

# **Pituitary Gland**

## **Anatomy Practical**

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**Anatomy Department**

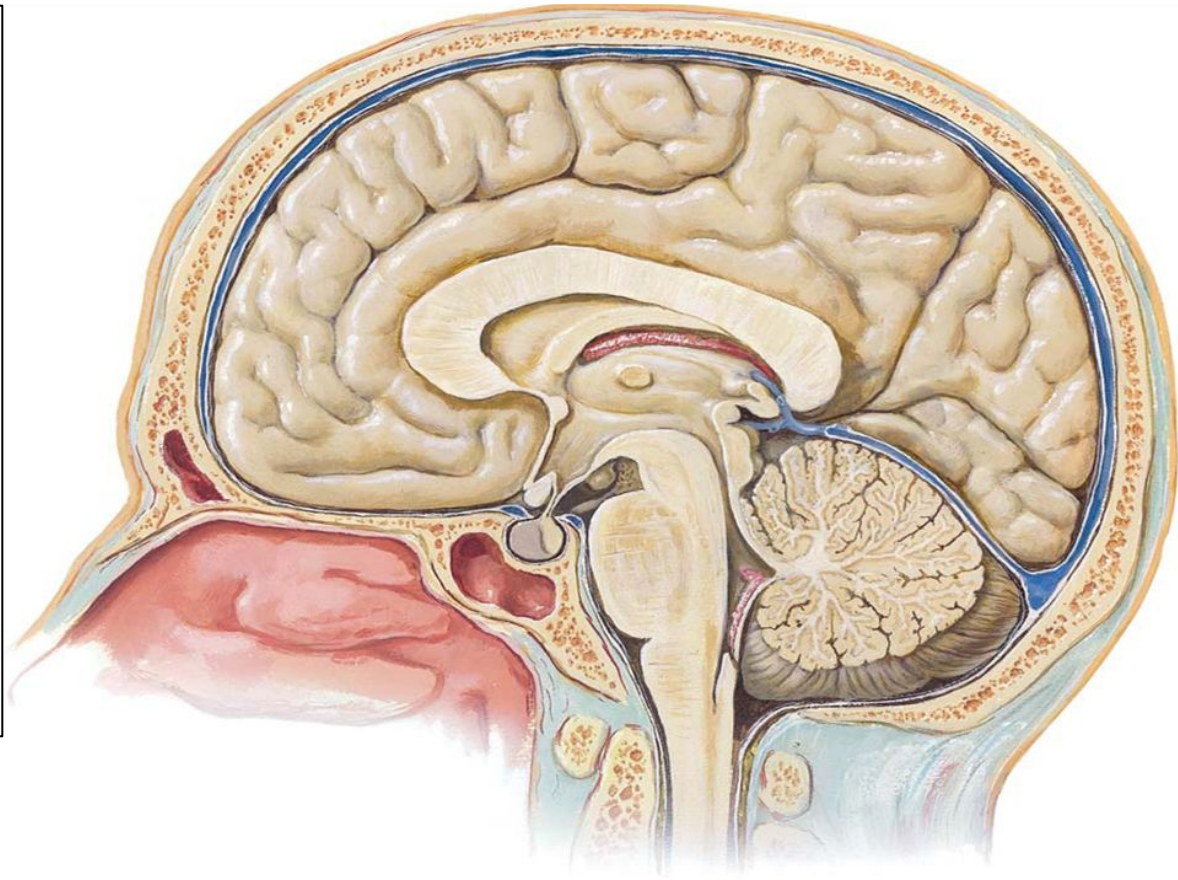
**College of Medicine**

**King Saud University**

# Pituitary Gland

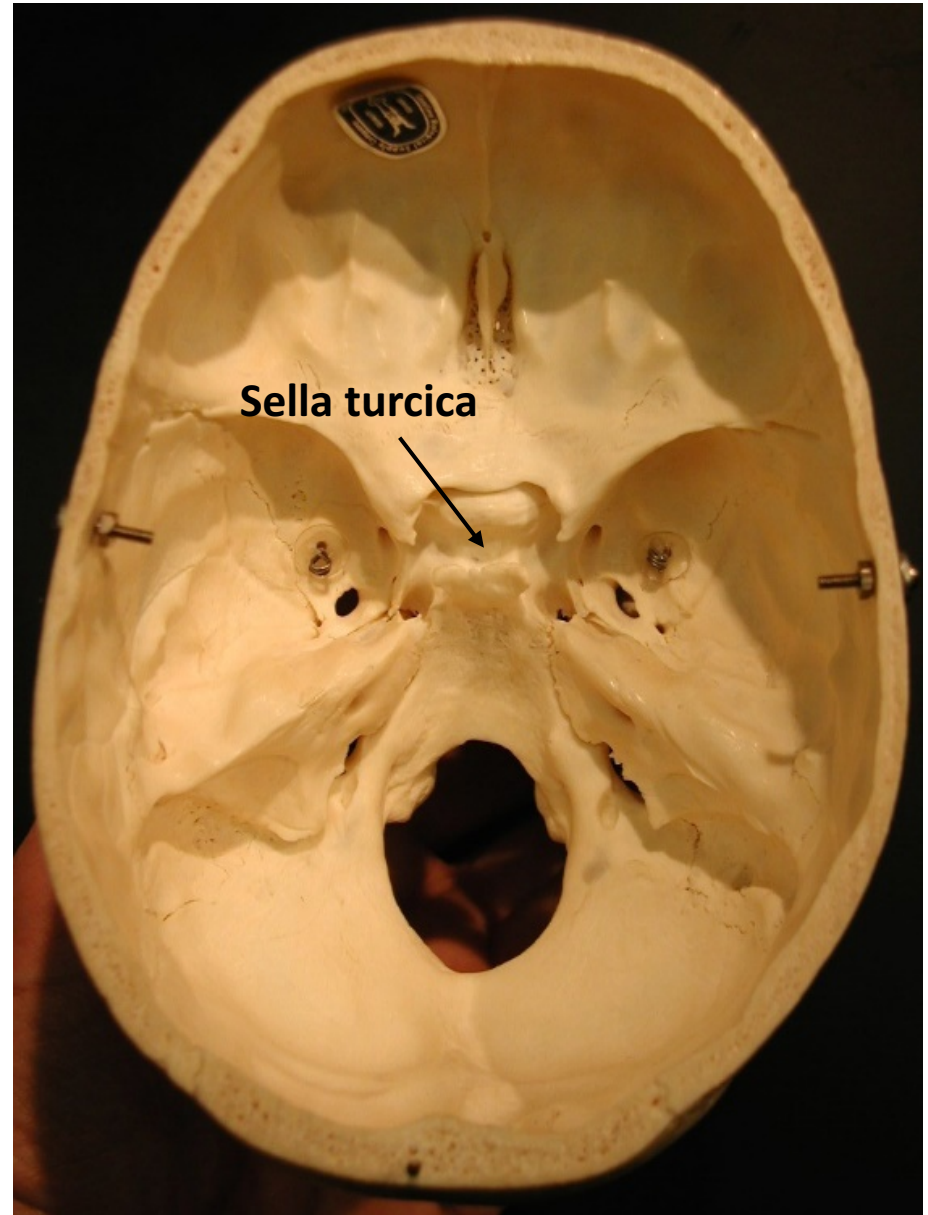
