

FLUORIDATION

What do you think about water fluoridation ? is it beneficial or harmful ?

fluoride was introduced as a public health measure in the 1950s with as much enthusiasm.

Before that let's check what is fluoride and what is fluoridation ?

Fluoride ?

Fluorine is an abundant element, the 13th most in the world. fluorine (F) is a corrosive pale yellow gas, discovered by Henri Mossan in 1886. Fluoride is the ionic form of fluorine, It has the highest electronegativity of all elements. Fluoride is widely distributed in the air, soils, rocks, and water. Water is the major dietary source of fluoride, and some other fluoride sources includes tea, seafood that contains edible bones or shells, medicinal supplements, and fluoridated toothpastes.

Water Fluoridation & Milk Fluoridation ?

water fluoridation is the controlled adjustment of the amount of fluoride in drinking water/ public water supply to a level recommended. By 2012, more than 435 million people worldwide had access naturally fluoridated water (about 57 million) and about 378 million people access water with adjusted fluoride concentrations. Some of these countries include the US, Brazil, Australia, Canada, Spain, Argentina, South Korea, and New Zealand etc.

Adding prescribed quantity of fluoride to milk is **milk fluoridation**. Since 1986, programs aiming to validate the feasibility for community use of fluoridated milk for caries prevention were promoted and supported by the WHO International Programme for Milk Fluoridation. At present, milk fluoridation programmes, supported by the WHO and Food and Agriculture Organization, are running continuously in about 15 countries and various channels are used to provide fluoridated milk to children attending kindergarten and school.

Is Water Fluoridation Beneficial or Noxious ?

First we can check the positive impact ! The verifiable positive impact of water fluoridation is prevention of dental caries. Dental caries, also known as cavities or tooth decay, are an oral disease. water fluoridation rebuild (remineralize) weakened tooth enamel, slow down the loss of minerals from tooth enamel, reverse early signs of tooth decay and prevent the growth of harmful oral bacteria.

Bacteria present in mouth produces acids by breaking down the sugar and carbs, it leads to the demineralization. This was the major reason for fluoridation of water.

Now we can check the noxious part of fluoridation ! fluoride is a pollutant rather than a nutrient. Researchers marked various adverse effect of fluoride. No fluoride deficiency disease has ever been documented for humans other than tooth decay.

There is a mention quantity of 0.7 ppm is best for dental caries, over the concentration of 0.4 ppm will make hazardous effect. These excess fluoride intake causes the bone disease called skeletal fluorosis and also hardened and less elastic bones with increased risk of fracture, joint related issues sometimes bone cancer. Fluoride may adversely affect cognitive development in children, some times leads to ADHD. Higher concentration of fluoride also cause hyperparathyroidism and decreased concentration of calcium in bones, increased concentration of calcium in blood rather than normal concentration.

Although the aim was treating dental caries, but it seems that artificial fluoridation of water supplies has been a controversial public health strategy since its introduction.