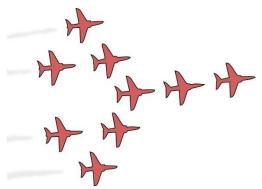
All About Airplanes!



The birds had been flying since God created them, whereas "The metal birds" – the airplanes – have been flying only since the early 20th century.

Before there were airplanes humans tried to fly but they did not know how to. After many years of trying they were able to fly kites in the air. And after flying kites for many years they came up with the idea of making kites huge enough to carry people in the air. They experimented and failed but they kept on trying.

After the Wright Brothers' flight, inventors kept designing new kinds of planes, made mistakes here and there but importantly kept learning from them, kept pushing forward into making better and better airplanes.

The airplanes now are big and strong and look like birds of metal, and fly much faster and higher than the birds.

Now we have gliders, passenger planes, helicopters and jets and space shuttles. Some of these jets can travel even faster than sound (Supersonic jets).

Here are some interesting facts about the kinds of airplanes that we have now.

- Gliders are also known as sailplanes. Older gliders did not have engines on them, they were just pushed off a hill or cliff by the pilot and allowed to sail freely in the air. In some places where Gliding Station did not have a high cliff to jump off the gliders use an external motor engine to take off sometimes a car or another airplane could pull the glider to give it a start. Most modern gliders now have a motor to help them in taking off and in extending the gliding-time.
- Passenger Airplanes These airliners are mostly used for carrying passengers from one place to another. One of the largest passenger airplane is the Boeing 747-400

- and it can hold 524 passengers, not counting the crew. The new AirBus A380 is able to accommodate even a higher number of passengers, as much as 840.
- <u>Helicopters</u> A helicopter or a chopper is a special kind because of its rotor that helps it to lift itself without needing a runway.
- Jets and Fighter planes When there is a need for speed, fighter jets come to mind. These are mostly used by the military that is the Air Force employed by various countries of this world. Modern jet fighters commonly fly at speeds higher than 1,000 miles per hour and up to about 1,600 miles per hour.
- Space Shuttles If you need to explore the outer space you need to book a ticket on the space shuttle! It looks like something between an airplane and a rocket.
- And lastly of course, Paper planes These are just for playing games and having some fun at home. A Japanese engineer set a record in 2009 by flying a paper plane that he could keep aloft for 27.9 seconds. Incidentally this engineer is also the chairman of the Japanese Origami Airplane Association.

Beyond the Wings and Tail

You may know a little something about the common parts of an airplane, such as the wings, tail, body (or fuselage), propellers, or engines. But did you know that the first airplanes were made out of wood and cloth?

Today's airplanes are aircraft that have **fixed wings**, which means the wings don't move. Unlike birds that flap their wings to lift up into the air, the wings on an airplane stay in the same place throughout the flight. One type of airplane, called an **ornithopter**, actually had wings that flapped like a bird!



An Ornithopter

People tried to build ornithopters for over 3,000 years, but no one built one that worked until about 75 years ago. The famous artist and inventor Leonardo da Vinci drew plans for an ornithopter, but he never tried to build it.

They're Super Fast

One benefit of traveling in an airplane is that they travel very fast, so you can cover great distances in a short amount of time. Some planes actually can fly faster than the speed of sound! These planes are called supersonic. They travel at over 768 miles per hour!



The Concorde

The most famous supersonic plane was called the Concorde. It flew between New York, London, and Paris. While regular airplanes could fly from New York to Paris in eight hours, it took the supersonic Concorde only three and half hours or less to cover the same distance.

Who Was First?

Orville and Wilbur Wright, usually known just as the Wright Brothers, are given the credit for building the first successful airplane. Many other people built planes before the Wright Brothers, but these planes didn't stay in the air for very long. Many of these early planes couldn't be controlled by the pilot; the inventors were lucky if the plane went up into the air at all! They didn't worry about steering it!

The Wright Brothers completed the first controlled plane flight at Kitty Hawk, North Carolina, in 1903.



A model of the plane flown by the Wright Brothers.

Would you believe that they actually only flew 120 feet? That's only about one-third the length of a football field! One of today's popular planes called the Boeing 747 actually has a wingspan of 195 feet from the tip of one wing to the tip of the other wing. That means that the wingspan of the Boeing 747 is 75 feet longer than the entire distance traveled by the Wright Brothers during their first flight!

More information on the Wright Brothers can be found here:

https://kidskonnect.com/people/wright-brothers/

Charles Lindbergh



Occupation: Aviator

Born: February 4, 1902 in Detroit, Michigan

Died: August 26, 1974 in Maui, Hawaii

Best known for: The first person to pilot a solo non-stop flight from New York to Paris

Where was Charles Lindbergh born?

Charles Lindbergh as born in Detroit, Michigan on February 4, 1902. His father was elected to the U.S. Congress when Charles was still a child. His mother was a schoolteacher. Charles spent much of his youth in Minnesota and Washington D.C. He enjoyed the outdoors while living on his family's farm in Minnesota.

Learning to Fly

Charles dreamed of one day becoming a pilot. After two years of college at the University of Wisconsin, he quit to take a job as an airplane mechanic. Then he took flying lessons and began to fly planes as a barnstormer. Barnstormers were pilots that traveled the country performing stunts and giving people rides at air shows.

Life as a Pilot

In 1924, Charles joined the Army Air Service where he received formal training as a pilot. After graduating from the army's training school, he took a job as a mail pilot. This was a pretty dangerous job at the time because pilots **had to navigate mostly by eyesight** and they didn't know when they were flying into bad weather.

The Famous Flight

For many years Charles had dreamt of winning the Orteig Prize that would pay \$25,000 to the first pilot to fly non-stop from New York to Paris. The prize was first offered in 1919, but by 1927, no one had successfully made the flight. Charles was sure he could complete the flight. He convinced several businessmen in St. Louis to help pay for a special airplane to be built. On May 20, 1927 Charles took off from New York aboard his plane, the *Spirit of St. Louis*. For the next 33 1/2 hours Charles flew the plane towards Paris. It was a dangerous flight. He used the stars to navigate when possible, but sometimes he just had a compass to guide him. He had to fly through storm clouds, fog, and deal with ice. He also had to stay awake the entire 33 1/2 hours because he was the only one on the plane. Finally, Charles arrived in Paris. He was the first pilot to fly non-stop from New York to Paris.