


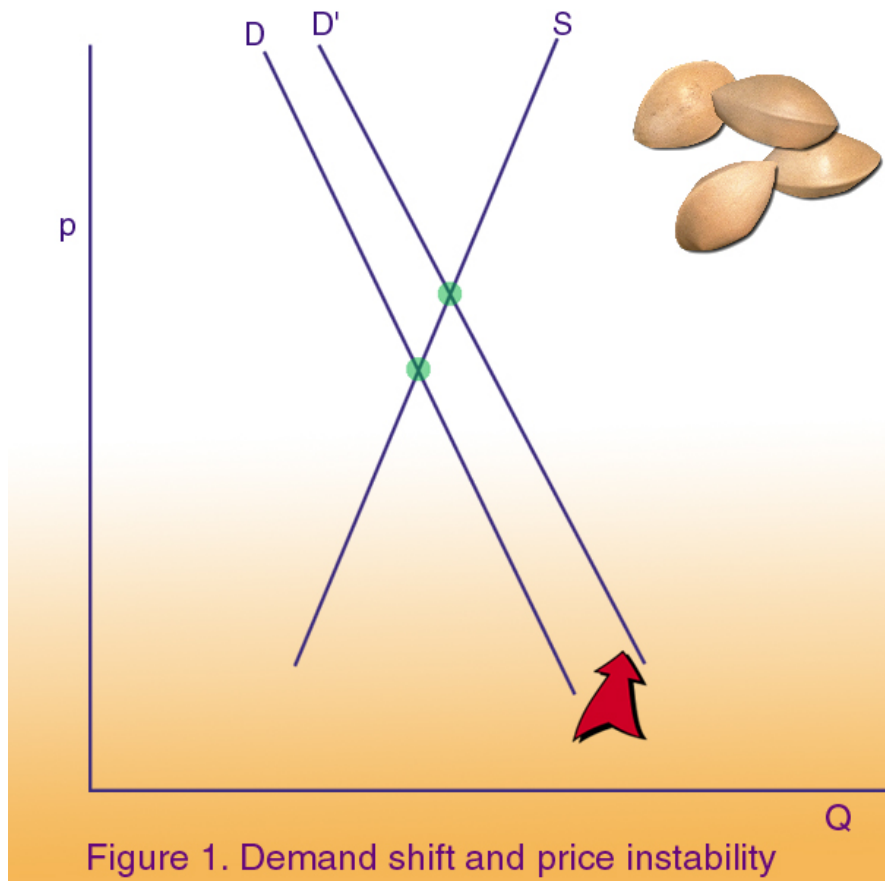



Chapter 9: Applications

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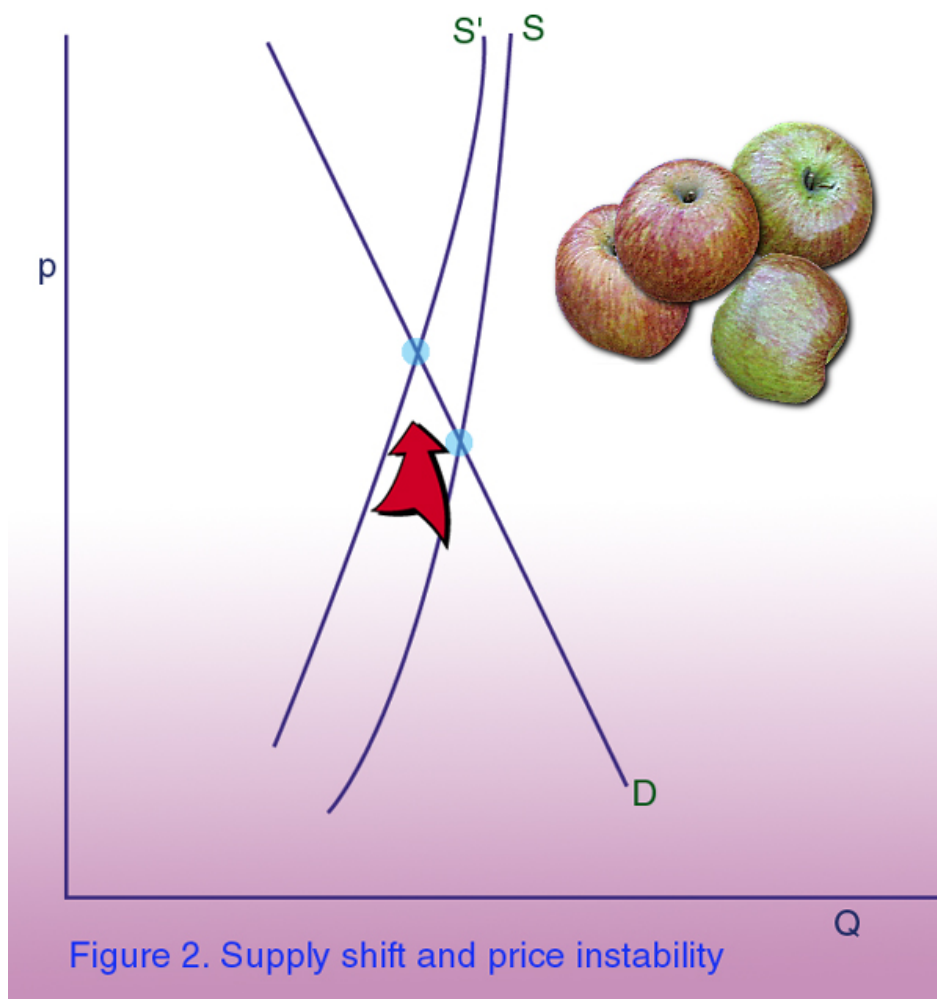
	<p>Government Intervention in Competitive Markets</p> <p>Since the collapse of the financial market last year, the US government is exerting increasingly more influence in the private markets.</p>
 <p>Why is the government getting involved in private markets such as insurance, banking, automobile and health insurance?</p>	<p>The premise is that the private market is not doing a good job.</p> <p>However, the historical record of government performance is not very good. Medicare is going to be bankrupt in a few years. Amtrak is run by the government and continues to lose money.</p> <p>Much of the problem in the financial market is caused by excessive interference by the Congress.</p> <p>Often such intervention is deemed necessary because of inefficient operation of the competitive markets, but when government is involved, it often gets much worse.</p>
 <p>Is there an industry in which government intervention is desirable?</p>	<p>There is one industry in which government intervention is often considered necessary.</p> <p>Agricultural product markets are beset with fluctuations in market prices. This is because both demand and supply curves are price inelastic. In these markets, small changes in demand or supply cause a great deal of fluctuations in prices.</p>

	Accordingly, farmers in most industrial countries demand their governments to stabilize farm prices.
Why are farm prices unstable?	<p>Shifts in Demand</p> <p>Since the supply is price inelastic, a small shift in the demand curve causes a large change in the price.</p>
