many economists had expected.
   B) stabilization policies proved not to be inflationary.
   C) the nonactivist policymakers were right in believing that the private economy is inherently stable.
   D) the activist policymakers were right in believing that the private economy is inherently stable.

   Answer: A
   Ques Status: Revised

2) The argument that econometric policy evaluation is likely to be misleading if policymakers assume stable economic relationships is known as
   A) the monetarist revolution.
   B) the Lucas critique.
   C) public choice theory.
   D) new Keynesian theory.

   Answer: B
   Ques Status: Revised

3) Lucas argues that when policies change, expectations will change thereby
   A) changing the relationships in econometric models.
   B) causing the government to abandon its activist stance.
   C) forcing the Fed to keep its deliberations secret.
   D) making it easier to predict the effects of policy changes.

   Answer: A
   Ques Status: Revised
4) The rational expectations hypothesis implies that when macroeconomic policy changes,
   A) the economy will become highly unstable.
   B) the way expectations are formed will change.
   C) people will be slow to catch on to the change.
   D) people will make systematic mistakes.
   Answer: B

Ques Status: Previous Edition

5) The Lucas critique indicates that
   A) activists’ criticisms of rational expectations models are well-founded.
   B) activists’ criticisms of rational expectations models are not well-founded.
   C) expectations are important in determining the outcome of an activist policy.
   D) expectations are not important in determining the outcome of an activist policy.
   Answer: C

Ques Status: Revised

6) The Lucas critique is an attack on the usefulness of
   A) conventional econometric models as forecasting tools.
   B) conventional econometric models as indicators of the potential impacts on the economy of particular policies.
   C) rational expectations models of macroeconomic activity.
   D) the relationship between the quantity theory of money and aggregate demand.
   Answer: B

Ques Status: Revised

7) The Lucas critique argues that an econometric model constructed using past data
   A) may be appropriate for short-run forecasting, but is inappropriate for policy analysis.
   B) may be appropriate for policy analysis, but is inappropriate for short-run forecasting.
   C) is appropriate for short-run forecasting and policy analysis.
   D) is inappropriate for policy analysis and short-run forecasting.
   Answer: A

Ques Status: Revised
8) The interest rate thought to have the most important impact on aggregate demand is the
A) short-term interest rate.
B) T-bill rate.
C) rate on 90-day CDs.
D) long-term interest rate.
Answer: D

9) A rise in short-term interest rates that is believed to be only temporary
A) is likely to have a significant effect on long-term interest rates.
B) will have a bigger impact on long-term interest rates than if the rise in short-term rates
   had been permanent.
C) is likely to have only a small impact on long-term interest rates.
D) cannot possibly affect long-term interest rates.
Answer: C

10) According to the Lucas critique, if past increases in the short-term interest rate have always
    been temporary, then
A) the term-structure relationship using past data will then show only a weak effect of
    changes in the short-term interest rate on the long-term rate.
B) the term-structure relationship using past data will show no effect of changes in the
    short-term interest rate on the long-term rate.
C) one cannot predict the term-structure relationship as it depends on expectations.
D) the term-structure relationship using past data will nevertheless show a strong effect of
    changes in the short-term interest rate on the long-term rate because of a change in the
    way expectations are formed.
Answer: A

25.2 New Classical Macroeconomic Model

1) The new classical macroeconomic model assumes that expectations are _______ formed and
   that wages and prices are _______ with respect to the expected price level.
   A) adaptively; completely flexible
   B) adaptively; sticky
   C) rationally; completely flexible
   D) rationally; sticky
Answer: C
2) In the new classical macroeconomic model developed by Lucas and Sargent, an anticipated monetary expansion will

   A) increase aggregate output.
   B) reduce aggregate output.
   C) have no effect on aggregate output.
   D) increase aggregate output and the aggregate price level.

   Answer: C

   Ques Status: Previous Edition

3) In the new classical macroeconomic model developed by Lucas and Sargent, expansionary macropolicies affect aggregate output

   A) only when the macropolicy change is anticipated.
   B) only when the macropolicy change is unanticipated.
   C) only after a long and variable lag, provided the policy is anticipated.
   D) relatively quickly, provided the policy is anticipated.

   Answer: B

   Ques Status: Previous Edition

4) An expansionary monetary policy will cause aggregate output to expand in the new classical macroeconomic model

   A) if the policy is unanticipated.
   B) if the policy is anticipated.
   C) only after a long and variable lag, provided the policy is anticipated.
   D) never; output will never expand in the new classical model when monetary policy is changed.

