COLEGIO AGUSTINIANO NORTE
CIENCIAS NATURALES Y EDUCACIÓN AMBIENTAL
ACTIVIDAD EVALUATIVA - SEGUNDO PERIODO
GRADO QUINTO

THE DIGESTIVE SYSTEM, ORGANS AND THEIR FUNCTIONS

1. Watch the video "How your digestive system works?:

2. and write the words in the order you hear them. Then, complete the reading, taking into account the vocabulary – The Digestive System.

Across the whole planet, humans eat on average between one and 2.7 kilograms of food a day. That's over 365 kilograms a year per person, and more than 28,800 kilograms over the course of a lifetime. And every last scrap makes its way through the **digestive system**. Comprised of ten organs covering nine meters, and containing over 20 specialized cell types, this is one of the most diverse and complicated systems in the human body.

Its parts continuously work in unison to fulfill a singular task: transforming the raw materials of your food into the _____ and _____ that keep you alive. Spanning the entire length of your torso, the digestive system has four main components.

First, there's the _____, a twisting channel that transports your food and has an internal surface area of between 30 and 40 square meters, enough to cover half a badminton court.

Second, there's the _____, _____, and _____, a trio of organs that break down food using an array of special juices.

Third, the body's enzymes, hormones, nerves, and blood all work together to break down food, modulate the digestive process, and deliver its final products.

Finally, there's the _____, a large stretch of tissue that supports and positions all your digestive organs in the abdomen, enabling them to do their jobs.

The digestive process begins before food even hits your tongue. Anticipating a tasty morsel, glands in your _____ start to pump out saliva. We produce about 1.5 liters of this liquid each day. Once inside your mouth, chewing combines with the sloshing saliva to turn food into a moist lump called the _____.

Enzymes present in the saliva break down any starch. Then, your food finds itself at the rim of a 25-centimeter-long tube called the _____, down which it must plunge to reach the _____.

Nerves in the surrounding esophageal tissue sense the bolus's presence and trigger _____, a series of defined muscular contractions. That propels the food into the stomach, where it's left at the mercy of the muscular stomach walls, which bound the bolus, breaking it into chunks. Hormones, secreted by cells in the lining, trigger the release of acids and enzyme-rich juices from the stomach wall that start to dissolve the food and break down its proteins. These hormones also alert the pancreas, liver, and gallbladder to produce digestive juices and transfer bile, a yellowish-green liquid that digests fat, in preparation for the next stage. After three hours inside the stomach, the once shapely bolus is now a frothy liquid called _____, and it's ready to move into the _____

The liver sends bile to the gallbladder, which secretes it into the first portion of the small intestine called the duodenum. Here, it dissolves the fats floating in the slurry of chyme so they can be easily digested by the pancreatic and intestinal juices that have leached onto the scene.

These enzyme-rich juices break the fat molecules down into fatty acids and glycerol for easier absorption into the body. The enzymes also carry out the final desconstruction of proteins into amino acids and carbohydrates into glucose. This happens in the small intestine's lower regions, the jejunum and ileum, which are coated in millions of tiny projections called villi.

These create a huge surface area to maximize molecule absorption and transference into the blood stream. The blood takes them on the final leg of their journey to feed the body's organs and tissues. But it's not over quite yet. Leftover fiber, water, and dead cells sloughed off during digestion make it into the _____, also known as the _____. The body drains out most of the remaining fluid through the intestinal wall. What's left is a soft mass called stool. The colon squeezes this byproduct into a pouch called the _____, where nerves sense it expanding and tell the body when it's time to expel the waste. The byproducts of digestion exit through the _____ and the food's long journey, typically lasting between 30 and 40 hours, is finally complete.

Taken from: https://www.youtube.com/watch?v=Og5xAdC8EUI (4:56 minutes)