

Cornelius Drebbel (1572–1633)

Cornelius Drebbel was born in the Netherlands in 1572. When he was a young man, Drebbel worked as an apprentice to an engraver and glassmaker, but his mind was always elsewhere. What he really wanted to be was an inventor.

Drebbel began inventing and building various mechanisms, including a water-supply system and a fountain. It wasn't too long before his fame spread to England where King James I began to take an interest in his work. Can you imagine Drebbel's delight when the king sent him an invitation to visit his London court?

While at court, Drebbel's abilities as an inventor continued to improve. One of his most interesting creations was the perpetual motion machine which told the time, date and season.

In 1620, Drebbel finished work on what would be his most famous invention – his wooden 'diving boat', or submarine. Imagine a wooden rowing boat with raised sides and a roof, waterproofed by a covering of greased leather. A watertight hatch allowed people to enter and exit the vessel. A rudder and four oars poked through the sides, sealed with leather flaps. Several pigskin bladders (similar to balloons) could be filled and emptied to cause the submarine to dive or surface. Once inside, rowers were supplied with snorkel tubes attached to floats so that they could breathe underwater. Drebbel had thought of everything!

One of Drebbel's finest moments was the day that his boat journeyed underwater at a depth of over four metres for three hours along the River Thames. King James I even tried it, making him the first monarch to travel underwater!

During his lifetime, Cornelius Drebbel also invented:

- a uniquely designed telescope, microscope and thermometer
- a thermostat for a self-regulating oven
- a special scarlet dye and a better way to fix dye to cloth
- a method to make sulphuric acid
- an unsuccessful floating bomb for King Charles I

Even though Cornelius ended his life as a pub landlord living in poverty, he is still remembered as the inventor of the first navigable submarine.

