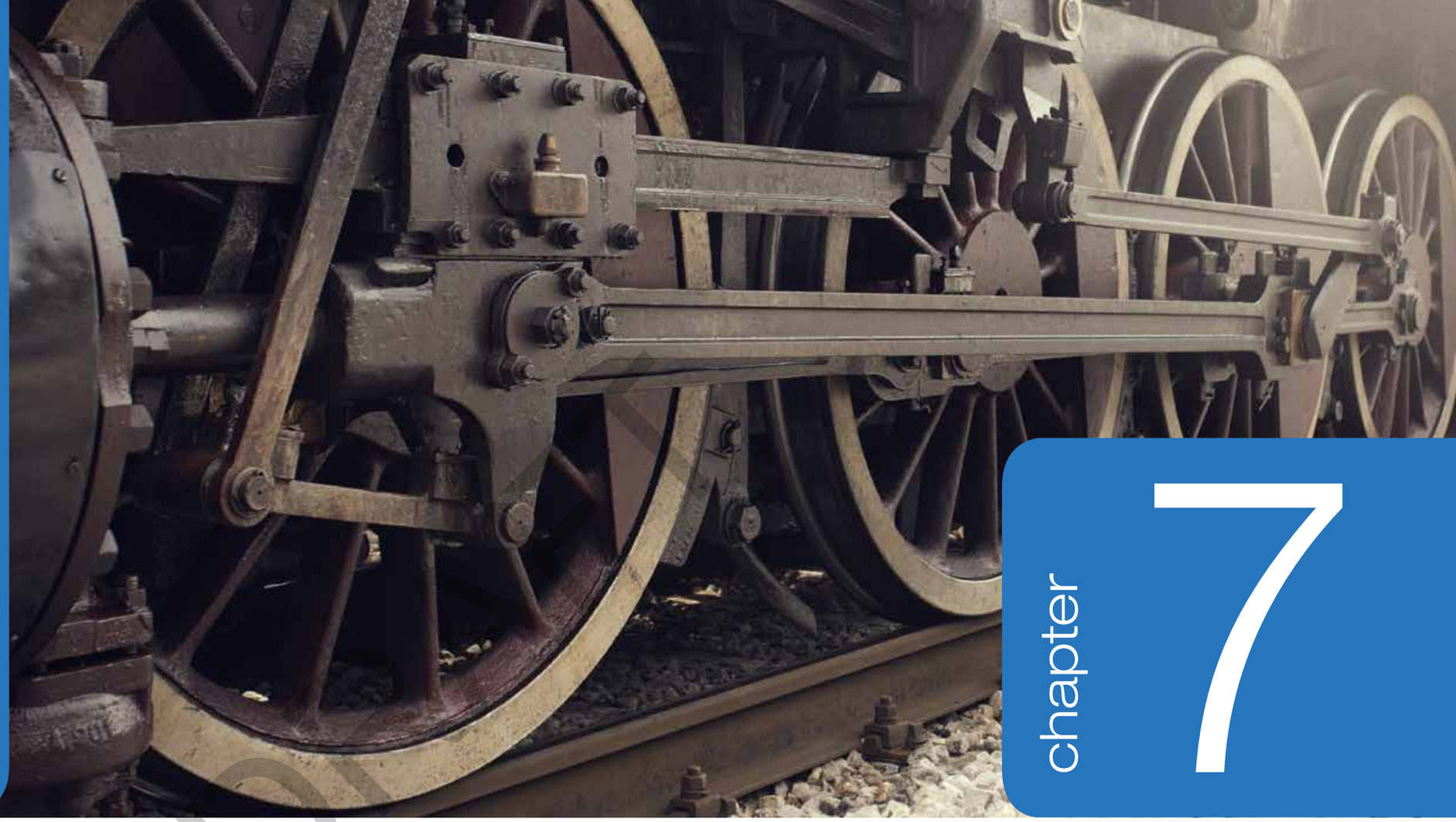
Unit 1 The Industrial Revolution

Introduction to the Industrial Revolution

The Industrial Revolution was an era of change all over the world. Prior to the Industrial Revolution, which began in Britain around 1750, most people lived in small rural communities, growing their own food and making many of the items they needed (such as clothes) themselves. Over the course of the Industrial Revolution all of this changed. New technologies were introduced that meant that a range of goods could be produced in huge numbers in factories.



chapter 7

Source 1 Factories such as this one in Vermont, USA, were the driving force of the Industrial Revolution. They allowed raw goods to be manufactured and sold in large quantities. Much of the workforce at the time consisted of young children.

7A
What factors shaped the world from 1750 to 1918?

7B
How did technology and industry shape the modern world?

