Should I use Sweeteners?

It is important to eat a healthy, balanced diet that is low in saturated fat, sugar and salt to keep our weight, cholesterol, blood glucose and blood pressure healthy.

Sugar is a type of carbohydrate and because all carbohydrates affect blood glucose levels, reducing sugar intake and using sweeteners as an alternative can help to keep blood glucose levels in target range. As sugar contributes no nutritive value, apart from carbohydrates and calories, it has 'empty calories' and so is not good for overall health.

It is important to note that products labelled 'sugar free' are not necessarily a healthy alternative.

For further information and individual advice, please speak to the paediatric dietitians within the team.



Ormskirk Hospital Wigan Road, Ormskirk, Lancashire, L39 2AZ Telephone: 0151 426 1600



Sweeteners & Type 1 Diabetes

Patient information leaflet for Parents / Guardians

If you need this leaflet in a different language or accessible format please speak to a member of staff who can arrange it for you.

اگر به این بروشور به زبان دیگر یا در قالب دسترسپذیر نیاز دارید، لطفاً با یکی از کارکنان صحبت کنبد تا آن را برای شما تهبه کند.

Jeśli niniejsza ulotka ma być dostępna w innym języku lub formacie, proszę skontaktować się z członkiem personelu, który ją dla Państwa przygotuje.

Dacă aveți nevoie de această broșură într-o altă limbă sau într-un format accesibil, vă rog să discutați cu un membru al personalului să se ocupe de acest lucru pentru dumneavoastră

如果您需要本传单的其他语言版本或无障碍格式,请联系工作人员为您安排。

إذا احتجت إلى هذه النشرة بلغة أخرى، أو بتنسيق يسهل الوصول إليه، يرجى التحدث إلى أحد الموظفين لترتيب ذلك لك.

Author: Hannah Kyprios

Department: Paediatric Diabetes **Document Number:** MWL2875

Version: 001

Review Date: 31/10/2028



Sugar or sucrose, is the most common source of sweetness in the diet.

Artificial sweeteners are low-calorie or calorie-free chemical substances that are used as an alternative to sugar to sweeten foods & drinks.

Sweeteners & Health

All sweeteners in the United Kingdom undergo a rigorous safety assessment before they can be used in food and drink. All approved sweeteners are considered a safe and acceptable alternative to using sugar.

At present, large studies have provided strong evidence that artificial sweeteners are safe for human consumption and there is no evidence to suggest they cause adverse health conditions.

The law determines how much sweetener can be used and in which products to keep our intake of sweeteners within 'Acceptable Daily Limits'. To be cautious,

Acceptable Daily Limits are set at 100 times less than the smallest amount that may cause health concerns, so it is extremely difficult for most people to reach these limits.

However if using sweeteners, it is recommended to use a variety of brands so that an acceptable intake for any one sweetener is not exceeded.



Page 1 Page 6

Cooking Tips

Artificial sweeteners come in granules, tablets or liquid form. Most of them can be used in cold and hot foods, but not all can be used for cooking. Most sweeteners are sweeter than sugar so only a small quantity is needed.

It is recommended to experiment by reducing the sugar added to recipes. Most cakes will work with half the specified sugar. Aspartame (used in Canderel™) loses some sweetness at a high temperature so is better used in cold foods.

Sucralose (used in Splenda[™]), Acesulfame-K (used in Hermesetas Gold sweetener[™]) and Stevia can be used in cooking and baking due to their ability to resist heat.

When baking or cooking with sweeteners, always follow the manufacturer's instructions.

People with diabetes do not need to avoid sugar altogether, but trying to reduce or limit intake of sugar is recommended. Replacing sugar with sweeteners can be beneficial to help manage diabetes, maintain a healthy body weight and prevent tooth decay.

What is a Sweetener?

Sweeteners are ingredients that are added to food to enhance sweetness.

Types of sweeteners

They can be grouped in different ways such as sugar or sugar substitutes. Another way to group sweeteners is whether the sweetener is natural or artificial.

One of the most useful ways of grouping sweeteners is to look at those that have nutritive value (nutritive sweeteners), and those without nutritive value, (non-nutritive sweeteners).

Nutritive sweeteners have a nutritive value. They contain carbohydrate and provide calories. They are usually referred to as 'sugars' or 'added sugar', but can appear on food packaging in the ingredients list as:

- Glucose.
- Dextrose.
- Honey.
- Fructose.
- Sucrose.
- Maltose.
- Syrup.



Page 5 Page 2

Polyols

One sub-group of nutritive sweeteners is polyols, which are sugar alcohols. Some foods contain polyols naturally, such as certain fruits and vegetables. Other polyols are created synthetically.

- Sorbitol (derived from corn syrup).
- Mannitol (derived from seaweed).
- Xylitol.
- Erythritol.
- Isomalt.
- Maltitol.
- Lacitol.

Not all of the carbohydrate from polyols is absorbed, so it is unclear how polyols should be counted by those adjusting their insulin dose according to their carbohydrate intake.

Polyols are often used in products marketed as 'diabetic', which can be as high in fat and calories as standard products, so they are not recommended.

Consuming large amounts of polyols can have a laxative effect, causing bloating, flatulence and diarrhoea.

If polyols added to a food or drink make up more than 10% of a product, the product label must state that excessive consumption may have a laxative effect. Take care not to have too many Polyols.



Non-nutritive sweeteners

'Non-nutritive sweeteners' have no nutritive value, they have little or no calories. As they are used instead of sugar, using non-nutritive sweeteners can be a way of reducing overall calorie and carbohydrate intake. They are found in products such as drinks, ready meals, desserts, cakes, chewing gum and toothpaste.

Non-nutritive sweeteners approved for use in the UK include:

- Saccharin (E954) Brands containing this sweetener are Sweetex[™] and Hermesetas[™] minis.
- Aspartame (E951) Brands containing this sweetener are Candarel[™], Hermesetas[™] granulated and NutraSweet[™].
- Acesulfame-K (E950) Brands containing this sweetener are Hermesetas Gold™, Sweet'N'Low™, Sweetness and Light™.
- Sucralose (E955) A brand containing this sweetener is Splenda [™].
- Stevia (E960) Stevia is naturally derived from the Stevia plant and can leave a bitter aftertaste. Some Stevia based sweeteners are blended with other sweetening ingredients (to offset the aftertaste). These added ingredients may increase blood glucose levels. Brands containing this sweetener include Stevia™ and Truvia™.



Page 3 Page 4