

Unit 2: The Industrial Revolution in the United States



The Industrial Revolution was a period of time in which the way we did business was radically transformed and it marked a major turning point in American history. Almost every aspect of life was influenced in some way. There was unprecedented growth in population because more opportunities were available for immigrants to improve their lives. Industry responded by inventing and innovating technologies to meet the demand of the new arrivals into the country. Improvements in transportation helped industries expand and led to settlement in the west. With these advancements in society, the government had a steady increase in tax revenue as a result of business and personal income, which allowed the United States to rise in global power and influence.

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Chapter 1 Causes of an Industrial Revolution

In order for an industrial revolution to occur and sustain itself, there are a number of things that need to take place. Often times, this recipe relies on factors that respond to each other in an effort to maintain its momentum.

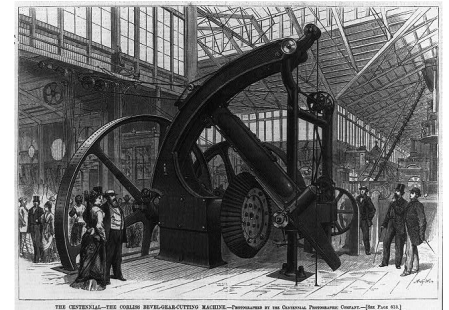
Population Increase

Between 1880 and 1930, more than 27 million people immigrated to the United States. This influx of people created a new demand for goods, such as food and fabric. Industry responded by hiring many immigrants for its labor force and developing faster ways of producing these goods.



Invention of New Machines

New machines were invented and were put into factories and on farms. The new inventions were capable of mass production to meet the new demand of people coming into this country. Mass production also brought cheaper prices for goods, which pushed out cottage industry and made way for big business.



World Trade

With the ability to mass produce goods, industry not only worked to meet the demands of this country but also the demands of the rest of the world. This meant creating quicker means of transportation to get products to different markets throughout the world.

Accumulation of Wealth

As trade grew so did the businesses that produced the goods. Those people that controlled these businesses became extremely wealthy and used their wealth to reinvest in their businesses to expand even further or put it into new businesses.



Role of Government

The government was responsible for encouraging economic growth. It kept taxes low to promote investment and did little to regulate businesses, which had unintended consequences.

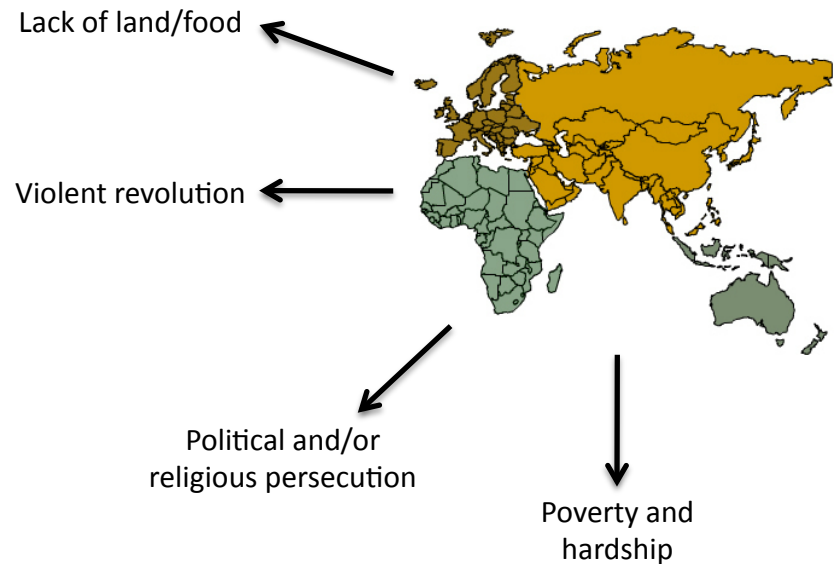


Chapter 2

Immigrant Perceptions versus Reality

People who immigrate to another country take into consideration a number of factors before uprooting themselves and their families to start over in a new place. These factors are called “push and pull” factors. Push factors are those reasons that make them want to leave or be pushed out of their countries, and pull factors are those reasons that draw them into a new country. The following push and pull factors that existed at the turn of the 19th century still exist today.