Unit 1 The Industrial Revolution

This unit is **mandatory**:

- The Industrial Revolution.

It must be completed by all students.

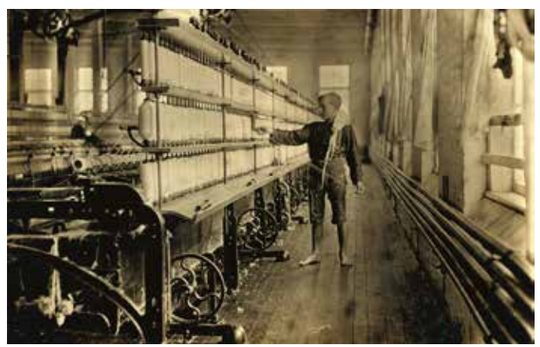
7.1 The birth of the modern world

Most historians agree that the modern world (also known as the industrial world) developed from the 1750s onwards. They use the term 'modern world' to describe this period mainly because the developments that took place from this time onwards are familiar to people in Western societies today – for example, systems of law and government still followed in countries like Australia, Britain and the United States all took shape at this time. Other examples include:

- the mass production of goods in factories (see Source 1)
- the mass movements of people to cities and towns
- the establishment of trade unions and workers' rights
- mass migration of people from across Europe to colonies in the **New World**
- the start of rapid transport and mass communication
- organised public education and schools.

The expansion of European empires

From the late 16th century onwards, major European powers – such as Britain, France, Spain and Portugal – all competed to increase their control of new territories across the globe – a practice known as **imperialism**. Colonies were valued not only for the additional power and military advantages they could provide, but also because they delivered access to a range of raw materials like timber, cotton, coal and gold. These materials became the driving force behind the development of a range of industries in Europe. They also made imperial powers extremely wealthy.



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Raw materials from **colonies** across the British Empire fuelled the **Industrial Revolution**. These materials included wool and gold from Australia; cotton, sugar and tobacco from the Americas; gold and diamonds from Africa; and spices, fabric and tea from India.

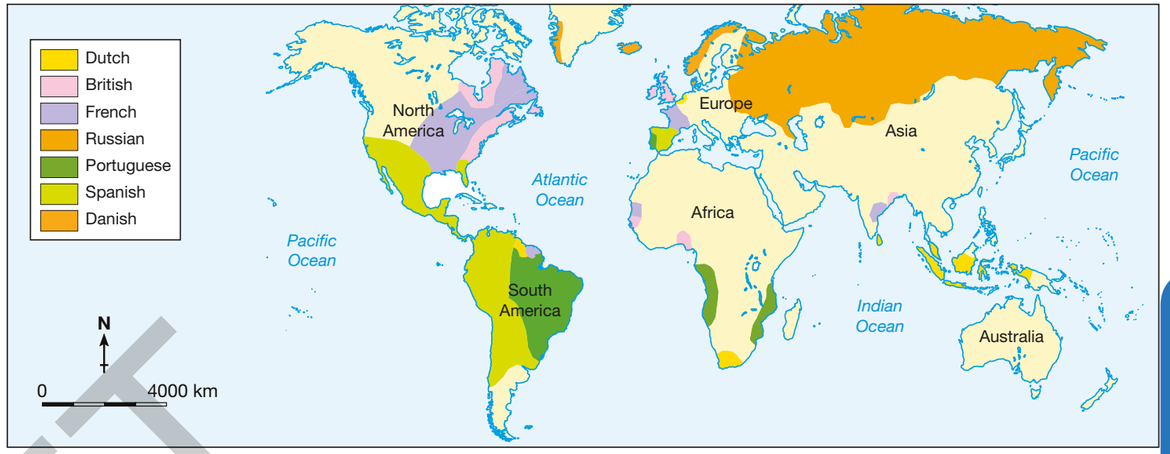
In addition to raw materials, the overseas colonies became valuable markets in which to sell the products manufactured from those raw materials for a profit (e.g. cloth made from cotton and cigarettes made from tobacco). In this way, European empires profited not once, but twice from their colonies around the world.

A comparison of world maps in 1750 and 1900 reveals how quickly European empires expanded their territories over a period of 150 years (see Sources 2 and 3).

Newly formed countries such as Italy and Germany aggressively looked for colonies at the end of the 19th century so that they could compete with the major powers in Europe such as Britain and France. This rivalry over colonies around the world was one of the key factors that contributed to the outbreak of World War I in 1914.

