

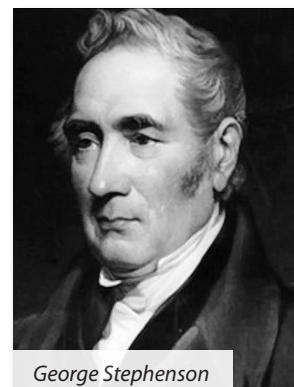
## The birth of the railway in England

The **Industrial Revolution**, which began in Great Britain in the second half of the 18<sup>th</sup> century, spread to Europe and North America in the early 19<sup>th</sup> century. It created an enormous *increase* in the production of many kinds of *goods* resulting from the introduction of power-driven machinery and the development of factory organization and mass production.

The iron and textile industries, along with the development of the **steam engine**, played central roles in the Industrial Revolution, which also saw great improvements in the systems of transportation, communication and *banking*.

The transportation industry, in particular, **underwent** significant transformation. Before the invention of the steam engine, **raw materials** and finished goods were transported and distributed by means of **horse-drawn wagons**, and by boats along canals and rivers. The first railway steam locomotive was built by Richard Trevithick and, on 21<sup>st</sup> February 1804, the world's first railway journey took place along the tram track of an **ironworks** in south Wales.

In the early 1800s in England, George Stephenson, a civil and mechanical engineer known as the “Father of Railways”, together with his son Robert Stephenson, greatly innovated the railways over the next few years.



George Stephenson



The Rocket (reproduction)



The Flying Scotsman, a legendary steam locomotive

In 1825, a new railway was opened between the towns of Stockton and Darlington: it was the first public railway. In October 1829, the Railways Board organized a competition to find the best locomotive **to pull** heavy loads over a long distance. George Stephenson's locomotive the “Rocket” was the winner, achieving the record speed of 29 miles per hour. The success of the “Rocket” stimulated the *laying* of railway lines and the construction of locomotives all over the country. In 1830, the railway between Liverpool and Manchester became the first to offer regular, planned passenger services. By 1850, Britain had more than 6,000 miles of railway tracks. The railway age had begun.

**horse-drawn:** *trainato da cavalli*

**ironworks:** *ferriera, officina dove viene lavorato il ferro*

**to pull:** *tirare*

**raw materials:** *materie prime*

**steam engine:** *motore a vapore*

**to undergo (underwent-undergone):** *subire.*

### 1 Read the text and match the words in *italics* to the correct definition.

1. Placing something in a proper position: .....
2. The business carried on by a bank: .....
3. To be the first to do something: .....
4. Growth in size, strength, or quality: .....
5. Things that are made to be sold: .....
6. Four-wheeled vehicles used for carrying heavy loads: .....

### 2 Answer the following questions.

1. When did the Industrial Revolution begin in Great Britain?
2. When did it spread to Europe and North America?
3. Why did the Industrial Revolution create an enormous increase in the production of many kinds of goods?
4. What kind of industries and improvements played a central role in the Industrial Revolution?
5. How were raw materials and goods transported before the Industrial Revolution?
6. Who built the first steam locomotive?
7. Who were George and Robert Stephenson?
8. What happened in 1825?
9. What was the "Rocket"?
10. What was the first passenger railway line?

### 3 **PAIR WORK** In turns, ask and answer the following questions.

1. Do you often travel by train?
2. When was your last journey by train? Where did you go?
3. Do you use a train service to go to school?
4. What means of transport do you prefer? Why?



#### The Napoli-Portici railway

**The Napoli-Portici** was the first Italian railway line. It was built by the French Company Bayard and opened in 1839. It now forms part of the Naples–Salerno line. The construction included 33 bridges; work also continued to take the lines as far as Nocera. While it is clear that such a short line could not have a great impact on trade and commerce, the line proved to be very popular. 58,000 people travelled in the first month and extra locomotives had to be ordered from England with drivers and engineers.