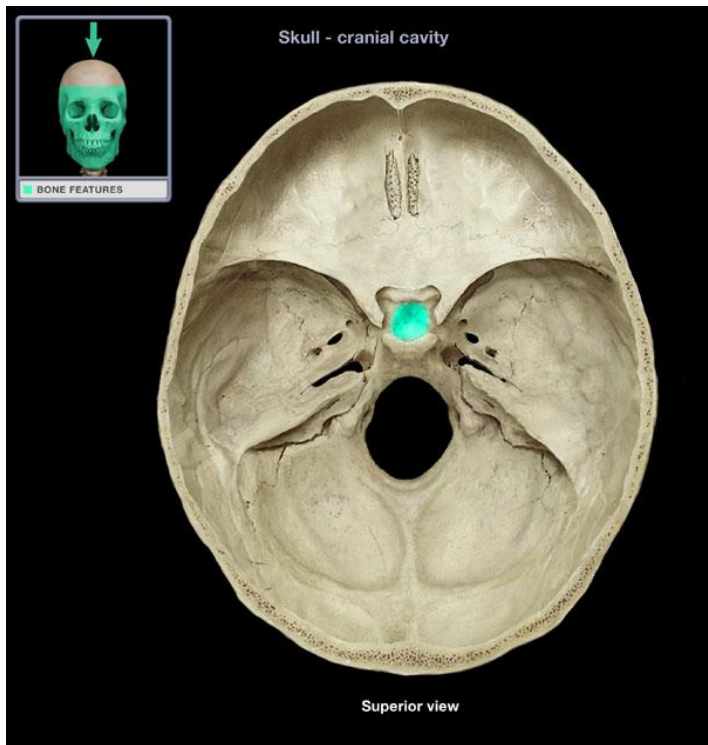
## Definition

Pituitary gland or **hypophysis cerebri** is a small oval structure attached to the undersurface of the brain by the **infundibulum**. It is called the **master** endocrine gland.

