UNIT II: A NEW INDUSTRIAL AGE (GILDED AGE)

CHAPTER 6

MR. BOOTH – US HISTORY
After the Civil War (1865) the U.S. was still largely agrarian.

- What is agrarian?

By 1920, the U.S. was the leading industrial power in the world

This enormous growth was due to three factors:

1) Natural Resources
2) Governmental Support
3) Urbanization
In 1859, Edwin Drake used a steam engine to drill for oil.

This breakthrough started an oil boom in the Midwest and later Texas.

At first, the process was limited to transforming the oil into kerosene (lamps) and throwing out the gasoline -- a by-product of the process.

Later, the gasoline was used for automobiles.
Oil was not the only valuable natural resource

Coal and iron were plentiful within the U.S.

When you removed the carbon from iron, the result was a lighter, more flexible and rust resistant compound – Steel

The Bessemer process did just that (Henry Bessemer & William Kelly)
1. The two main components of steel are:

2. What does the Bessemer process consist of (hint: has to do with oxygen)?

3. How hot does the furnace get to make pure molten iron which the carbon and coke form?
VIDEO: BESSEMER PROCESS
THE GILDED AGE

• What is the Gilded Age?

• Answer: the period in the U.S. 1870-98, characterized by a greatly expanding economy and the emergence of influences in politics, social influences and society.

• E- Most labor workers were mired in poverty. 60 hour work weeks existed. No labor unions after civil war.

• S- Legal wage slavery. Nobody to protect the American worker

• P – 90% of citizens voted in elections. The government didn’t do a lot to regulate businesses.
NEW USES FOR STEEL

- The railroads, with thousands of miles of track, were the biggest customers for steel.
- Other uses emerged: barbed wire, farm equipment, bridge construction (Brooklyn Bridge-1883), and the first skyscrapers.

BROOKLYN BRIDGE SPANS 1595 FEET IN NYC
INVENTIONS
SPUR INDUSTRY
WHICH
CREATES
• 1876- Thomas Alva Edison established the world’s first research lab in New Jersey
• There Edison perfected the incandescent light bulb in 1880
  • Carbon filament with current. Heat produces light on the filament.
• Later he invented an entire system for producing and distributing electricity
• By 1890, electricity powered numerous machines
THE TYPEWRITER

• Christopher Sholes invented the typewriter in 1867
• His invention forever affected office work and paperwork
• It also opened many new jobs for women
  • 1870: Women made up less than 5% of workforce.
  • In 1910: They made up 40%
Another important invention of the late 19th century was the telephone.

Alexander Graham Bell and Thomas Watson unveiled their invention in 1876.
IS THE AMERICAN DREAM STILL ALIVE?

1. Why does Putnam say the American dream is in trouble?

2. A recent New York Times poll (2014) said ______ % of Americans felt the American Dream was still alive.

3. Do people have different versions of this dream or interpret it different? Explain.
IS THE AMERICAN DREAM STILL ALIVE?
SECTION II: THE AGE OF THE RAILROADS

• The growth of the railroad industry improved many facets of American life
• But what was the downside?

• Unchecked power of the railroad companies led to monopolies and finally reform
By 1869, tracks had been laid across the continent (Golden Spike- Transcontinental Railroad in Promontory Point, Utah)

Immigrants from China and Ireland and out-of-work Civil War vets provided most of the difficult labor.

Thousands lost their lives and tens of thousands were injured laying track:

- Whites $40-60 a month and free meals
- Chinese $35 a month, supply their own food

IMMIGRANTS FROM CHINA LAID TRACK
Before 1883, each community still operated on its own time.

For example: Noon in Boston was 12 minutes later than noon in New York City.

Indiana had dozens of different times.

No standard time reference.
In 1869, to remedy this problem, Professor C.F. Dowd proposed dividing the earth into 24 time zones.

Why is this important?

- A. Because at noon in the U.S. is where the sun is the highest, it would be dark in Asia.
- Imaginary zones follow the sun so to speak.

