Theme: Childhood Obesity

Childhood obesity is one of the most serious global public health challenges for the 21st century. Obese children and young people are at an increased risk of developing various health problems, and are also more likely to become obese adults.

- Health Survey for England found that today nearly a **third of children** aged 2 to 15 are overweight or obese.
- Obese children are **more likely to be ill**, absent from school due to illness, experience health-related limitations and require more medical care than normal weight children.
- Most common obesity-related **health risks** are: diabetics, eating disorders such as anorexia and bulimia, skin infections, asthma and other respiratory problems.
- Next to lack of physical activity, **unhealthy diet** is one of the most common reasons for developing obesity in young age.
- Children are consuming too many calories - and, in particular, **too much sugar** which is often excessively added to soft drinks.

How can we beat childhood obesity?

We need to find solutions that lead to healthier and more balanced diet. Reducing childhood obesity will not only minimise dangerous health risks but also improve academic behaviour and mental well-being of young people.

There are a myriad of products and apps that help users keep an eye on their diet such as MyFitnessPal app which logs your calorie intake when you scan products you eat. There are also apps that send daily reminders to drink water or tips how to eat healthy.

Questions for brainstorming

- What can encourage young people and their friends to lead healthier lifestyles?
- How can we improve existing solutions (see some examples below) to make them more attractive using the Internet of Things concept?
- How can we ensure that young people have access to healthy meals and snacks?
- What food do you eat? What devices can be connected to help with the growth and production of health food?
- How can you tell if a product is healthy and low in sugar or fat? Is there a way in which we could improve ways of informing young people?
- How can Internet-connected devices help obese patients who want to lose weight?
- Is there a way to encourage young people to be more aware of what they eat?
- Is there a way to educate people about the dangers of developing obesity?

See our design toolkit for guidance on how to come up with new ideas!

Examples

Neo, developed by SKE Labs in Canada, is a smart food container. Using Bluetooth connectivity and sensors Neo tracks what is inside it and what it means for your health. It can connect to your fitness device to give you a better picture of your lifestyle focusing on how many calories you consume and burn. Neo is also a friendly jar that can suggest what you can cook based on ingredients you have providing you with full recipes and instructions - and it proportionally add amounts if you want to cook for your friends!

Lastly, Neo will notify you when you are running out of content and can order it online for you! That way you will never run out of your healthy granola!

See more details at www.skelabs.com

Hannah was created back in 2013, when Ikea invited university students to answer the questions: What will life around food look like in 2025? And will we be able to help people live a healthier, more sustainable lifestyle?

One student came up with an idea called Hannah - a smart mirror that addresses education about healthy food. As a person stands in front of the Hannah mirror their digestive system is projected on the reflection of their body. That way young people can learn about their body type, the digestive process food that goes through in the body and the effects of different types of food.

Additionally, the smart mirror is also a game that encourages young people to exercise. It's possible through the use of movement sensors - just like Wii but much more realistic!

See more details at www.conceptkitchen2025.com

Other information

Here are some additional resources that might help to explore this theme:

- [Healthy Schools resources](#)
- [Concept Kitchen 2025](#) (full of innovative ideas relating to food)
- [Change 4 Life](#)
- [Open Data in NHS](#)
- [Public Health England](#)