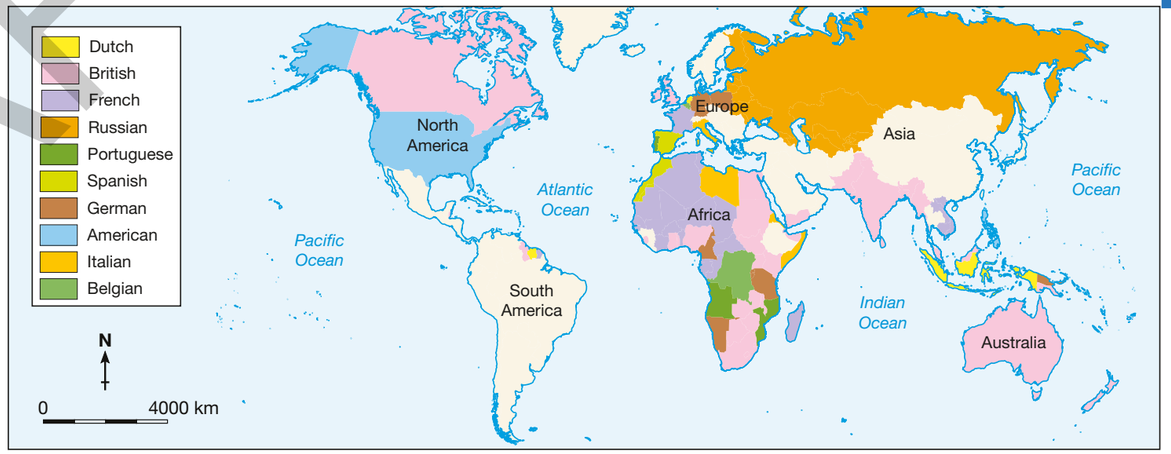
At the end of World War I in 1918, the British Empire reached its peak. By that time, it controlled approximately a quarter of the world's population and land mass. Many of these colonies were vital during World War I, as they provided local support and supplies for the British war effort.

WORLD: COLONIAL EMPIRES IN 1750



Source 2 Source: Oxford University Press

WORLD: 2 COLONIAL EMPIRES IN 1900



Source 3 Source: Oxford University Press

Check your learning 7.1

Remember and understand

1 What is meant by the term 'modern world'? When do most historians agree it began?
2 Why were distant colonies such important assets to European powers during the 19th century? In what ways did imperial powers profit from them?
3 What percentage of the world's total population and land mass did Britain control by 1918?

Apply and analyse

4 Examine Sources 2 and 3.
  a List the three European powers that controlled the most overseas colonies in 1750.
  b List the three European powers that controlled the most overseas colonies in 1900.

What changes in European empires and territories took place between 1750 and 1900?

7.2 Key events of the Industrial Revolution

The Industrial Revolution first began in Britain around 1750 after a series of changes in farming practices paved the way for the country to increase its population and improve its production and manufacturing methods. These changes in farming methods – now referred to as the **Agricultural Revolution** – were gradual. They began in the middle of the 17th century and continued through the 19th century. Without them, the Industrial Revolution would not have taken place. One of the main features of the Agricultural Revolution was the fencing off of thousands of small areas of common land that had previously been used by local farmers to grow food. These smaller areas of land were joined to create larger farming areas. This process, known as the **enclosures**, benefited wealthy people who were granted rights to farm these larger areas of land for profit. The enclosures, together with innovations in farming machinery and animal breeding, meant that more crops could be grown and animals could be raised by far fewer people. Overall, farming became much more efficient but this took place at the expense of poor people who relied on common land for their daily needs.

Source 1 **Textiles** industry: The Spinning Jenny, invented in 1764

Source 2 **Manufacturing** industry: The steam hammer, invented in 1840

During the Agricultural Revolution, farm workers and their families were forced from their homes, and people moved away from rural villages to towns and cities in search of work. They became a new class of workers that fuelled the spread of the Industrial Revolution. They provided a much-needed labour force to operate the new factories and mills in rapidly expanding cities.

Key inventions and innovations of the Industrial Revolution

The first industries that were transformed by innovations in the Industrial Revolution were related to the production of iron, coal, cotton and wool. Inventions and new practices in one industry tended to affect others. For example, the development of coal-powered steam engines led to an increased demand for coal. The expansion of new and deeper coal mines required better steam engines for the pumping machines that removed water from the bottom of mines. Improved steam engines could power hundreds of spinning and weaving machines and led to the spread of large factories and mills across England. As steam engines developed, they also powered new modes of transport, including steam-powered trains and ships, and were later used to generate electricity.

