



Get to know Omega-3 fatty acids: Key Facts



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Vegetable oils contain polyunsaturated fatty acids (PUFA). Some of these fatty acids are members of the omega-3 group.

Omega-3 is a shorthand description that defines the position of double bonds in the carbon chain.

Omega-3 fatty acids can be short-chain, medium or long-chain (LC).

Oilseed crops like Camelina make alpha-linolenic acid (ALA). ALA has an 18- carbon chain and three double bonds. It is classified as a medium chain omega-3 PUFA.

ALA is an essential fatty acid - humans can only obtain it through their diet.

Eicosapentaenoic acid (EPA; 20-carbon chain) and docosahexaenoic acid (DHA; 22-carbon chain) are omega-3 LC-PUFAs which are beneficial for human health.

The primary dietary sources of EPA and DHA are marine fish, either wild stocks or farmed fish (aquaculture).

Fish, like humans, can't make EPA and DHA. They accumulate them through their diet – so farmed fish need to be provided with a diet rich in these fatty acids.

Vegetable oils do not contain EPA and DHA. Vegetable oils do contain omega-3 fatty acids, but these are in the form of ALA.

ALA does not have the same health-beneficial properties as EPA and DHA