Immigrant Push Factors



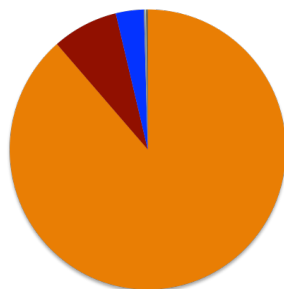
Immigrant Push Factors



Promise of freedom
and a better life

Chance to join family
and friends
Available jobs

Immigration by Region Between 1870-1919

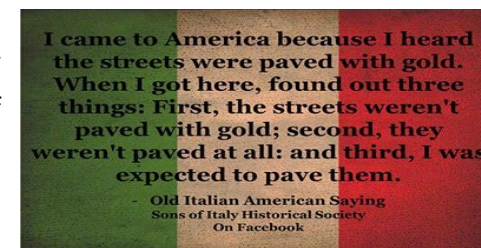


- Europe (23*)
 - N&S America (2)
 - Asia (.85)
 - Oceania (.052)
 - Africa (.017)
 - Not Specified (.05)
- (*in millions)

Around 1900, the United States experienced a massive wave of immigrant newcomers, the biggest in history. Millions of people from around the world came to America, especially from Eastern, Southern, and Western Europe. Different immigrant groups tended to settle in different areas, but Europeans mostly settled in the big cities like Chicago and New York. Between 1880 and 1930, over 27 million immigrants came to the United States. They left their homes in the “Old World” to start new lives in the “New World,” which was America.

There were two main ports of entry into the country on the east coast, both of which were in New York. Castle Garden took in 8 million immigrants between 1855 and 1890, while Ellis Island welcomed 20 million between 1870 and 1919. Most Asian immigrants came through Angel Island in the San Francisco Bay. It was sometimes said that America’s streets were paved in gold. However, this myth only held a grain of salt for the millions of immigrants who had left a life of poverty behind. They came to America because it offered a chance to improve their lives. Some immigrants did get rich here through hard work and determination. Many more managed to carve out a decent life for themselves and their families. For these immigrants, the chance to come to the United States was indeed a golden opportunity. For even more immigrants, it was difficult to rise out of the poverty from which they tried to escape.

On a plaque at the immigration museum of Ellis Island, the words of an immigrant was quoted. It says ...



Tenements, or the apartments immigrants lived in, were notoriously small in size, and most contained no more than two rooms. One of the rooms was used as a kitchen, and the other as a bedroom. Many families worked out of their apartments as well – sewing clothes or rolling cigars. Tenement buildings were usually made of brick and built side by side on narrow streets. As a result, most rooms had only one or two windows, sometimes none.

Because the tenements were crowded and rundown, which resembled the neighborhood, immigrants faced many hardships due to their living arrangements. There was a lack of sanitation, which could cause illness to spread easily in the close quarters; air pollution from the factories and industries filled their lungs; and crime rates spiked as the nation's murder rate tripled.



Chapter 3 Symbolism and the Statue of Liberty

The first thing that many immigrants saw in America after sailing across the Atlantic Ocean at the turn of the 19th century was the Statue of Liberty. She was meant to symbolize what this country promised its people in the Constitution.



She was not arbitrarily built. From the torch that she holds tall to the broken chains at her feet, there are many symbolic parts to her. The symbolism takes on many forms and can be interpreted a number of ways.

The Statue of Liberty functions as a lighthouse as she holds her torch high, guiding ships to shore. People are enlightened when they come here and are able to see the light at the end of the tunnel when they arrive. Her crown can symbolize our nation's sovereignty and the sovereignty of our people to shape their own destiny. As people came from all seven continents and traveled the seven seas to get here, it is no coincidence that her crown has seven points.

The tablet that she holds in her left hand has the day this country declared its independence written in Roman numerals. The symbolism is not lost for those immigrants coming to this country in search of the same freedom and independence our founding fathers fought so hard over 200 years ago. Just like our founding fathers, many people come to this country to flee oppressive rulers. The broken chains at the foot of the statue can represent being freed from tyranny. Lady Liberty is also wearing a toga, symbolizing Greece and the birthplace of democracy. In addition, at a time when men were the dominate figures in society, the Statue of Liberty is in the form of a woman, which can symbolize a more nurturing figure to welcome the masses to our shores.



Chapter 4

Inventions Change a Nation

Before the Industrial Revolution, every mechanical object was made completely by hand. Because each object was made by hand, a similar object would be slightly different. No two objects would be exactly alike. Example: a rifle would have been made from start to finish by a single skilled craftsman. The parts of this rifle would not fit any other rifle, no matter how similar they appeared to be.

Interchangeable Parts

Eli Whitney was an American inventor who thought of a new way to make rifles. Rather than have highly skilled men make individual guns, he had unskilled men make parts that could be put together to form complete rifles. This would be like parts of a puzzle that make a whole picture. These parts were cut from a milling machine that Whitney invented. These parts were interchangeable and could be used in other rifles.

Interchangeable parts used in rifles and guns could be made and assembled much more quickly than a handcrafted gun or rifle could. The positive effect is that guns and rifles were easier to repair because only the broken parts had to be replaced.

Manufacturers of other products began to use Whitney's milling machine—making parts and objects needed for their own production. The invention of interchangeable parts initiated mass production. Goods were able to be made in great quantities by machines. Manufacturers and factories relied on the machines more than the human standing beside them.



