

3B Keeping clean



Are you bothered by body odour? Anxious about acne?
Keen to be clean? All good reasons to use soap!

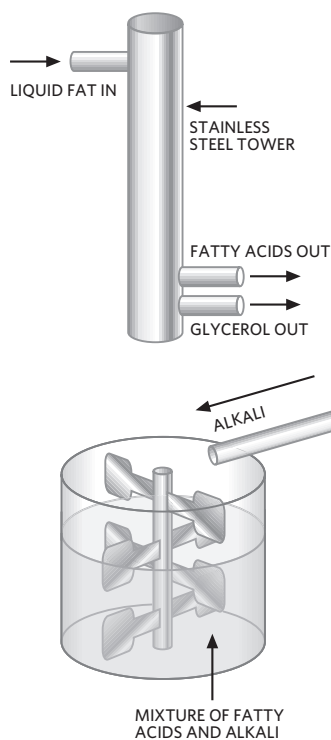
Making soap

Soap is made in a chemical reaction of an alkali with a fat or oil:



Some modern factories use the process below to make soap:

- Pour liquid fat into 20 metre tall stainless steel tower. Add very hot water. The fat breaks down to make fatty acids and glycerol. Pump out the fatty acids and the glycerol. Purify the fatty acids by distillation.
- Mix the purified fatty acids with an exact amount of alkali. Stir while the substances react.
- Add fragrance and continue mixing. Pour the liquid soap into a mould. Wait for it to harden.
- Cut the slab into small bars of soap.



How does soap work?

When you wash, one end of each soap molecule joins to oil, dirt and bacteria. The other end joins to water. So oil, dirt and bacteria get surrounded by water...and are easily washed away.

Thorough hand-washing with soap and warm water prevents the spread of many diseases.

What about antibacterial soap?

Modern companies want to make money. So they develop new products that people might want. One of these products is antibacterial soap. Armpit sweat contains oils. Bacteria feed on the oils. The bacteria make waste products with pungent smells. This smelly waste is body odour. Antibacterial soaps contain chemicals like triclosan, or alcohols. These chemicals kill bacteria or slow down their growth. So bacteria that cause body odour - or disease - are removed.

But do antibacterial soaps work? Only if you leave them on your skin for two minutes. And some scientists say that antibacterial soaps remove useful bacteria that defend our bodies against disease. So perhaps ordinary soap is just as good at getting us clean and stopping diseases spreading...

