How do we speak?

In all languages, we speak with air from lungs. We draw it into lungs quickly and we released it slowly and then interfere with its passage in various ways and at various places. (see figure 1 in your textbook).

- Organs or articulators of Speech

Articulations(organs of speech) may be divided into two main types: active and passive articulators. The active articulators are the lower lip and the tongue. The active articulator does all or most of the movement when a speech sound is made. The passive articulator is the articulator that remains stationary in the production of a speech sound.

Organs of speech

1- The vocal cords: They are two small bands of elastic tissue situated in the larynx, .lying opposite each other across the air passage.

When the vocal cords are brought together tightly no air can pass through them and the air coming from the lungs is compressed behind them. If the vocal cords are opened suddenly, the compressed air bursts out and it makes the vocal cords vibrate. This process results in voiced sounds. When the vocal cords are drawn apart, the air can pass through them freely and they do not vibrate. This results in voiceless sounds. The opening (the gap) between the vocal cords is called the glottis.

glottal stop: The holding back of the compressed air followed by a sudden release.

The height of the note depends on the speed of the opening and closing of the vocal cords. If they opened and closed very quickly, the note will be high. If they opened and closed slowly, the note will be low.

-Speech sounds can be classified into two types in terms of voicing voiced and voiceless sounds.

When you feel the vibration of the vocal cords, the sound is called voice. When you the vocal cords do not vibrate, the speech sound is called voiceless sound.

- **2- The pharynx**: It is above the larynx it is the space behind the tongue and reaching up towards the nasal cavity.
- **3-The palate:** It forms the roof of the mouth and separates the mouth cavity from the nose(nasal) cavity.

The palate consists of three parts the hard palate, and the soft palate and the alveolar ridge.(see fig 5 in textbook)

The hard part of the palate is immovable and fixed in position and it is the highest part of the palate. It lies between the alveolar ridge and the beginning of the soft palate.

The alveolar ridge is that part of the gums immediately behind the upper front teeth and the hard palate. The sound produced with the tongue touching the alveolar ridge are called alveolar such as /t/, /d/, /n/, /l/, /s/ and /z/. The alveolar ridge is important in English because many of the consonant sounds are made with the tongue touching or close to the alveolar ridge

The soft palate (the vellum) is a movable part of the palate. It can be raised and lowered. When the soft palate is raised it closes the nasal cavity and all the air is forced to escape through the mouth .When it is lowered, the nasal cavity is opened, and all the air can pass through

both the mouth and the nasal cavity. The soft palate (the vellum) is a movable part of the palate. It can be raised and lowered. When the soft palate is raised it closes the nasal cavity and all the air is forced to escape through the mouth .When it is lowered, the nasal cavity is opened, and all the air can pass through both the mouth and the nasal cavity. Accordingly, the sounds produced are called nasal such as /m/, /n/ and /n/. The back of the tongue can touch the soft palate and the sounds produced are called velar consonants such as /k/, /g /and/n/.

The teeth: They consist of upper and lower teeth. The two upper front teeth are used to some extent in production of some speech sounds. Sounds produced with the tongue touching the front teeth are called dental such as $/\Theta$ / and / δ /. The lower front teeth are not important in speech ,but when missing the sound /s/and /z/ will be difficult to make.