The Patent Office had never seen a year like 1897. An average of nearly 60 patents, or licenses for new inventions, were being granted every day. By year's end, Americans had registered some 21,000 patents. This was more than the total recorded in the entire 1850s.

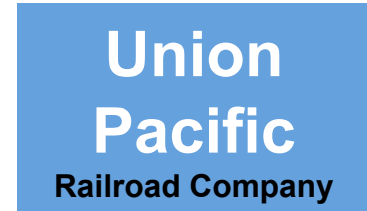
The United States had become a land of invention. Between 1870 and 1900, patent officers issued more than 500,000 new patents. Some went to lone inventors like William Blackstone of Indiana. In 1874, he built a machine that washed away dirt from clothes. It was the first washing machine designed for use in the home. Other inventors, like the legendary Thomas Edison, filed patent request after patent request with the government. Thousands of inventions poured from his laboratory.

Chapter 5 Railroads Spur Development

The railroad industry expanded through the building of a transcontinental railroad system. This massive expansion effort stimulated economic growth throughout the country. After the Civil War, railroad companies built lines all over the U.S. Most railroads only covered about a 50-mile stretch of track. Switching railroad lines was not only inconvenient for passengers, but it was also costly for those who shipped goods because they would have to pay for products to be transferred to another line. With the invention of the gauge track to create a network of connected railroad lines, the U.S. government, along with two railroad companies, began to develop a transcontinental railroad that connected the eastern and western portions of the country.



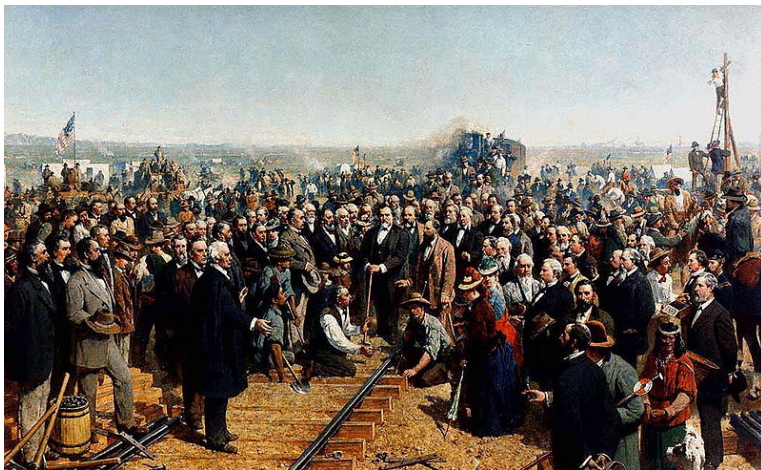
The Central Pacific started building from Sacramento, California in 1863.



The Union Pacific started building in Omaha, Nebraska in 1865.

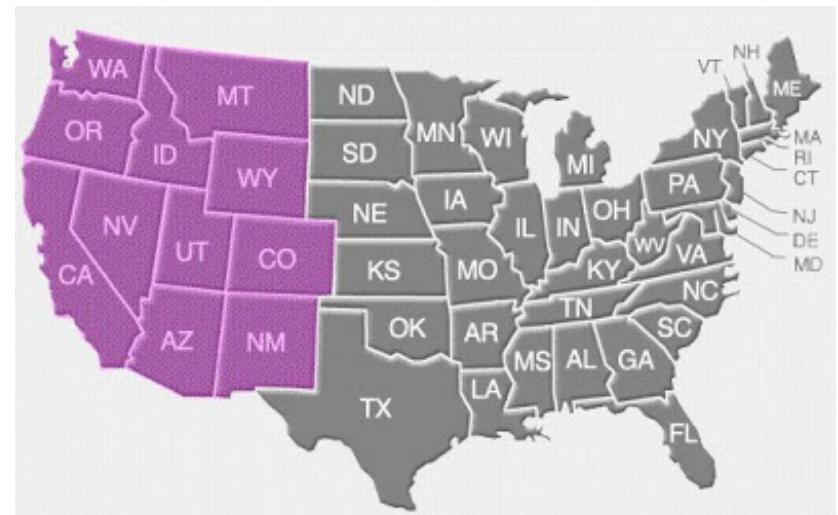


The Central Pacific laid down less track because they had to first tunnel through mountains before they were able to connect the lines. The presidents of both railroad companies drove a ceremonial golden spike into the railroad at Promontory Point, Utah, which finally connected the east and west coasts of the United States.



As the railroad industry grew, so did the industries that supported its growth. The steel industry soared as railroad companies built thousands of miles of steel tracks. There was a growth surge in the timber industry as railroad ties were being laid between the steel tracks. Once the trains started running, coal production increased because it was used as fuel to propel the trains along the track.

