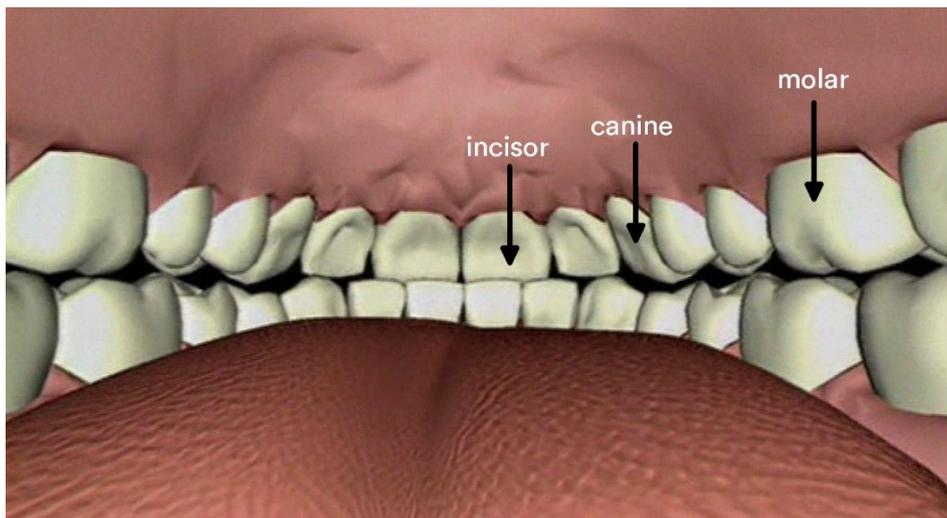


The mouth

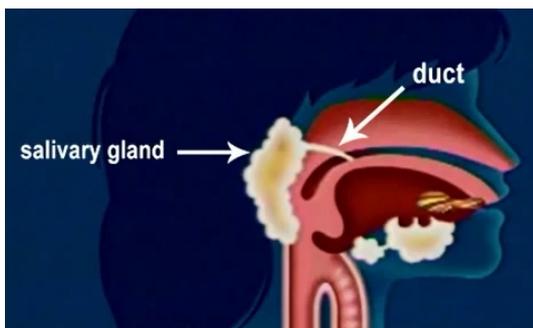
TEETH

Digestion starts in the mouth where teeth break up food into small pieces. The **incisors** cut, the **canines** tear and the **molars** crush food. This mechanical transformation is called **mastication**.



SALIVA

The **salivary glands** are also found in the mouth. They secrete **saliva**.

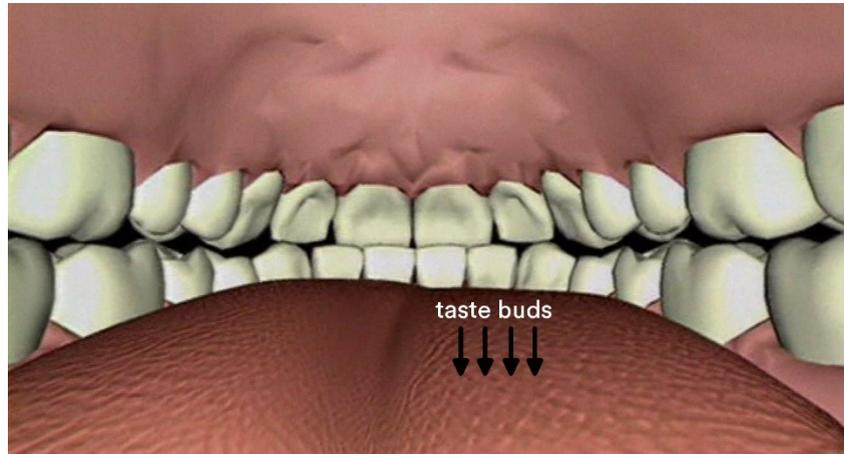


Saliva moistens food, making it easier to break up. This process is called **insalivation**. Once transformed, the food is referred to as a **bolus of food**. Saliva contains enzymes that start the chemical digestion process. Salivary amylase, for example, breaks down certain **complex carbohydrates**, such as starch and glycogen.



THE TONGUE

Taste buds help us determine how food tastes. Taste buds are the small bumps on the tongue.



Since taste buds are only sensitive to substances that have been dissolved, saliva plays an important role in the perception of taste. Food must be soaked with saliva for us to sense what it tastes like. The **tongue** is a very powerful muscle that propels the bolus of food towards the back of the mouth so it can be swallowed.

THE MOUTH IN DIGESTIX

In DIGESTIX, the teeth and salivary glands are game pieces associated with the mouth. For digestion to be effective, these pieces must be placed at the upstream of the digestive tract. This allows the teeth to break food down into several fragments, and saliva to start the chemical digestion process.

When playing DIGESTIX, one of the first things you need to realise is that the game pieces only transform certain targets. Quite intuitively, the teeth transform food into fragments.

What about the salivary glands? They can also transform food into fragments, but they are not as efficient as the teeth in doing so.

However, they are also capable of transforming food fragments into nutrients. You perhaps remember that salivary amylase breaks down certain complex carbohydrates. So to sum up, salivary glands have three targets – food, fragments, and carbohydrates.

The mouth

Which of the following is not a tooth?

- An incisor
- A molar
- A slicer

Which teeth cut up food?

- Incisors
- Molars
- Canines

Which teeth grind food?

- Incisors
- Molars
- Canines

What do canine teeth do?

- Tear food apart
- Grind food
- Slice food

Which of the following helps teeth chew?

- The abdomen
- Saliva
- Lips

What secretes saliva?

- The tongue
- The salivary glands
- The gall bladder

What do we call food being digested?

- The bolus
- The bolster
- The booster

What enables us to taste food?

- Taste buds
- Taste glands
- Taste enzymes

Where are taste buds found?

- On the tongue
- On the glottis
- In the trachea

Taste buds look like small bumps.

- True
- False

Answers

Which of the following is not a tooth?

- An incisor**
Wrong! An incisor is a tooth.
- A molar**
Wrong! A molar is a tooth.
- A slicer**
Well done! A slicer is not a tooth.

Which teeth cut up food?

- Incisors**
Well done! That's right.
- Molars**
Wrong! Try again!
- Canines**
Wrong! Try again!

Which teeth grind food?

- Incisors**
Wrong! Try again!
- Molars**
Well done! That's right.
- Canines**
Wrong! Try again!

What do canine teeth do?

- Tear food apart**
Well done! That's right.
- Grind food**
Wrong! Try again!
- Slice food**
Wrong! Try again!

Which of the following helps teeth chew?

- The abdomen**
Wrong! That's not the right answer.
- Saliva**
Well done! Your saliva moistens food, making it easier to break apart.
- Lips**
Wrong! Try again!

What secretes saliva?

- The tongue**
Wrong! Try again!
- The salivary glands**
Well done! That's right.
- The gall bladder**
Wrong! The gall bladder comes into play later on in the digestion process.

What do we call food being digested?

- The bolus**
Well done! That's right.
- The bolster**
Wrong! Try again!
- The booster**
Wrong! Nice try, though.

What enables us to taste food?

- Taste buds**
Well done! That's right.
- Taste glands**
Wrong! That is not the right answer.
- Taste enzymes**
Wrong! Try again!

Where are taste buds found?

- On the tongue**
Well done! Your tongue is covered with taste buds.
- On the glottis**
Wrong! That's not the right answer.
- In the trachea**
Wrong! Try again!

Taste buds look like small bumps.

- True**
Well done! That's right.
- False**
Wrong! That's not the right answer.