   Answer: A

   Ques Status: Previous Edition

5) According to the new classical model,

   A) unanticipated policy has no effect on the business cycle.
   B) only anticipated policy can influence the business cycle.
   C) anticipated policy has no effect on the business cycle.
   D) unanticipated policy may or may not have an effect on the business cycle.

   Answer: C

   Ques Status: Revised
6) Steve the economist tells his students that one anticipated policy is just like any other—none has any effect on aggregate output. You can probably infer that he is a

   A) Keynesian economist.
   B) monetarist.
   C) proponent of activist policies.
   D) new classical economist.

   Answer: D
   Ques Status: Previous Edition

7) In the view of the new classical economists, an increase in the money supply will affect aggregate output and employment only if the increase in money supply is

   A) anticipated.
   B) expected.
   C) unanticipated.
   D) the result of an announced open market operation.

   Answer: C
   Ques Status: Revised

8) In the new classical model, an anticipated increase in the money stock will cause

   A) the price level and aggregate output to increase.
   B) aggregate output to increase.
   C) the price level to increase.
   D) no effect on either the price level or aggregate output.

   Answer: C
   Ques Status: Previous Edition

9) In the new classical model,

   A) wages and prices are sticky with respect to expected changes in the price level.
   B) a rise in the expected price level results in an immediate and equal rise in wages and prices.
   C) an anticipated increase in the money supply will increase aggregate output temporarily.
   D) unanticipated policy has no effect on aggregate output and unemployment.

   Answer: B
   Ques Status: Previous Edition
10) Suppose that the Federal Reserve announces a 50 basis point decrease in the target for the federal funds rate that was completely anticipated. According to the new classical model and with everything else held constant, this action by the Federal Reserve will cause real GDP to _______.

A) increase  
B) decrease  
C) remain constant  
D) either increase, decrease or remain constant

Answer: C

Ques Status: New

11) In the new classical model, an anticipated policy of a continually increasing money supply causes

A) aggregate demand increases along a stationary aggregate supply curve, leading to continually increasing aggregate output and prices.  
B) aggregate supply decreases along a stationary aggregate demand curve, leading to continually contracting aggregate output and prices.  
C) aggregate demand continually increases while simultaneously aggregate supply continually decreases, leading to higher and higher price levels.  
D) aggregate demand continually decreases while simultaneously aggregate supply continually increases, leading to higher and higher price levels.

Answer: C

Ques Status: Revised

12) The short-run response to an anticipated expansionary policy in the new classical model includes _______ in the price level and _______ in aggregate output.

A) an increase; an increase  
B) an increase; no change  
C) no change; an increase  
D) no change; no change

Answer: B

Ques Status: Revised

13) In the new classical model, an unanticipated increase in the money supply causes

A) aggregate demand increases along a stationary aggregate supply curve.  
B) both aggregate demand and supply increase.  
C) aggregate demand increases as aggregate supply decreases.  
D) both aggregate demand and supply decrease.

Answer: A

Ques Status: Revised
14) ________ policies do not change aggregate real output or the unemployment rate in the ________ model.
   A) Anticipated; new Keynesian
   B) Unanticipated; new Keynesian
   C) Anticipated; new classical
   D) Unanticipated; new classical

Answer: C
Ques Status: Revised

15) The new classical model has the word classical associated with it because, when an increase in the money supply is anticipated, aggregate output
   A) drops below the natural rate level.
   B) rises above the natural rate level.
   C) remains at the natural rate level.
   D) increases in the short run, but not in the long run.

Answer: C
Ques Status: Revised

16) The policy ineffectiveness proposition
   A) asserts that anticipated changes in monetary policy cannot affect real aggregate output.
   B) rules out output effects from policy surprises.
   C) implies that an anticipated contractionary monetary policy cannot reduce the rate of inflation.
   D) implies that an anticipated expansionary monetary policy will not cause the price level to rise.

Answer: A
Ques Status: Previous Edition

17) The notion that anticipated monetary policy has no effect on the real aggregate output is commonly called the
   A) Lucas critique.
   B) policy ineffectiveness proposition.
   C) natural rate hypothesis.
   D) new Keynesian proposition.

Answer: B
Ques Status: Previous Edition
18) An important feature of the new classical model is that an expansionary policy, such as an increase in the rate of money growth, can lead to a decline in aggregate output if the
   A) public expects an even more expansionary policy than the one that is actually implemented.
   B) policy comes as a surprise.
   C) public expects a less expansionary policy than the one that is actually implemented.
   D) policy is anticipated.

