Lec.8 Oral Physiology Dr. Muna

**Physiology of oral cavity and digestive process:**

The digestive processes are both mechanical and chemical process.

**In the mechanical digestion** of the food it is started in the mouth, the teeth are breakdown of food into smaller particles by tearing, grinding and chewing the food and lubricate it with the saliva.

The tongue manipulates the food during chewing and swallowing it that moves the food from the mouth into the pharynx then through the esophagus and then to stomach.

**In the chemical digestion** the enzymes assist in breaking the food down into their simplest form.

The mouth chiefly concerned the grinding the food into smaller pieces and lubricate it so it will have small passage into the lower part of the Gastro-Intestinal tract. So, the oral part of the digestive process and the first stage of the swallowing take place on the oral cavity.

These processes are achieved by groups of organs and structures act together: **saliva** which produced by salivary glands, **tongue**, **muscles of mastication, lips, teeth, muscles of the soft palate and pharynx.**

**Saliva:**

Saliva is a fluid produced by three major salivary glands and many minor salivary glands distributed in the lips, check and buccal mucosa keep the mucous membrane of the mouth moist and beginning the chemical break down of the food. Human saliva contains about 99.5% water and 0.5% substances. Saliva is secreted in response to the sight, thought, taste, or smell food.

**Salivary glands:**

They are the accessory organ secret the saliva. These glands have their terminal ducts located inside the mouth.



There are **three pairs of major salivary glands:**

1. **a. Parotid gland:** it located under and in front of the ears between the skin and the masseter muscle one right and other left. The parotid gland's opening is on the buccal mucosa (inside cheek) beside the upper second molar, that secretes saliva into oral cavity and vestibule.
2. **b. Submandibular gland:** it found beneath the lower jaw in the posterior part of the floor of the mouth. They are two one right and other left. The submandibular gland's opening is in the floor of the mouth beside the frenulum of tongue.
3. **c. Sublingual gland:** it found in the anterior part of the floor of the mouth beneath the tongue its duct opens into the floor of the mouth near the midline. They are two one right and other left.