The federal government understood the inherent benefits in the expansion of the transportation system and offered subsidies in the form of land grants to help build the railroads. Jobs were created in the construction and operation of the railroad system. The completion of the railroad system also opened up the west to settlement as those territories became progressively more populated.



Chapter 6

Rise of Big Business

As industries expanded at the turn of the 19th century, Americans found new ways to do business. Growing businesses needed money to expand. To raise money, corporations could sell stock to investors, which would provide capital to expand but give up a certain amount of control in the corporation, or they could borrow money from a bank, which would have to be paid back with interest. Bankers such as J.P. Morgan invested in corporations even during hard economic times.

Corporations grew exponentially during the Industrial Revolution and there were many monopolies formed. A monopoly is exclusive possession or control of supply or trade of some type of commodity or service. One example of this could be seen with Standard Oil. Its founder, John D. Rockefeller, bought out most of the competition and controlled 95 percent of the oil refineries in the U.S. Cornelius Vanderbilt was also a captain of industry because he controlled the vast majority of the railroad industry.

Monopolies enabled its owners to not only control the industry, but also led to get fortunes being amassed. Andrew Carnegie made a great fortune from controlling the steel industry and had very progressive ideas about what should be done with great wealth. He was one of the first American philanthropists that felt that those with great wealth had a responsibility to provide opportunities for people to better their lives. He wrote a book called *The Gospel of Wealth* in which he explained his rationale.

Many people were opposed to monopolies for a number of reasons. When companies have to compete for business, the goods being produced are often of good quality and the prices are fair because otherwise consumers will seek out their competitors. Companies that cannot compete with the quality and price will go out of business.

With competition gone, monopolies have no reason to keep prices low or make a good product. Once a monopoly has been established, it is difficult for new companies to start because they cannot compete with the prices being offered by suppliers to make a product or the prices being offered to consumers by the monopoly. In addition, workers that felt like they were being treated unfairly could not turn to another company in the same industry because the same corporation controlled it.



Chapter 7

Early Labor Unions



The lives of workers changed as industry grew. Factories were much larger than the environments found in cottage industry. There were many employees that worked in sweatshops on dangerous machines. Many factory owners were detached from their labor force and did not always know their workers. The positions they held taught them few skills and paid them low wages.



Workers got together to improve their working conditions and formed unions. These were organizations that were established to help its members improve the environments they work under. The most common issues unions fought to change were fair wages, fair hours, and safer working conditions. Union tactics in their fight for change included collective bargaining, strikes, and boycotts.

Unions found success and disappointment when trying to bring about change for their membership. The labor union organized a successful strike at the Union Pacific Railroad. The railroad decided not to cut the wages of workers and the Knights of Labor union membership soared. A riot was sparked when workers and strikebreakers clashed at Haymarket Square in Chicago. It resulted in 4 workers and 7 police officers being killed. A fire erupted at the Triangle Shirtwaist Company that gained enough publicity that many states passed safety laws for factories.

However, there were times in which unions made little progress, especially when workers chose to strike. When the federal government was brought in to mediate the negotiations they would often side with factory owners to ensure that production continued and economic activity was maintained. Some Americans even thought that unions were run by radical foreigners because of the communist and socialist countries of origin from which many immigrants came.

Chapter 8

Changes Caused by the Industrial Revolution

As the Industrial Revolution changed the way Americans worked, it also brought about changes to the economic, social, and political fabric of this country.

Economic Changes

Machines replaced people as the main method of production and the factory replaced the home as the center for production. The standard of living grew higher as more goods were being produced. Workers grew dependent on owners and they could be fired and replaced at any time because of the influx of immigrants coming into the country looking for work. Working conditions and wages were often barely tolerable and workers formed unions to correct this injustice. As a result of the ability to mass produce goods, trade between countries increased.

Social Changes

The standard of living was not only an economic change but also a social change. As jobs became more available, people were able to find work and support themselves and their families. Women and children even began entering the workforce to help support their families. Many farmers moved to cities to get jobs in factories. Not only did farmers move from rural to urban areas but so did the millions of immigrants that came to America in search of jobs. This caused the population of cities to increase exponentially. As cities grew, they experienced problems that included overcrowding, lack of housing, poor sanitary conditions, disease, and poverty.

Political Changes

The land-owning class (aristocrats) were replaced by the industrial class (capitalists) as the leaders of government. A *laissez-faire* policy took the place of *mercantilism*. Laissez-faire meant free trade without interference from the government. Mercantilism is a government policy of controlling markets and meant that nations could be strengthened by government control of its economic interests. This shift in policies enabled the United States to replace Great Britain as the leading industrial nation in the world.

As the Industrial Revolution expanded, industrial nations sought new markets for their goods in other parts of the world. Capitalist nations became imperialist nations, which extended their rule over other countries and territories. This caused problems that led directly to conflicts such as the Spanish-American War and World War One.