

# The Truth about Cultured Milk Drinks with Probiotics

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Extensive studies on probiotics have shown that these “good bacteria” are able to provide various health benefits such as supporting gastrointestinal and immune health. These proclaimed benefits received considerable attention from the market, which then started incorporating probiotics into mass produced food products. Today, we can find probiotics in various kinds of products, including cultured milk products such as cultured milk drinks and yoghurt.

Due to ease of availability in the market and favourable research findings on probiotics, these products have gained popularity among consumers in recent years. However, there may be certain misconceptions or uncertainties about cultured milk products, for example whether all cultured milk drinks are similar, the ingredients and the sugar content of the products. This article explains the truth about cultured milk drinks with probiotics and provide consumers with a better understanding of these products.

## What’s in a cultured milk drink?

The main ingredients of cultured milk drinks with probiotics generally consist of specific live probiotic culture, milk as well as sugar. Some may also contain permitted flavouring. Find out more about these ingredients below:

### 1. Live probiotic culture

In the process to produce a cultured milk product, certain strains of lactic acid bacteria or probiotic culture are used to ferment dairy milk. Among the most common types of probiotics used in these products are the *Lactobacillus* and *Bifidobacterium* genera.

However, not all types of bacterial cultures can be used. Only bacterial strains permitted by the Ministry of Health (MOH) can be added into food products. These permitted strains of probiotics have been thoroughly studied and evaluated, and their safety and health benefits have been tested and proven. Apart from that, probiotic strains used can also affect the taste of the end product, thus different cultured milk drinks may taste differently, depending on the strain of live probiotic culture.

It is important to take note that not all cultured milk drinks contain live probiotic culture. Firstly, the production process, storage conditions and type of packaging material used have been identified to influence the viability of probiotics cells during products’ shelf-life. For example, anaerobic bacteria such as *Bifidobacteria*, are not stable in the presence of oxygen, and therefore would be easily destroyed if stored in a packaging material with high oxygen permeability such as plastic bottles. Some cultured milk products on the market do not contain live bacterial cultures, and thus do not deliver any of the health benefits associated with probiotics. Thus, to be sure that you are choosing a genuine cultured milk product containing live probiotics, read the label and look for the word “probiotics” and “live culture”.

Any food products containing “probiotics” are required by law to state these on the label:

- The phrase “live probiotic culture”
- The genus, species and strain of probiotics used in the product
- A clear direction for storage before and after the package is opened

- The quantity of the probiotic culture – it must not be less than  $10^6$  cfu/ml or cfu/g\*

\*CFU stands for colony-forming unit, referring to the number of live and active microorganisms found in the probiotic-containing foods. E.g. a cultured milk drink containing  $10^6$  cfu/ml means there are a million individual probiotic bacteria per 1 ml of the drink.

## 2. Sugar

Besides lactose that is naturally available in milk, cultured milk drinks also contain some added sugar, which plays certain roles in the production of the cultured milk drink products. During the shelf life of the product, the probiotic bacteria consume sugar as their food source and produce lactic acid, which is a type of organic acid.

The presence of lactic acid in the product will exhibit a sour taste. Thus, to balance out the sour taste, sugar is added. The purpose is to improve the taste of the drink and consumers' acceptance of the product. More importantly, sugar also acts as a food source to keep the probiotics alive and sustain their growth in the product during its shelf life.

Although cultured milk drinks contain sugar, they also contain other nutrients and more importantly, probiotics. Drinking cultured milk is not the same as consuming flavoured or soft drinks that only contain sugars and no other nutrients.

It should also be noted that the serving size of cultured milk (80ml) is typically very much smaller compared to other types of beverages, such as juices or soft drinks (330ml). The amount of sugar consumed in one serving of a soft beverage is certainly much higher than that of a cultured milk drink containing probiotics.

Lastly, cultured milk drinks are not likely to cause a big spike in blood sugar levels if taken according to the recommended amount. This is because the acidity of the drinks may help to slow down the absorption of glucose into the bloodstream.

## 3. Milk

Milk is one of the most suitable carriers for probiotics due to its high composition of nutrients. Plus, its relatively low acidity and salt content is perfect for promoting the growth of bacteria strains added for fermentation process.

The bacteria also feed on the naturally occurring sugar (lactose) in milk and break down the milk sugar into lactic acid. In addition, the use of milk or dairy products as the base to carry probiotics help probiotics in tolerating human's gastrointestinal condition better, and this enhances the survivability of probiotics in the gut.

Fermentation using dairy products is also one of the less expensive methods for producing probiotic-containing foods. This process also improves the nutritional values and sensory properties of dairy products.

### For healthier consumption

Generally, cultured milk products are safe to be included as part of a healthy balanced daily diet. Additionally, all probiotic strains permitted to be used in cultured milk products have been evaluated by MOH to ensure their safety and health benefits. For healthier consumption, follow these tips:

- **Choose products with less sugar.**

As mentioned above, some amounts of sugar are added to cultured milk drinks for specific purposes, Nevertheless, excessive consumption of sugar is to be avoided and consumers have been advised to choose products with lower level of sugar. Similarly, cultured milk drinks with lower sugar content are available in the market and you may wish to opt for these.

To do this, refer to the nutrition information panel on the label of each product and compare the amount of sugar per 100 ml and select the one with the lower amount of sugar. In addition, you may also refer to serving size of a product as it provides information on the amount you will be consuming. Hence, you may also compare the amount of sugar in each serving of a product, if the products are of the same serving size. Here's an example if you are comparing the amount of sugar per serving: A Drink A has 6.8 g of sugar per serving of 80 ml, while Drink B has 11.2 g of sugar per serving of 80 ml. Hence, you may want to choose Drink A for its lower sugar content.

Cultured Milk Drink A			Cultured Milk Drink B		
Nutrition		Information	Nutrition		Information
Serving Size: 80ml			Serving Size: 80ml		
	Per serving	Per 100ml		Per serving	Per 100ml
Energy (kcal)	48	60	Energy (kcal)	48	60
Protein (g)	0.9	1.1	Protein (g)	1.0	1.3
Fat (g)	0	0	Fat (g)	0	0
Carbohydrate (g)	9.5	11.9	Carbohydrate (g)	11.2	14.0
-Total sugar (g)	6.8	8.5	-Total sugar (g)	11.2	14.0

- **Consume moderately but regularly**

The key to get the optimal benefit of probiotics is to consume the product in moderation on a regular basis, as proven through clinical research. Probiotic drinks are designed for daily consumption as the live probiotic cultures do not stay in our gut permanently, but are expelled from the body when we have bowel movement. The benefits of probiotic intake only become apparent after regular intake for long term, the duration varies depending on the individual.

### Key takeaways

Last but not least, it is important to understand what cultured milk drinks with probiotics are and their purpose as part of our daily diet. Probiotic-containing cultured milk drinks are a source of beneficial bacteria that can deliver certain health benefits to us when consumed appropriately.

Keep in mind that it is not in a similar category with soft drinks or flavoured beverages that only contain sugar and flavourings. Always read the nutrition labels to make sure that you choose genuine cultured milk drinks with live probiotics and preferably products with less sugar.

Remember that probiotic-containing products are not miracle cures and should always be consumed in moderation. Be wary of any that claim that such products are able to prevent or cure specific diseases or health problems.

*This article is contributed by Probiotics Education Programme (PEP) by NSM and supported by Yakult Malaysia. To obtain more information on the activities of the PEP, visit [www.nutriweb.org.my/probiotics](http://www.nutriweb.org.my/probiotics).*