 Why is the supply price inelastic?	<p>In manufacturing industries production is more or less continuous. Production occurs throughout the year. If demand increases suddenly, firms can increase production by hiring more workers or asking workers to work longer hours or in the evenings or over the weekends.</p> <p>However, agricultural production occurs once a year. Once planting is finished, it is difficult to increase output.</p>
In that case, a small change in consumer demand causes a large change in market price.	Precisely.



<p>Are supply schedules then stable in agricultural markets?</p>	<p>No.</p> <p>Due to uncertain weather (e.g. Hurricane Katrina, tornadoes, mite attacks in the honey industry.) market supply is also subject to random shocks.</p>
<p>Why should that be a problem?</p>	<p>If demand is price inelastic, any small change in supply also causes a huge variation in price.</p>
<p> Are demands for agricultural products price inelastic?</p>	<p>Demands for most tropical products such as coffee, tea, cocoa, sugar, etc. and food products are price inelastic.</p>

<p>I can see that. Just because the price of salt is halved, one would not sprinkle more salt on beefsteaks.</p>	<p>Thus, demand for food stuff and tropical products are price inelastic. Any random shifts in the supply curve causes a large price variation.</p>
<p>I see. Prices for these products are unstable, because the demand and supply are both price inelastic.</p>	<p>Exactly.</p>



BUFFER STOCK SCHEME



Bartholomeus Breenbergh




Dutch, 1598–1657

Joseph Distributing Grain to Egypt, 1644

Etching, from two plates, on ivory laid paper; second state of two

Joseph Brooks Fair Fund, 1968.34

Bartholomeus Breenbergh belonged to the first generation of Dutch Italianates—northern artists who ventured to Italy in the 1620s and were captivated by the Italian light and landscapes. This work was probably made in Amsterdam after Breenbergh's return from Italy, when the influence of Rembrandt van Rijn and his circle encouraged him to create monumental landscapes and historical subjects like this one.