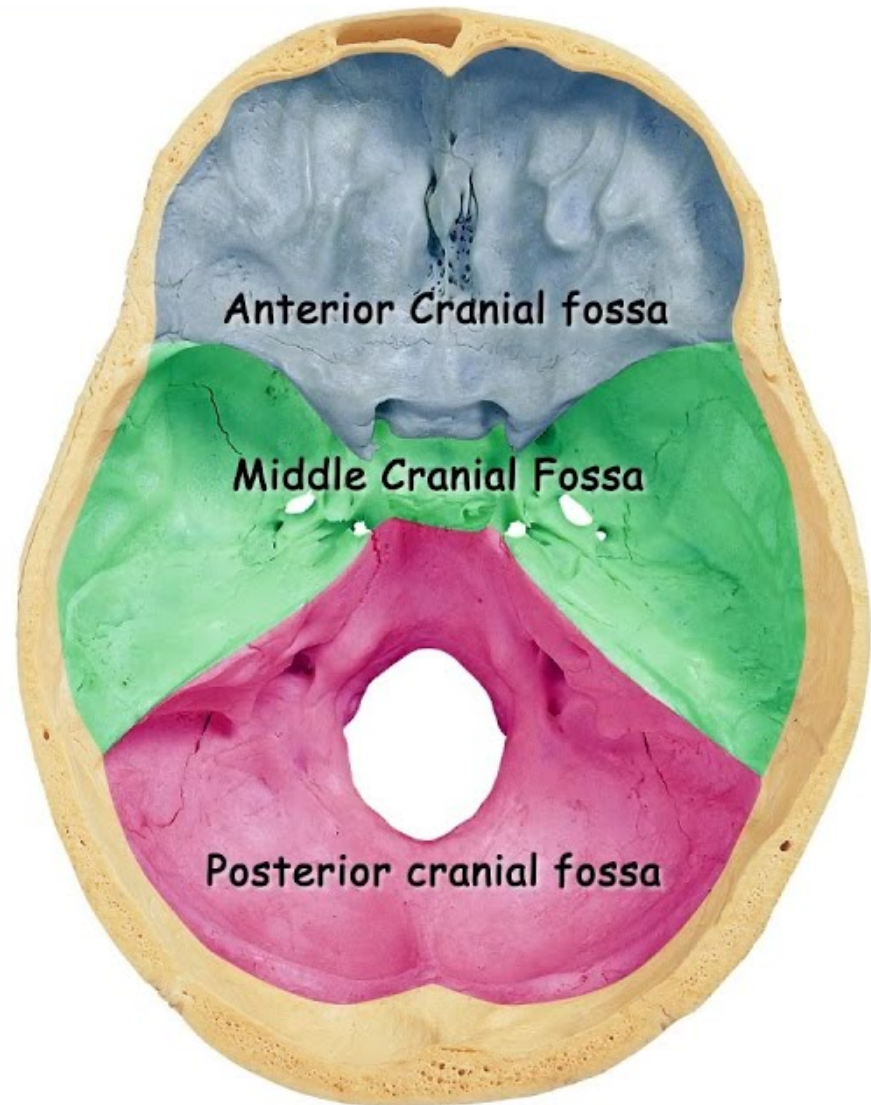


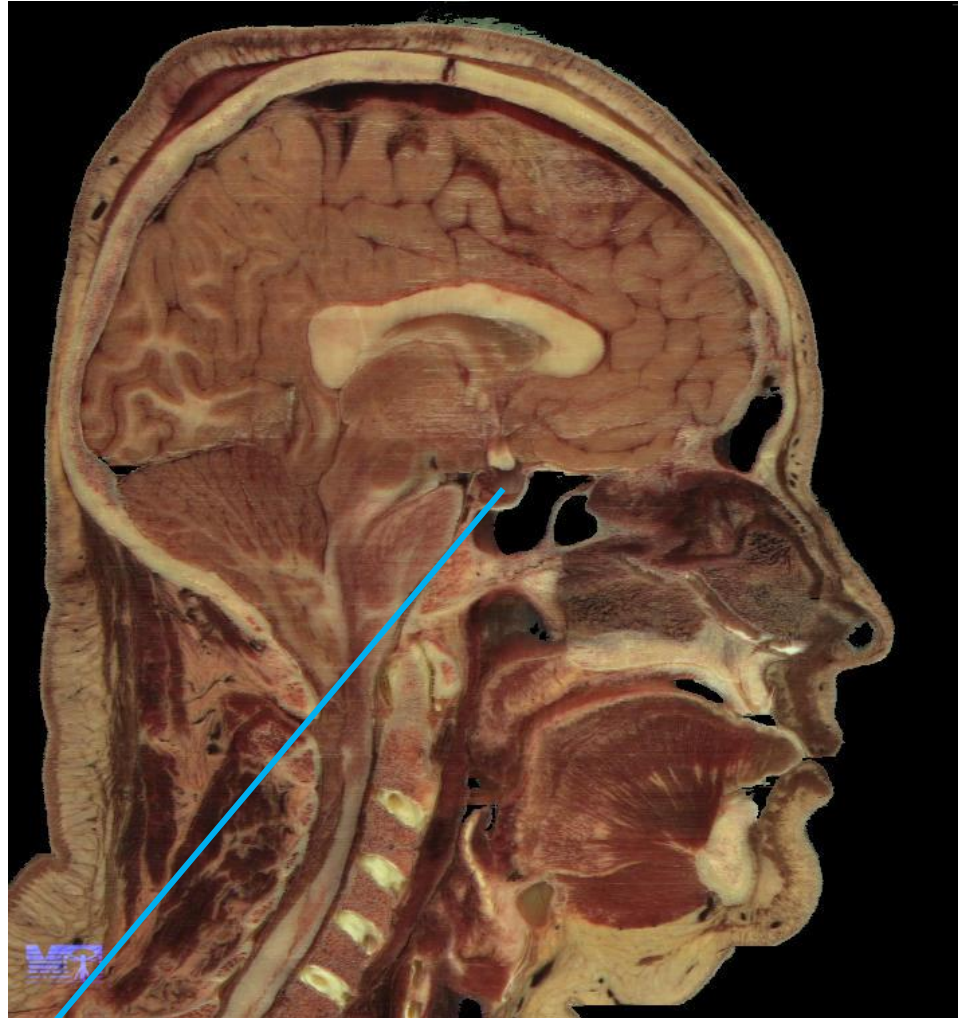
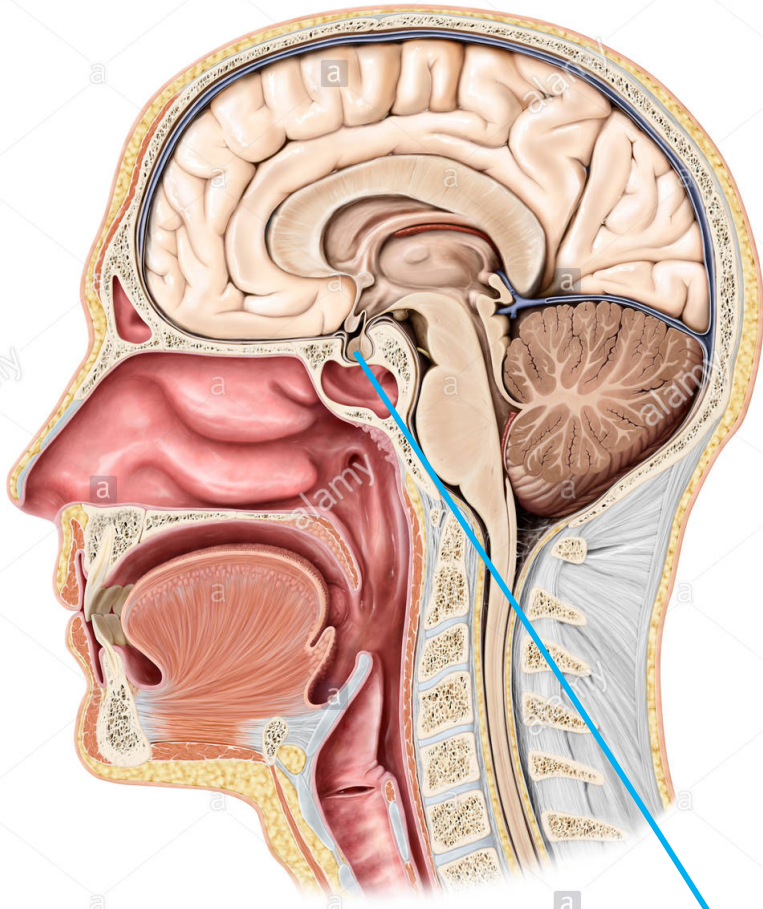
# Location:

In the **sella turcica** (**hypophyseal fossa**) of the body of sphenoid bone.