The U.S. = 4 zones:

- the eastern, Central, Mountain, and Pacific

1883 – Railroads synchronized their watches across U.S.
THE UNITED STATES IS DIVIDED INTO 4 TIME ZONES
THE WORLD IS DIVIDED INTO 24 TIME ZONES
RAILROADS LED TO GROWTH OF CITIES

“MY KIND OF TOWN”

- Many of today’s major cities owe their legacy to the railroad
- Chicago, Minneapolis, Denver, and Seattle all grew up thanks to the railroad
In 1880, George Pullman built a factory for manufacturing sleepers and other railroad cars in Illinois.

The nearby town Pullman built for his employees was modeled after early industrial European towns:
- Doctors, offices, shops, athletic fields, window in homes (awesome)

Pullman workers felt his puritanical town was too strict:
- No drinking

When he lowered wages but not rent – it led to a violent strike in 1894:
- This is a social issue of the Gilded Age
CREDIT MOBILIER SCANDAL

- Stockholders of Union Pacific Railroad formed a construction company in 1864
- Stockholders then gave contracts to the company to lay track at 3 times the actual costs and pocketed the difference
- They donated shares of the stock to 20 Republican members of Congress in 1867
In 1887, the Federal government re-established their control over railroad activities.

Congress passed the Interstate Commerce Act and established a 5-member Interstate Commerce Commission (ICC).

This specifically established the right of the fed gov. to supervise railroad activities (regulation).

- 10 yrs. Later, ICC died because of a Supreme Court case said that the fed could not set a max. railroad rate.
- However, you can break monopolies to increase competition. Was not done until later.

1887 – Congress passed the ICA.
BIG BUSINESS AND LABOR

• Andrew Carnegie was one of the first industrial moguls
• He entered the steel industry in 1873
• By 1899, the Carnegie Steel Company manufactured more steel than all the factories in Great Britain combined
Carnegie initiated many new business practices such as:

1. Searching for ways to make better products more cheaply
2. Accounting systems to track expenses
3. Attracting quality people by offering them stock & benefits

ANDREW CARNEGIE
1835 - 1919
CARNegie’s VERTICAl INTEGRATIoN

• Carnegie attempted to control as much of the steel industry as possible

• How? Vertical integration; he bought out his suppliers (coal fields, iron mines, ore freighters, and rail lines) in order to control materials and transportation

• GETS RID OF MIDDLEMAN
Additionally, Carnegie bought up the competition through friendly and hostile takeovers. This is known as Horizontal Integration; buying companies that produce similar products – in this case other steel companies.
DIFFERENCE BETWEEN H. AND V. INTEGRATION
Mergers could result in a monopoly (Trust)

A monopoly is complete control over an industry

An example of consolidation: In 1870, Rockefeller Standard Oil Company owned 2% of the country’s crude oil

By 1880 – it controlled 90% of U.S. crude oil
SOCIAL DARWINISM

The philosophy known as Social Darwinism has its origins in Darwin’s theory of evolution.

Darwin theorized that some individuals in a species flourish and pass their traits on while others do not.

Social Darwinists (like Herbert Spencer) believed riches was a sign of God’s favor, and being poor was a sign of inferiority and laziness.

DARWIN (RIGHT) LIMITED HIS FINDINGS TO THE ANIMAL WORLD

SPENCER WAS THE ONE WHO COINED THE PHRASE “SURVIVAL OF THE FITTEST”
FORD ROUGE COMPLEX, 1911
Alarmed at the cut-throat tactics of industrialists, critics began to call them "Robber Barons."

Famous "Robber Barons" included Carnegie, Rockefeller, Vanderbilt, Stanford, and J.P. Morgan.
Despite being labeled as greedy barons, rich industrialists did have a generous side.

When very rich people give away lots of money it is called “Philanthropy”.