   Answer: A
   Ques Status: Revised

19) In the new classical model, an expansionary monetary policy will lead to a decline in aggregate output if the increase in money supply is ________ anticipated.
   A) less than
   B) greater than
   C) not
   D) as

   Answer: A
   Ques Status: Revised

20) The similarity between nonactivists and the new classical economists is that both believe that
   A) only unanticipated policies can affect aggregate output and employment.
   B) only anticipated policies can affect aggregate output and employment.
   C) discretionary policies may be destabilizing.
   D) discretionary policies will be ineffective in changing aggregate output and employment.

   Answer: C
   Ques Status: Revised
21) Demonstrate graphically and explain the short-run and long-run effects of an unanticipated monetary expansion in the new classical model.

Answer: See figure below.

In the new classical model, unexpected monetary expansion increases aggregate demand. Since this is unexpected, aggregate supply is not affected, and output increases in the short run. As expectations adjust, aggregate supply decreases and output returns to the natural rate, with only prices rising.

Ques Status: Revised

22) In the new classical model, show graphically and explain how an expected monetary expansion that is less than expected reduces real output in the short run. What is the long-run result?

Answer: See figure below.

Demand does not increase as much as expected, so aggregate supply decreases more than the increase in aggregate demand. The result in the short run is a lower aggregate output. In the long-run, AS adjusts to the actual increase in demand with higher prices and no increase in output.

Ques Status: Revised
25.3 New Keynesian Model

1) The model that assumes that expectations are formed rationally but does not assume complete wage and price flexibility is known as the
   A) new classical model.
   B) Keynesian model.
   C) monetarist model.
   D) new Keynesian model.

   Answer: D
   *Ques Status: Previous Edition*

2) Wage and price rigidities created by long-term contracts suggest that an anticipated monetary expansion will have
   A) no effect on the aggregate price level.
   B) no effect on aggregate output.
   C) an effect on aggregate output only.
   D) an effect on both aggregate output and the price level.

   Answer: D
   *Ques Status: Previous Edition*

3) New Keynesians object to which of the following assumptions?
   A) Rational expectations
   B) Wage and price stickiness
   C) Complete wage and price flexibility
   D) Long-term contracts as a source of wage and price rigidities

   Answer: C
   *Ques Status: Previous Edition*

4) Rigidities that diminish wage and price flexibility such as long-term contracts suggest that an increase in the expected price level
   A) might not translate into complete adjustment of wages and prices.
   B) might cause aggregate demand to decrease.
   C) might cause aggregate supply to increase.
   D) will have no effect on the short-run aggregate supply curve.

   Answer: A
   *Ques Status: Revised*
5) It is the existence of rigidities such as sticky wages, not adaptive expectations, that explains why _______ policies can affect real output in the _______ model.
   A) unanticipated; new classical
   B) anticipated; new classical
   C) unanticipated; new Keynesian
   D) anticipated; new Keynesian
   Answer: D
   Ques Status: Revised

6) In the new Keynesian model
   A) wages and prices are assumed to be sticky with respect to expected changes in the price level.
   B) only unanticipated policy can affect aggregate output and unemployment.
   C) only anticipated policy can affect aggregate output and unemployment.
   D) unanticipated policy has no effect on aggregate output and unemployment.
   Answer: A
   Ques Status: Previous Edition

7) Like the new classical model, the new Keynesian model
   A) concludes that anticipated policies do not affect aggregate output and unemployment.
   B) distinguishes between the effects of anticipated versus unanticipated policy, with anticipated policy having a greater effect.
   C) distinguishes between the effects of anticipated versus unanticipated policy, with unanticipated policy having a greater effect.
   D) assumes that wages and prices are perfectly flexible with respect to changes in the expected price level.
   Answer: C
   Ques Status: Previous Edition

8) In the new Keynesian model, an unanticipated increase in the money supply causes
   A) aggregate demand to increase along a stationary aggregate supply curve.
   B) both aggregate demand and supply to increase.
   C) aggregate demand to increase as aggregate supply decreases.
   D) both aggregate demand and supply to decrease.
   Answer: A
   Ques Status: Revised
9) In the new Keynesian model, an expansionary monetary policy will
   A) not cause aggregate output to increase, even if the policy is unanticipated.
   B) have a greater effect on aggregate output if the policy is unanticipated.
   C) have a greater effect on aggregate output if the policy is anticipated.
   D) have no effect on the price level.

   Answer: B
   Ques Status: Previous Edition

10) Mariann the economist argues that expectations are formed rationally, yet a pre-announced monetary expansion will lower unemployment. Mariann is probably a
    A) Keynesian economist.
    B) monetarist.
    C) new classical economist.
    D) new Keynesian economist.

   Answer: D
   Ques Status: Previous Edition

11) Kristin the economist argues that an anticipated monetary expansion will cause aggregate output to increase but believes that aggregate output would increase by an even greater amount if the monetary expansion came as a surprise to everyone. Kristin is probably a
    A) new Keynesian.
    B) new classical economist.
    C) monetarist.
    D) Keynesian economist.