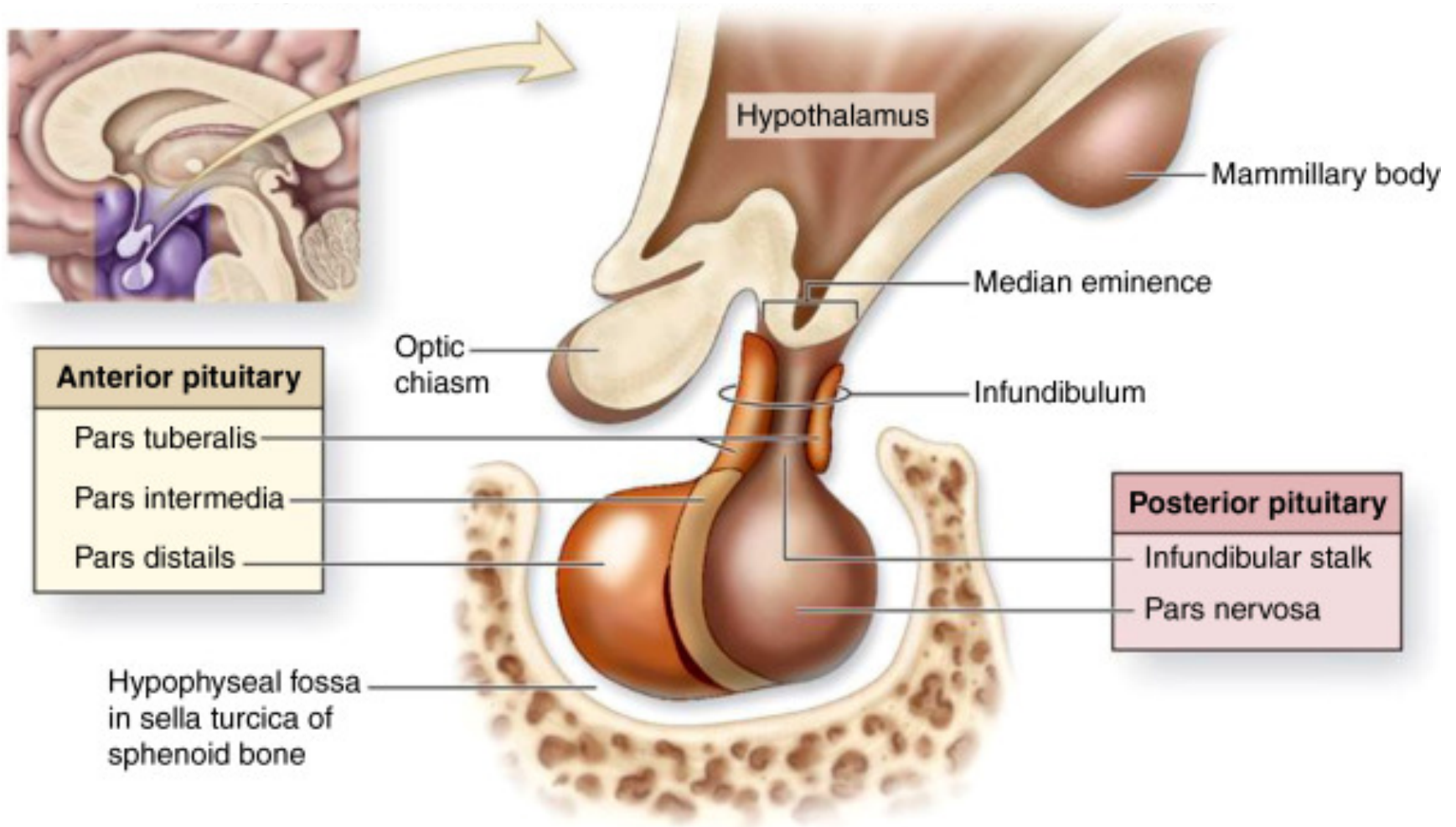
The sella turcica is found in the **middle** cranial fossa of the skull.