<p>  How did the price stabilization programs begin? Are we the first to stabilize prices? </p>  <p> Painted wooden model of a granary 12th Dynasty, about 1850 BC From Thebes </p> <p> The granary comprises a courtyard, silos with sliding hatches, and steps leading to an upper storey. A woman is represented in the courtyard, grinding grain on a quern, and a seated figure of the owner of the tomb is positioned on the upper level. This model was found in the same tomb as the funerary boat EA 9524, displayed in this case. </p> <p>EA 2463</p>	<p>No.</p> <p>Genesis 41:28-29 describes two common dreams of Joseph and Pharaoh. Joseph advises the Pharaoh to adopt a price stabilization program: Store grains when the harvest is plenty and price is low and sell them during famine. This Joseph was "Father to Pharaoh" (Genesis 45:8), meaning one of his daughters may have married the Pharaoh, but his name is not mentioned in Genesis. Joseph may have served under Senusret I (1917 - 1872 BC) and there was a famine during this period.</p> <p>Joseph may have served under Amenemhet III (1841 - 1797). During his reign there was a famine in Egypt lasting nine long years. Ptahwer (Potiphar?) even left records of conquering the Sinai during his reign. (Immanuel Velikovsky) Also, a large dam and a lake were constructed and the canal was called Bar Yusuf (Joseph's).</p>
<p>  How does the government stabilize farm prices? </p>	<p>The government could set a band of prices, minimum and maximum prices, within which market price is allowed to vary.</p>
<p>Just passing a law on the minimum and maximum prices may not be enough to stabilize farm prices. If</p>	<p>No! no police force is utilized to catch lawbreakers.</p>

someone breaks the law, do we send a policeman?

In the case of Joseph, when harvest was good the Pharaoh bought all the surplus grains at low prices, and sold them at high prices when harvest was poor.

When the government buys grains, it supports price. When it sells grains, the government prevents the price from rising further.

This is called the “buffer stock” scheme, which eliminates illegal activities.



In that case, the government could make money from buying at low prices and selling at high prices.

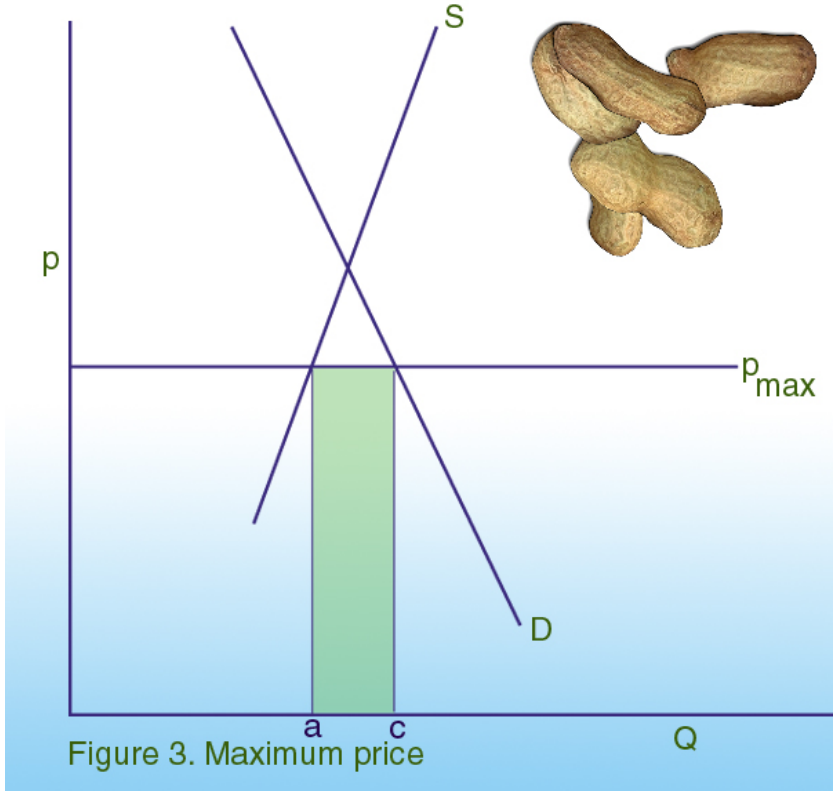
Theoretically, yes!

If the surplus and shortage cancel each other out, and the minimum price is lower than the maximum price, the government can make profit.


Genesis records that the Pharaoh (Sesostris/Senwosret III?, 1874-1855) ended up owning most of the land.

