Homogenised and Unhomogenised Milk

Unhomogenised Milk

Milk is a combination of fats, proteins, and water. When raw (i.e. unpasteurised and unhomogenised) milk is left to stand for any length of time, the fat molecules float to the top. This creates a layer of cream that is used as a measure of the milk's quality: the thicker the cream, the better the milk.

What is Homogenised Milk?

Before the homogenization process was used, milk was shaken or mixed to achieve consistency in its look and taste. Homogenised milk is milk that has been mechanically heat treated to combine the cream and milk so that it does not separate, and to give it that smooth and even consistency without needing to shake it.

Why is Milk Homogenised?

The main reason for homogenising milk is to reduce the size of the fat molecules in milk so that they will not float to the top but remain suspended in the body of the liquid. It is a recent invention which quickly became the industry standard as people preferred milk that didn't have to be shaken to mix the fat each time they wanted to use it.

In other words, it is done for cosmetic reasons: Big retailers think the consumer doesn't want to see a cream line, nor the cream at the top of the milk bottle, and it is much 'whiter' than unhomogenised milk and is therefore more cosmetically pleasing.

The Process of Homogenisation

This process involves high temperatures, agitation, and filtration, which are all aimed at breaking down milk's naturally occurring fat molecules. It physically smashes the fat globules into tiny particles that cannot ever settle out and rise to the top.

First, the milk is agitated. It is placed in a large drum or barrel that is spun at high speeds. This turbulence starts breaking down the fat. Warm fat molecules disintegrate more easily than cold ones, so heat is often applied as well.

Then the milk is forced through tiny holes, or narrow sieves or very fine filters, at pressures equal to 4,000 pounds per square inch, which break down the fat globules by 10 times or more into unnaturally microscopic droplets. This also subjects the milk to a second bout of high temperature.

Does it Change the Milk in Any Way?

Firstly, homogenisation heats milk to a temperature that changes the properties of any naturally present enzymes.

Secondly, a globule of fat is coated in protein. In its natural state and size, the ratio of fat to protein is as [God] intended, and is fine for us.

But when the fat is smashed into tiny globules, though they are still coated with protein, the ratio of fat to protein is altered so that the protein element is now a bigger proportion of that ratio.

10 Reasons Not to Drink Homogenised Milk

- (1) Some researchers believe that the excess protein ratio is causing metabolic problems for people.
- (2) There is also a problem with a protein enzyme called Xanthine Oxidase which is in milk fat. Normally, proteins are broken down once you digest them, and the globules of fat found in non-homogenised milk are large and readily digested. But the smashed up globules of XO become so small by the process of homogenisation that they are bypassing the normal digestive processes and are passing intact directly through the walls of the stomach or gut into the bloodstream (where the larger natural cream cells don't fit). There they create small holes in the blood vessels and other surfaces, and also bind more easily to the walls of the heart's arteries causing hardening of the arteries.
- (3) This forces the body to form a layer of cholesterol to protect the infected area and patch up the small holes. But this cholesterol is not 'good' or 'pure' cholesterol. It is 'oxidised cholesterol' that comes from the combination of the two types of high heat processing [the first high heat is in the process of pasteurising the milk, and the second is in the process of homogenisation], and it is more directly connected to the development of coronary heart disease.
- (4) Homogenisation is the worst thing that dairymen did to milk. It delivers steroid and protein hormones to the human body (both your hormones and the cow's natural hormones and the ones they were injected with to produce more milk). Simple proteins rarely survive digestion in a balanced world. Homogenised milk, with its added hormones, is rocket fuel for cancer.
- (5) Homogenisation also causes food intolerances, immune responses, and antibody production. Many people are now producing antibodies in response to milk consumption despite having no known intolerance or allergy. This is because the milk is getting into the blood stream in a form that is not recognised by the body, i.e. partially undigested, and so the body is treating it like an invading pathogen.
- (6) The homogenisation process also alters the shape of the lactose molecules. Since we have only one enzyme to digest lactose, we have a problem digesting homogenised milk: "I manage a retail store for a small creamery in lowa that produces non-homogenised milk. We have an ongoing list of over 500 people who are lactose intolerant, but who are able to drink our milk without having to take Lactaid or similar medications. They say they still suffer ill effects if they drink homogenized milk. Based on my experience, I believe that drinking non-homogenized milk is generally in a person's best interest. It is a more natural product than its counterpart which the body is therefore more readily able to process, receiving only the enzymes, nutrients, and fat from the milk that it truly needs."

- (7) It leads to Type-2 diabetes in young people, as well as:
- (8) being the cause of a high number of osteoporotic fractures in men over sixty, and:
- (9) a general epidemic of osteoporosis among women. And for some people, consuming homogenised milk can cause the body to react to the undigested milk proteins by creating excess mucus.
- (10) Homogenisation doesn't make the milk safer; every single milk recall in the US has been for pasteurised and homogenised milk; not a single recall or sickness has come from raw milk.

A Double Whammy!

God did not design the size of the cream (fat) molecules by accident. They are large enough to float to the top for a reason: it makes them too large to be digested through the intestine and are therefore not adding calories or causing harm to the body. And they are designed that size so that they will go all the way through the system and serve as a natural lubricant for the loo! A double whammy of kind design!

Quoted, Summarised, and Edited from the Following Sources:

http://www.hookandson.co.uk/AskAQuestion/index.html

http://www.mac-nutrition.com/raw-milk-pasteurization-of-milk/

http://www.wisegeek.com/what-is-homogenized-milk.htm

http://www.mercola.com/article/milk/no-milk.htm

http://www.raw-milk-facts.com/raw_milk_health_benefits.html

http://infinitelifetime.com/harmful-food/homogenized-and-pasteurized-milk/

http://milk.procon.org/view.answers.php?questionID=000807

http://milk.procon.org/view.answers.php?questionID=000808

http://www.examiner.com/article/non-homogenized-milk