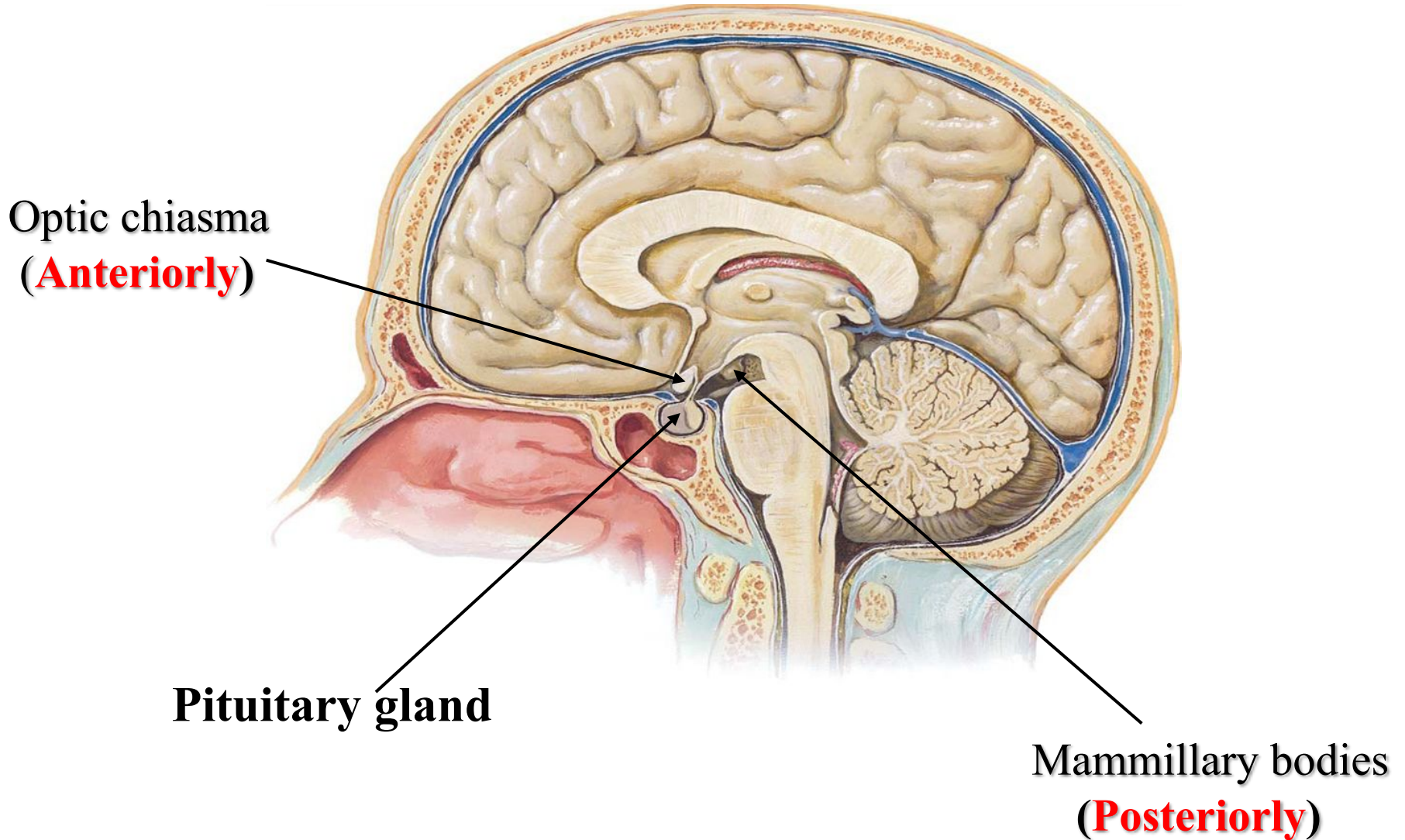


**Pituitary gland**

# SUBDIVISIONS OF PITUITARY GLAND

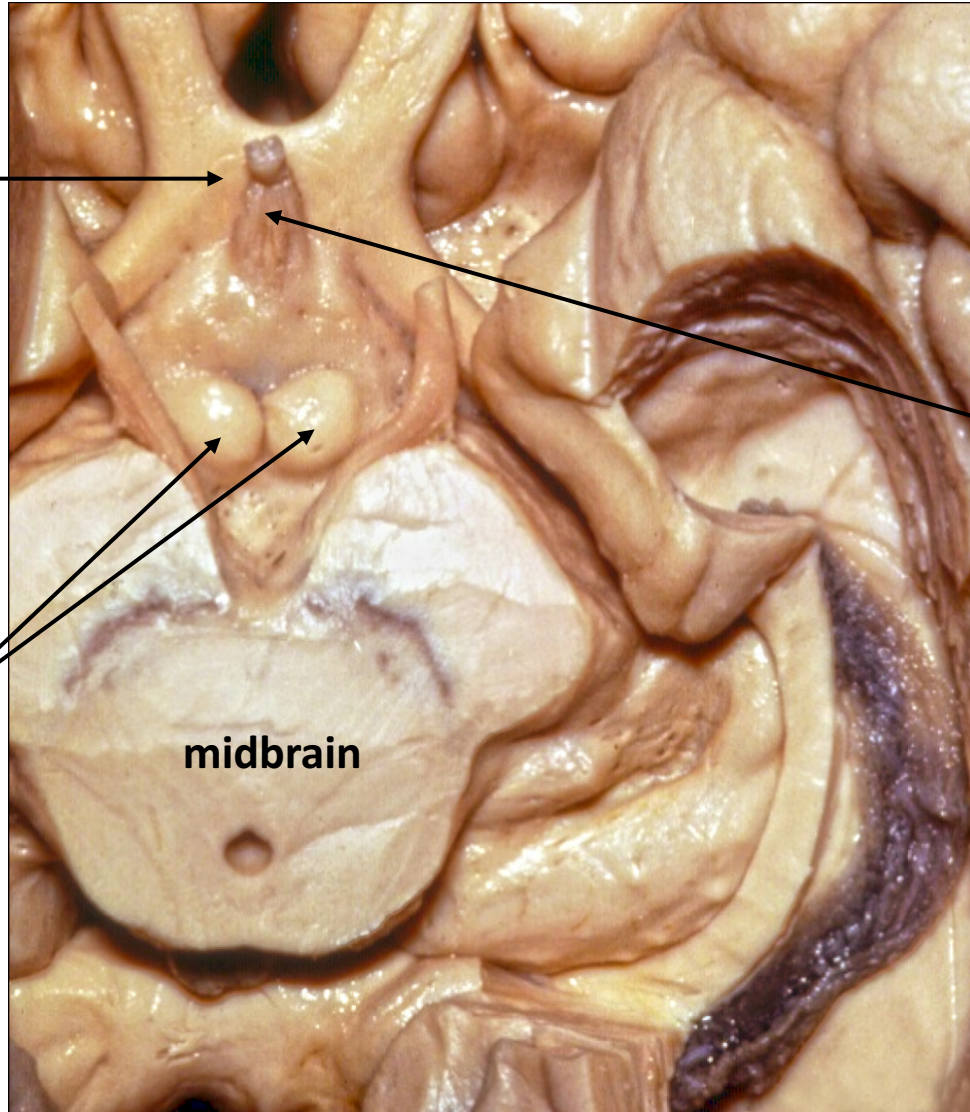


# Relations of Pituitary Gland



# Relations of Pituitary Gland

Optic chiasma  
(**Anteriorly**)



