experimented with ceilings on apartment rents, called **rent control.** Rent control was introduced to prevent inflation during a housing crisis in the early 1940s and continued after World War II. More recently, other cities imposed rent control, often motivated by a desire to help poor households by cutting their housing costs and permitting them to live in neighborhoods they could otherwise not afford. As we'll see, rent control reduces the quantity and quality of housing, so it helps some households but harms others, including many poor households. If the ceiling is established below the equilibrium price, the result will look like graph A in Figure 6.3 below.

In this market, the supply and demand curves for two-bedroom apartments meet at the equilibrium shown at point c in graph B. At this point, rents are $900 a month. Consumers will demand 30,000 apartments and suppliers will offer 30,000 apartments for rent.

Suppose that the city government passes a law that limits the rent on two-bedroom apartments to $600 per month. At that price, the quantity of apartments demanded is 40,000 (point b), and the quantity supplied is 20,000 (point a). At such a low price, apartments seem inexpensive, and many people will try to rent apartments instead of living with their families or investing in their own houses.

However, some landlords will have difficulty earning profits or breaking even at these low rents. Fewer new apartment buildings will be built, and older ones might be converted into offices, stores, or condominiums.

As you can see in graph A of Figure 6.3, the result is excess demand of 20,000 apartments. The price ceiling increases the quantity demanded but decreases the quantity supplied. Since rents are not allowed to rise, this excess demand will last as long as the price ceiling holds.

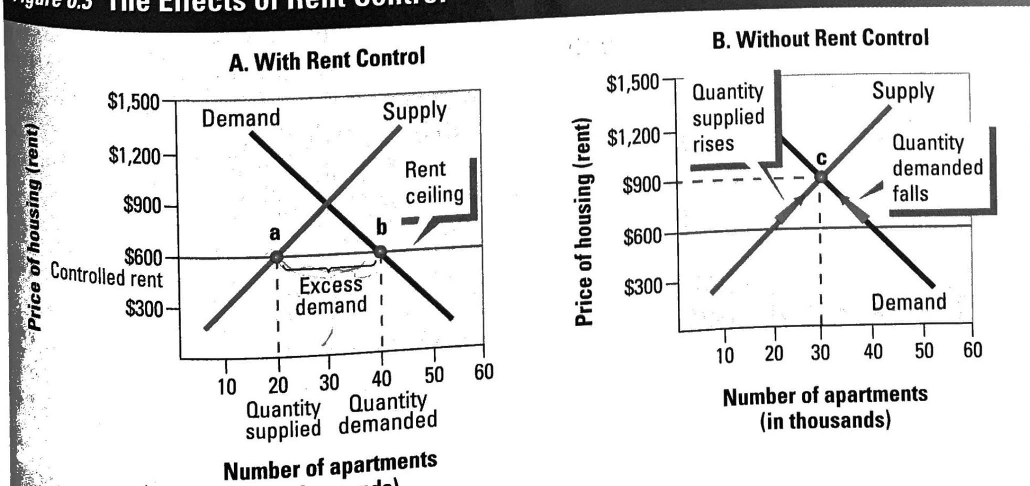
rent control *a price ceiling placed on rent*

The Cost of Price Ceilings

When the price cannot rise to the equilibrium level, the market must determine which 20,000 of the 40,000 households will get an apartment, and which 20,000 will do without. Although governments usually pass rent control laws to help renters with the greatest need, few of these renters benefit from rent control. Methods besides prices, including long waiting lists, discrimination by landlords, and even bribery, are used to allocate the scarce supply of apartments among the many people who want them. Luck becomes an important factor, and sometimes the only way to get a rent-controlled apartment is to inherit it from a parent or grandparent.

New York City revised its laws in the 1990s to exclude the wealthiest renters

Figure 6.3 **The Effects of Rent Control**



BUILDING KEY CONCEPTS

Rent control helps some people, but it also creates a housing market with fewer, less-desirable homes.

Supply and Demand
At what price does the market for apartments reach equilibrium without rent control?

minimum wage *a minimum price that an employer can pay a worker for an hour of labor.*

from rent control protection after newspapers discovered that some very wealthy people rented spacious apartments at prices much less than market value.

Additionally, since the rent controls limit landlords' profits, landlords may try to increase their income by cutting costs. Why should a landlord give a building a fresh coat of paint and a new garden if he or she can't earn the money back through higher rent? Besides, if there's a waiting list to get an apartment, the landlord has no incentive to work hard and attract renters. As a result, many rent-controlled apartment buildings become run-down, and renters may have to wait months to have routine problems fixed.

Ending Rent Control

If rents were allowed to rise to the market equilibrium level, which is $900 per month, the quantity of apartments in the market would actually rise to 30,000 apartments. The market would be in equilibrium, and people who could afford $900 a month would have an easier time finding vacant apartments. Instead of spending time and money searching for apartments, and then having to accept an apartment in a poorly maintained building, many renters would be able to find a wider selection of apartments. Landlords would also have a greater incentive to properly maintain their buildings and invest in new construction.

