

As a parent, you may think that it is vital to protect your baby from bacteria at all costs, but the truth is, exposure to germs is what builds up a baby's immune system. According to WebMD, being "germ smart" can keep your family healthy and happy.

The basic rules of good hygiene when preparing food, along with frequent hand washing after using a bathroom, handling nappies or touching animals, should always be applied. Dr Joel Weinstock, chief of gastroenterology and hepatology at Tufts Medical Center, Boston, believes that being super clean is not good for growing immune systems. "The vast amount of types of bacteria and viruses and fungi that we see in everyday life don't hurt us at all. They're just there."

Some species of bacteria are needed to keep us healthy

The National Center for Health Research explain that bacteria found in the respiratory and digestive systems are often the first line of defence against pathogens that can cause illness. They also break down carbohydrates and toxins, as well as protecting the cells in the intestine from bad bacteria.

Bad bacteria can exist in small quantities in the body without causing harm – it's only when these disease-causing bacteria flourish, that the immune system is thrown out of balance, resulting in illness.

Antibiotics used in the treatment of illness usually kill the bad bacteria, but also the good.

Infections are caused either by bacteria or viruses. While antibiotics work well against bacterial infections, they are not effective against viruses. The Mayo Clinic warn against inappropriate use of antibiotics, as this has helped to create bacterial diseases that are resistant to treatment.

Typical infections caused by bacteria are strep throat, tuberculosis, and urinary tract infection. Viruses like chickenpox and the common cold cannot be treated with antibiotics.

A study conducted by scientists at John Hopkins University showed that infants exposed to a wide variety of household bacteria, including pets, in the first year are less likely to suffer from allergies, wheezing and asthma, or develop these later in life.