Source 3 **Transport** industry: The steam train, invented in 1801

Source 4 **Communications** industry: The telephone, first patented in 1876

Living and working conditions

Working conditions for British factory and mine workers in particular were harsh and demanding during the Industrial Revolution. Men, women and children worked in unsafe conditions and for many hours – six days a week and up to 16 hours a day. Through the 19th century, demand for reforms to regulate working conditions grew louder in Britain, particularly for child labour. This led to a series of government inquiries and legislation that regulated the minimum employment age, wages and the length of the working week. By the 1870s, for example, no child under 10 could be employed in factories and education for children under 10 was compulsory.

Living conditions for factory workers were also appalling. Many workers lived in slum areas close to the factories where they were employed (see Source O.8). Families had no choice but to live in overcrowded conditions, often with no access to fresh water or proper sewerage. Consequences of these unhygienic living conditions included regular outbreaks of disease, a low life expectancy (just 29 years, in Liverpool in 1865) and a high infant mortality rate.

Many writers of the time were appalled by the plight of the working poor whose work seemed unrewarding and whose lives were cut short by poverty, disease and injury. This period led to calls for social reform and also saw the formation of workers' groups, such as **trade unions**.

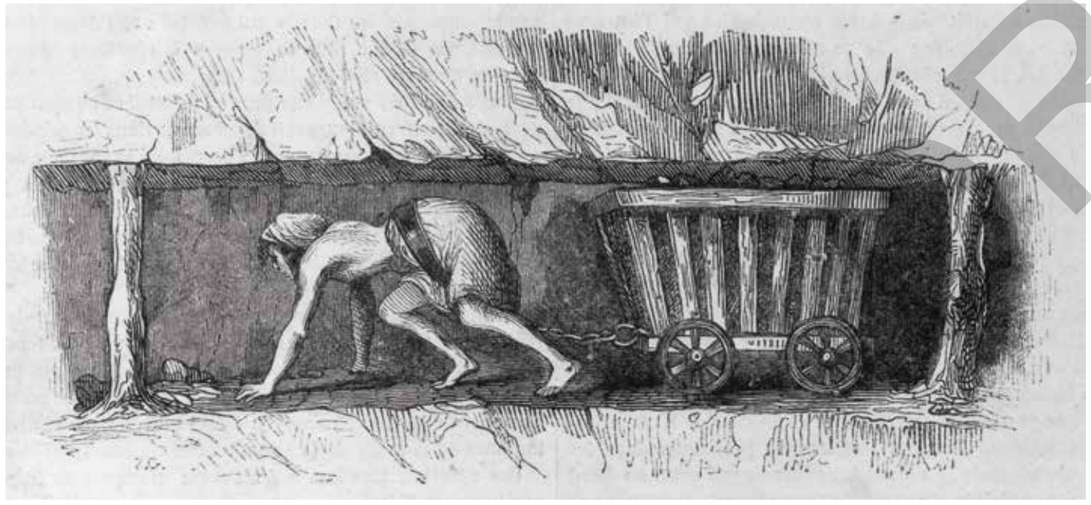
Towards the end of the period, conditions improved for many people. Slums were torn down to be replaced by new houses that provided heating, running water and sewerage systems. There were also a number of other benefits for workers in cities brought about by the Industrial Revolution. For example:

- improvements in farming made food cheaper and more plentiful
- mass produced goods such as clothing and furniture became more affordable
- improved public transport allowed workers to live away from factories in the newly developed suburbs
- street lighting transformed city life, encouraging people to enjoy entertainment at theatres and in music halls at night.

Long-term impacts of the Industrial Revolution in Britain

The Industrial Revolution had significant impacts for Britain and its people. It transformed Britain's economy, which became (for a time) the world's leading economic and industrial power. Britain's population quadrupled from an estimated 6.5 million people in 1750 to more than 27.5 million in 1850 as living standards improved and death rates decreased.

Britain changed from an agricultural society to an urban society, with most people living in towns and cities where work could be found. In the growing towns and cities, a 'middle class' emerged: people who were neither landowners nor workers, such as bankers, shopkeepers, teachers and administrators. Suburbs surrounding the cities later developed.



Source 7 This illustration shows a girl employed as a 'hurrier' at a coal mine. Her job was to pull heavy coal carts along dark, narrow tunnels, using a harness and belt.

Source 8 People living in a 19th-century London slum. Conditions were often crowded and unsanitary.

Check your learning 7.2

Remember and understand

1 Why was steam power so important to the Industrial Revolution?
2 Name the four industries that underwent great change during the Industrial Revolution.
3 What were the enclosures? What effect did they have on farmers using common land to grow food?

Apply and analyse

4 In a class discussion, share your knowledge of working conditions for children during the Industrial Revolution. How do they compare with working conditions around the world today?

Evaluate and create

5 Conduct some additional research and write a 250-word description of what life in a typical city in Britain would have been like for a factory worker during the Industrial Revolution.