Carnegie built libraries, Rockefeller, Leland Stanford, and Cornelius Vanderbilt built schools.
In 1890, the Sherman Anti-Trust Act made it illegal to form a monopoly (Trust)

Prosecuting companies under the Act was not easy – a business would simply reorganize into single companies to avoid prosecution

Seven of eight cases brought before the Supreme Court were thrown out
FAMOUS ANTITRUST CASES

1. United States v. AT&T (Vertical)
   • Ameritech, Verizon, Southwest, U.S West, Qwest

2. U.S. v. Kodak (96% of market) (patent) (film development)
   • Had to give up licensing to other companies, now mostly obsolete because of digital cameras and phone cameras

   • (34 separate oil companies)
   • Guess which company today traces back to original Standard Oil?
     • Exxon Mobil
DISCUSSION QUESTIONS

1. What is the difference between horizontal and vertical integration? Provide specific examples

2. Do you believe Social Darwinism has a place in the landscape of American business today? Is it different than it was before the Sherman Antitrust Act?
Workers routinely worked 6 or 7 days a week, had no vacations, no sick leave, and no compensation for injuries.

Injuries were common – In 1882, an average of 675 workers were killed PER WEEK on the job.

Women/Children: Doubled between 1870-1890 to 4M women, 1.5 M child workers (10-15)

- Women- laid off first, endured abuse,
- Children received pennies/half pay of adult
As conditions for laborers worsened, workers realized they needed to organize.

Q. How did industrial working conditions contribute to the growth of labor movement?

A. Poor working conditions and low wages forced workers to organize unions to

• demand fair treatment
• decent wages
Craft Unions were unions of workers in a skilled trade (today- HVAC, pipefitters, electricians, etc.)

Samuel Gompers led the Cigar Makers’ International Union to join with other craft unions in 1886

Gompers became president of the American Federation of Labor (AFL)

He focused on collective bargaining to improve conditions, wages and hours

- CB – Two sides (unions v. management negotiate through independent
II. INDUSTRIAL UNIONS

Some unions were formed with workers within a specific industry but this included skilled & unskilled workers.

Eugene Debs attempted this Industrial Union with the railway workers (ARU) Am. Rail U.

In 1894, the new union won a strike for higher wages and at its peak had 150,000 members.

- Added to momentum of union organizing

Q. How did craft unions differ from industrial unions?

A. Craft unions included skilled workers from many different industries, while IU’s included skilled and unskilled workers from a specific industry.
SOCIALISM AND THE IWW

Some unionists (including Debs) turned to a socialism

Q. What is socialism?

A. Economic and political system based on:

• government control of business and property
• equal distribution of wealth among all citizens
• Why? Equality and fairness to prevent owners from taking advantage

IWW: International Workers World was socialist.
THE HOMESTEAD STRIKE

Even **Andrew Carnegie** could not escape a workers strike.

Conditions and wages were not satisfactory in his Steel plant in Pennsylvania and workers struck in 1892.

Carnegie hired detectives to guard the plant and allow scabs (workers who cross picket line) to work.

Detectives and strikers clashed – 3 detectives and 9 strikers died.

The National guard restored order – workers returned to work.

**Q.** How did strikes like this cause the public to resent the labor movement?
EMPLOYERS FIGHT UNIONS

The more powerful the unions became, the more employers came to fear them.

Employers often forbade union meetings and refused to recognize unions.

Employers forced new workers to sign “Yellow Dog Contracts,” swearing that they would never join a union.


Q. Why does management and businesses view unions?

A. You have to pay workers more.
Today, we will learn about the **hard labor** and **unsafe working conditions** at the Triangle Shirt Waist Company. In 1911, 146 workers, mostly young women, died in a tragic and historic fire.
1. What factors may have made the fire so lethal?

2. What new regulations were developed because of the Triangle Shirtwaist Fire?

3. Why do you think the 146 victims of this fire might be looked at as heroes?
REMEMBERING THE TRIANGLE SHIRTWAIST FIRE
Directions: After looking at the picture, complete the chart on page 14 doing the following three things:

1. Provide description using detail (what’s happening in picture)
2. Write down the event taking place
3. Describe the significance of the event