On the other hand, people lucky enough to live in a rent-controlled apartment may no longer be able to afford to stay there once rent control is ended and the landlord can legally raise the rent. As soon as the neighborhood improves, these renters may be priced out of their own apartments, to be replaced by people willing to pay the equilibrium price. Remember that ending rent control increases the number of apartments on the market by 10,000.

Certainly, the end of rent control benefits some people and hurts others. Economists agree that the benefits of ending rent control exceed the costs, and suggest that there are better ways to help poor households find affordable housing.

Price Floors

A price floor is a minimum price, set by the government, that must be paid for a good or service. Price floors are often imposed when government wants sellers to receive some minimum reward for their efforts.

The Minimum Wage

One well-known price floor is the **minimum wage,** which sets a minimum price that an employer can pay a worker for an hour of labor. The federal government sets a base level for the minimum wage, and states can set their own minimum wages even higher. A full-time worker being paid the federal minimum wage will earn less than the federal government says is necessary to support a couple with one child. However, it does provide some lower limit for workers' earnings. The important question, as you will read in *Debating Current Issues* on pages 180–181, is whether the benefits to minimum wage workers outweigh the loss of some jobs.

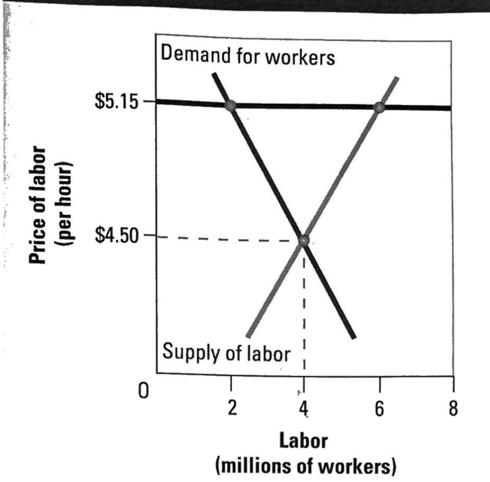
If the minimum wage is set above the market equilibrium wage rate, the result is a decrease in employment, as demonstrated in Figure 6.4. This figure illustrates the supply curve of labor, which shows the number of worker-hours offered at various

▼ **The minimum wage has a strong impact on teens in the work force.**

wage rates, and a demand curve for labor, which shows the number of workers employers will hire at various wages.

If the market equilibrium wage for low-skilled labor is $4.50 per hour, and the minimum wage is set at $5.15, the result is an excess supply of labor. There are now 4 million more people looking for work than employers are willing to hire. (Remember that in this example, the worker is the supplier because he or she supplies labor that is bought by an employer.) Firms will employ 2 million fewer workers than they would at the equilibrium wage rate because the price floor on labor keeps the wage rate artificially high. If the minimum wage is below the equilibrium rate, it will have no effect because employers would have to pay at least the equilibrium rate anyway to find workers in a free market.

Figure 6.4 Effects of Minimum Wage



BUILDING KEY CONCEPTS

A minimum wage law can set the price of labor above the equilibrium price, leading to a labor surplus.

Supply and Demand According to this graph, how big is the surplus of workers when the minimum wage is $5.15 per hour?

Price Supports in Agriculture

Price floors are used for many farm products around the world. Until 1996, the United States set minimum prices for several commodities, although these price floors were not legal limits. Instead, whenever the price fell below the price floor, the government created demand by buying excess crops.

Although Congress abolished price supports in 1996, several states in the Northeast have formed the Northeast Dairy Compact to guarantee a minimum price for milk produced on farms in these states.

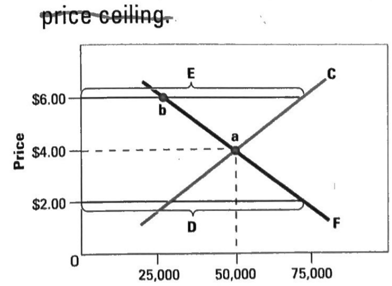
Section 1 Assessment

Key Terms and Main Ideas

1. What is unique about an **equilibrium** price?
2. What situation can lead to **excess demand?**
3. How is a **price floor** different from a **price ceiling?**
4. How does **rent control** work?

Applying Economic Concepts

5. ***Using the Databank*** Turn to the graph of median weekly earnings on page 536 in the Databank. Suppose that the federal government has raised the minimum wage to $500 per week. **(a)** Which category of jobs would be least affected by the change? **(b)** Which two categories would be most affected by the new minimum wage? **(c)** What are the likely consequences for workers in these two fields?
6. ***Critical Thinking*** What are the benefits and drawbacks of a price ceiling?
7. ***Math Practice*** The graph below shows supply and demand curves in the notebook market. Use what you have learned in this section to identify the following elements of the graph: ~~price floor, supply curve,~~ equilibrium point, ~~disequilibrium point, demand curve, price ceiling.~~



Take It to the NET Rent control is one example presented in this section of ways in which the government acts to control prices. Investigate some recent rent control issues. Use the links provided at the following Web site for help in completing this activity. **www.phschool.com**