   Answer: A
   Ques Status: Revised
12) In the new Keynesian model, explain and depict graphically why an expected increase in the money supply increases real output in the short run. What is the long-run result?

Answer: See figure below.

Although the increase in demand is expected, rigidities prevent aggregate supply from decreasing as much as aggregate demand increases. Thus, short-run real output increases. In the long run, with complete adjustment, there will be higher prices and unchanged real output.

Ques Status: Revised

25.4 Comparison of the Two New Models with the Traditional Model

1) An anticipated increase in the money supply has no effect on aggregate output in the _______ model.
   A) new Keynesian
   B) Keynesian
   C) new classical
   D) traditional

Answer: C
Ques Status: Revised

2) An anticipated increase in the money supply increases short-run real output by the largest amount in
   A) the traditional model.
   B) the new Keynesian model.
   C) the new classical model.
   D) all three models.

Answer: A
Ques Status: Revised
3) An anticipated increase in the money supply causes the largest long-run increase in real output in
   A) the traditional model.
   B) the new Keynesian model.
   C) the new classical model.
   D) no model, as monetary policy does not affect real output in the long run.
   Answer: D  
   Ques Status: Revised

4) An anticipated increase in the money supply causes the largest short-run increase in the price level in
   A) the traditional model.
   B) the new Keynesian model.
   C) the new classical model.
   D) all three models.
   Answer: C  
   Ques Status: Revised

5) In the traditional model, the cost of lost output for each one percentage point reduction in the inflation rate is
   A) 4 percent of a year’s real GDP.
   B) 0.25 percent of a year’s real GDP.
   C) 0.04 percent of a year’s real GDP.
   D) 25 percent of a year’s real GDP.
   Answer: A  
   Ques Status: Previous Edition

6) Rational expectations theory suggests that the success of an anti-inflationary policy depends on the
   A) adoption of a gold standard.
   B) passage of a tax cut.
   C) credibility of the policy in the eyes of the public.
   D) imposition of wage and price controls.
   Answer: C  
   Ques Status: Previous Edition
7) In a new classical view of the world, the best anti-inflation policy, when viewed as being credible, is
   A) a gradualist policy.
   B) a cold turkey policy.
   C) a complete monetary and fiscal reform measure.
   D) an activist policy.
   Answer: B
   Ques Status: Previous Edition

8) When expectations of inflation are formed rationally, an anti-inflationary policy will be more successful if it is
   A) credible.
   B) a surprise.
   C) unanticipated.
   D) announced.
   Answer: A
   Ques Status: Revised

9) It may be necessary to cut the deficit as part of a credible anti-inflationary policy because the public knows that large deficits
   A) are inflationary by themselves in the long run.
   B) create inefficiencies.
   C) put pressure on the Fed to expand the money supply to keep interest rates from rising.
   D) put pressure on the Fed to contract the money supply to prevent employment from rising.
   Answer: C
   Ques Status: Previous Edition

10) By ________ its deficit, the government's credibility of anti-inflationary policy ________.
    A) not changing; remains the same
    B) reducing; increases
    C) reducing; decreases
    D) not changing; increases
    Answer: B
    Ques Status: Revised
11) Explain why anticipated policy has different short-run effects on real output and the price level in the new classical, new Keynesian, and traditional models. What are the long-run effects of anticipated policy in each model?

**Answer:** In the new classical model, wages and prices are fully flexible, and expectations are formed rationally. In the new classical model, an anticipated policy change results in a matching adjustment of wages and prices. Thus, AD and AS shift by matching amounts in the opposite direction. This results in no change in real output, and the largest change in the price level is in the short run. In the new Keynesian model, expectations are rational, but rigidities keep wages and prices from adjusting fully even when policy is anticipated. Thus, AD shifts by more than AS. As a result, real output and prices both change, with prices changing by less than in the new classical model. In the traditional model, expectations are formed adaptively, so policy changes do not affect expectations and AS in the short run. Thus, demand changes cause the largest changes in real output, and smallest initial price level changes of any of the three models. In all three models, the long-run result is that real output does not change, and prices adjust fully to changes in demand.

*Ques Status: Revised*

### 25.5 Impact of the Rational Expectations Revolution

1) Today, most economists

   A) accept that expectations formation will change when the behavior of forecasted variables changes.

   B) believe that the Lucas critique has been discredited.

   C) accept the notion that there is no role for activist stabilization policy.

   D) believe that having policy credibility is not an important factor to a successful anti-inflation policy.

**Answer:** A

*Ques Status: New*