

## VETERINARY NOTES.

### ORGANS OF RESPIRATION.

The horse breathes only through the nostrils. These organs are, first, nasal openings; second, nasal chambers and sinuses; third, pharynx; fourth, larynx; fifth, trachea; sixth bronchi, seventh, bronchial tubes; eighth, the lungs. There are two nasal openings, the right and left, and are divided by the nasal peak, to which is attached the nasal cartilage. External is the skin, internal to it are the muscles. The internal part of the chamber is covered with a fine thin covering. Superior to the inferior commissure is the fallos nostril; the small opening inside of the nostril is the clivus nasal. The nasal chambers are separated by the cartilaginous septum nasal. It separates the right from the left chamber. In each nasal chamber we have two bones, called turbinate bones, which divide the nasal chambers into three parts; so the chambers are not one continuous chamber. Each chamber is lined with mucous membrane (in fact all open chambers are lined with mucous membrane); this is called schneiderian or pituitary membrane; it is continuous with the skin, and also with that of the several sinuses. The sinuses of the head are the frontal, superior maxillary, ethmoid and sphenoid. They are perhaps, for two purposes—to lighten the head and protect the lungs. The larynx is a musculo cartilaginous box, held in its place by muscles, bones and trachea. The cartilages of the larynx are cricoid, thyroid, epiglottis, two arytenoid and two cuneiform. The cricoid surrounds the trachea; the thyroid is shieldlike; it is called Adam's apple, the epiglottis or pot-lid; the arytenoid is ewer shaped; the cuneiform are false vocal cords internal to the larynx.

The muscles of the larynx regulate the passage of air into the lungs. The glottal opening is in the centre of the larynx. The mucous membrane of the larynx is extremely sensitive. The larynx is well supplied with nerves, superior and inferior laryngeal. The trachea is composed of a number of incomplete rings which are attached by ligamentous attachment; the mucous membrane of the trachea is not so sensitive as that of the larynx. The trachea terminates in the right and left bronchi.

Catarrh means a running or discharge from the mucous membrane of the nose and the sinuses of the same; it consists of inflammation of the mucous membrane of the nose, preceded by congestion. Slight congestion takes place, a peculiar dryness and irritation which gives way to a discharge of a watery nature, becomes white and then yellow, varying according to the severity of the case.