



The Science of Cotton Candy is a wonderful program which explores the science behind a popular treat.

Machine-spun cotton candy was invented in 1897 by dentist William Morrison and confectioner John Wharton at the 1904 World's Fair. It was named 'Fairy Floss'. In 1921, Joseph Lascaux invented a similar machine, and patented his sweet confection as 'Cotton Candy'. The name 'Fairy Floss' faded away.

Cotton Candy is simply sugar (sucrose) with a little coloring and flavoring added. Sucrose (carbon, oxygen and hydrogen atoms) is heated by special coils to melting point, which breaks the molecular bonds and converts it to liquefied sugar. The hydrogen and oxygen atoms rearrange to form water molecules which promptly evaporate, leaving only carbon behind. The carbon burns and the sugar begins to caramelize. Basic chemistry! As the sugar caramelizes, its container is spinning at over 3400 revolutions per minute. When the hot liquid sugar meets the cool air outside the machine, thousands of filaments form, creating a delicate and tasty treat.

Chemists of all ages will enjoy this fascinating program.
It tastes good, too!