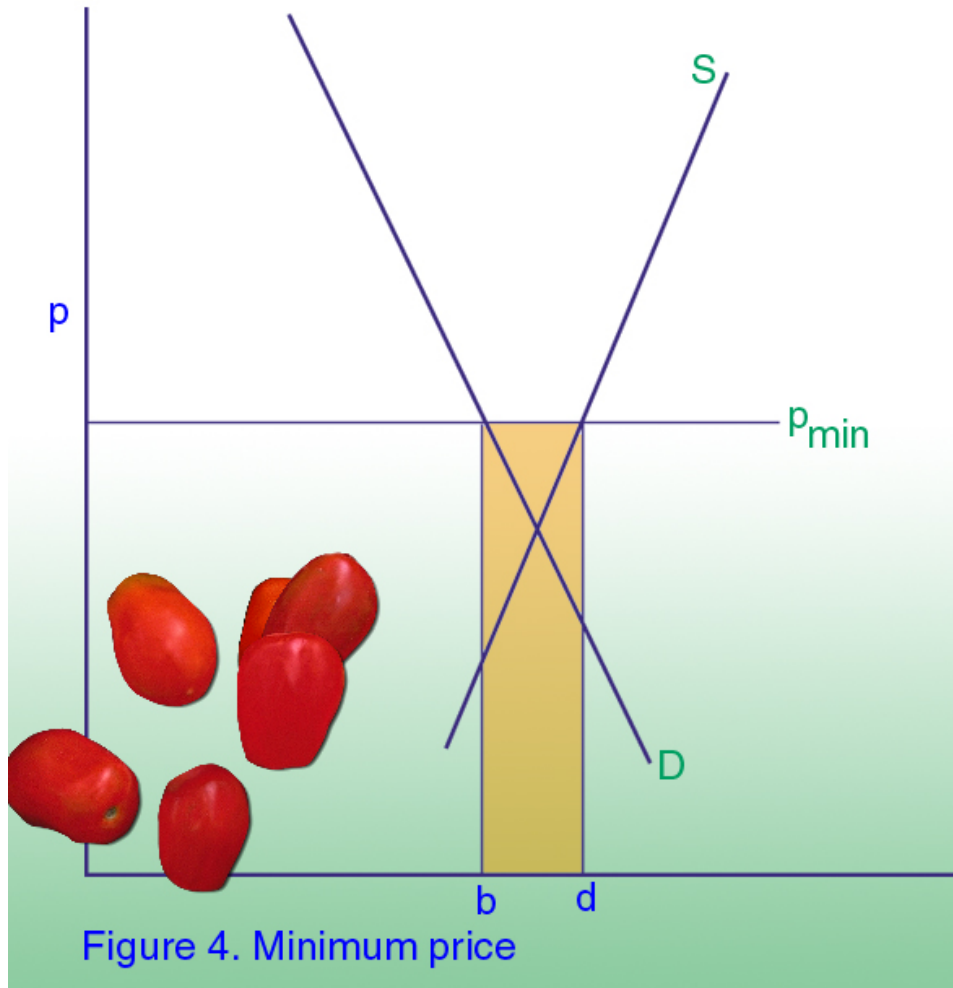




Pieter Lastman
 Dutch, 1583-1633
The Triumph of Sesostris, 1631
 Oil on panel
 Signed and dated on wheel: *P Lastman fecit A° 1631*
 Gift of Mr. and Mrs. Philip N. Llienthal, Jr.,
 to the M. H. de Young Memorial Museum
 44.16



<p>When does the government release the surplus grains?</p>	<p>When the equilibrium price is too high (if $p > p_{max}$), the government can release its buffer stock and lower the price to the maximum price. In this case, the government must sell ac unit to lower price.</p>
<p>Then the government must also buy grains when the price is too low, i.e., $p < p_{min}$.</p>	<p>Right! The buffer stock scheme eliminates the need to hire police force.</p>

 <p>Is there a downside to the buffer stock scheme?</p>	<p>Certamente!</p> <p>Most agricultural products are perishable. When food shortage threatens survival, consumers may eat one-year old grains, and they did during famine. However, modern consumers do not like to buy even one-day old bread, much less bread made of one-year old grains, even if grains could be stored.</p> <p>The quality of old grains deteriorates quickly over time. Moreover, building the physical storage facilities can be costly. One has to worry about rodents, insects, robbers, corrupt officials, etc. as well as spoilage.</p>
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 <p>How does the US government deal with these problems?</p>	<p>The government adopted the deficiency payment scheme.</p>
<p>What does it do?</p>	<p>It eliminates government storage of surplus grains.</p>
 <p>How does the deficiency payment work?</p>	<p>Simply let the market price drop to the equilibrium level. Given the minimum price in Figure 5, output supplied is d, but output demanded is b. If the government does not want to hold any</p>

	<p>inventory, the market price falls to e.</p> <p>Since the guaranteed price is p_{\min}, the government simply pays farmers the difference between the two prices, and the shaded area in Figure shows the total amount of deficiency payment to farmers.</p>
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Deficiency Payment Scheme

