

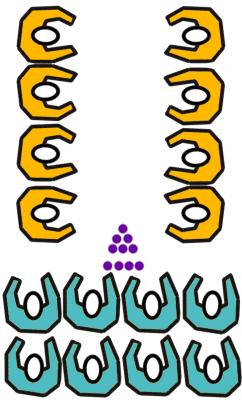
Activity 4: Small intestine



In the Live Lesson, we will be demonstrating how nutrients are absorbed in the small intestine – and showing how the villi increase surface area and so help with nutrient absorption. After the Live Lesson you may wish to replicate this activity in the classroom or a larger area such as the school hall or playground.

What you will need:

- Plastic balls similar to those found in ball pools
- Large nets or shopping bags



The 'intestine' group tries to catch the balls - firstly with their hands, then with the nets/shopping bags.

The 'nutrients' group throws the balls towards the other group.

Form two groups as above or in a larger area you could involve the whole class. The 'nutrients' group holds the balls – these are the nutrients. The 'intestine' group represent the walls of the small intestine – as the balls are thrown towards them, they attempt to catch them – firstly with their hands and then with the nets/bags.

When the 'intestine' group uses their hands only, they can't catch many balls, so similarly if it's just the walls of an intestine then not many nutrients can be absorbed. However, when they use the nets/bags these represent the villi, which increase the surface area of the intestinal wall and many more balls can be caught/nutrients absorbed.