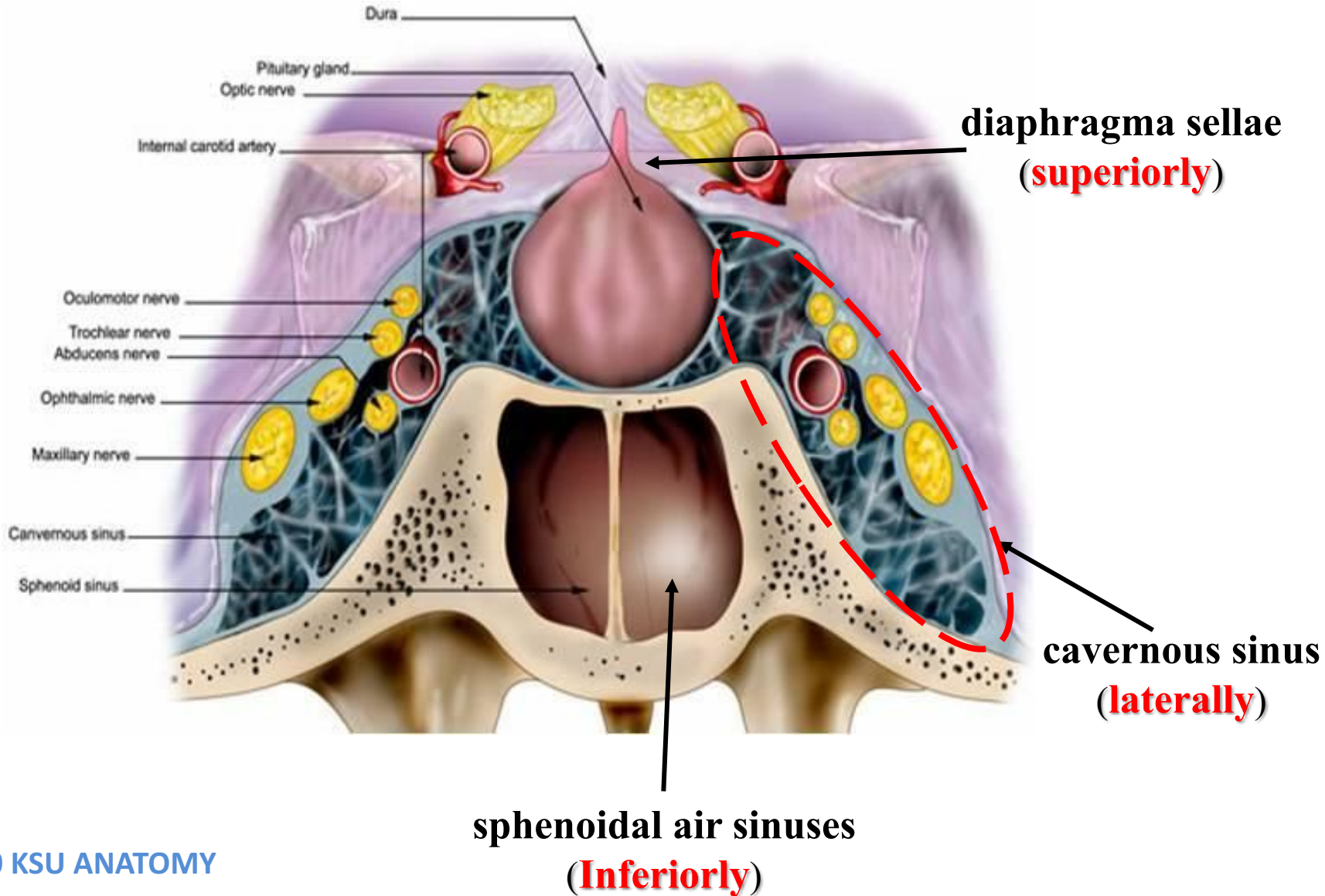
Infundibulum  
(pituitary stalk)

Mammillary bodies  
(**Posteriorly**)

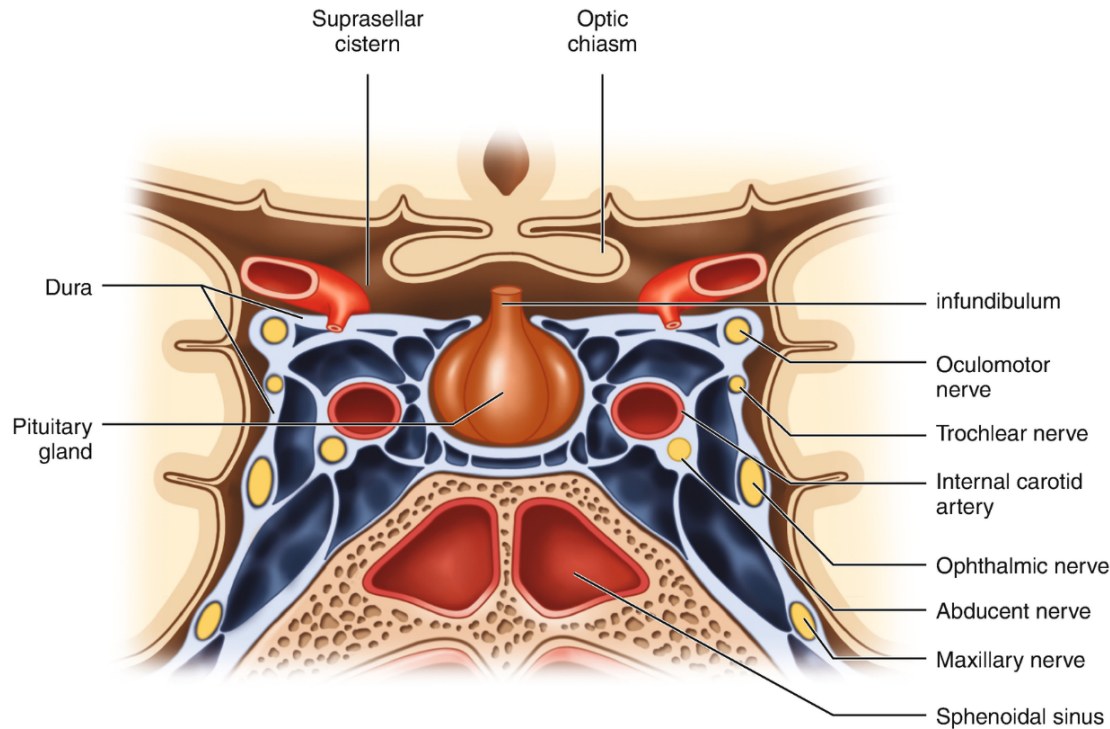
midbrain



# Relations of Pituitary Gland



# Relations of Pituitary Gland



- The cavernous sinus is a **dural venous sinus**. its walls are made of **dura**, and it is lined by endothelium.
- The sinuses are situated on **each** side of the body of sphenoid.
- The internal carotid artery and abducent nerve pass **through** the sinus, while the 3<sup>rd</sup>, 4<sup>th</sup>, ophthalmic and maxillary nerves run in the **lateral** wall of the sinus.

# Relations of Pituitary Gland

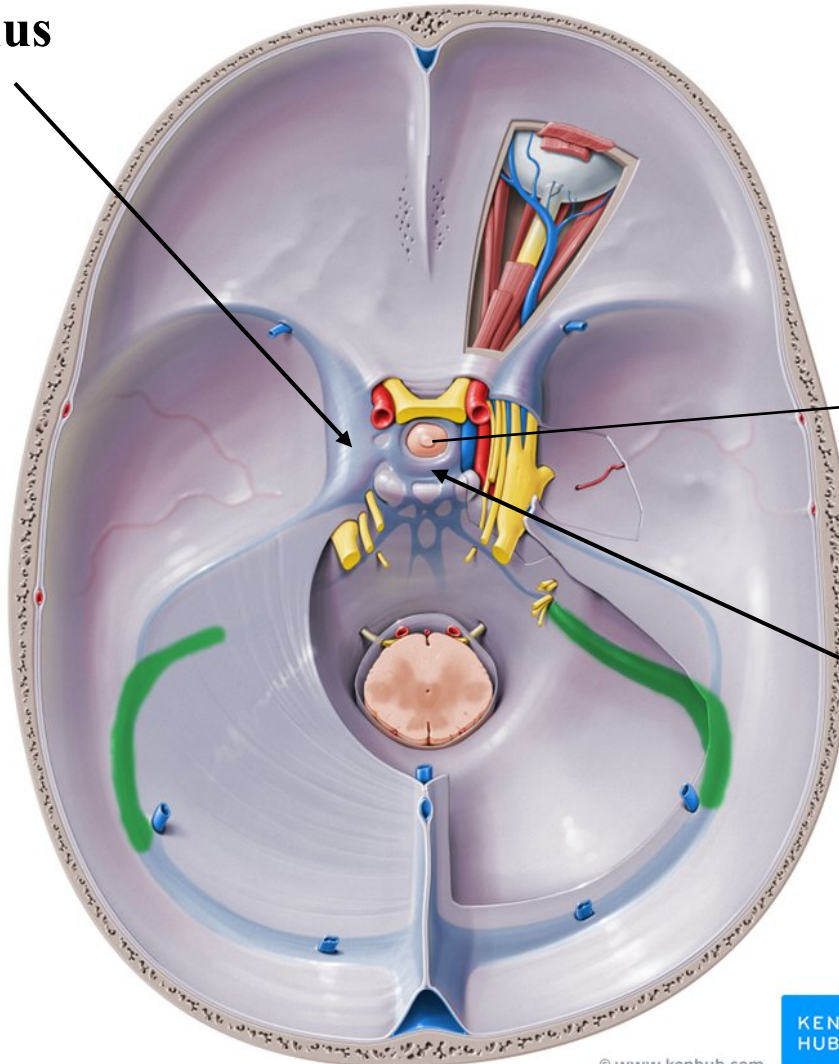
cavernous sinus  
(laterally)

## N.B. :

In this diagram, the right cavernous sinus is open, while left sinus is closed.

### Diaphragma sellae:

Is a fold of dura mater covers the pituitary gland & has an opening for passage of infundibulum (pituitary stalk), that connects the gland to the hypothalamus.



Infundibulum  
(pituitary stalk)

diaphragma sellae  
(superiorly)

# Relations of Pituitary Gland

diaphragma sellae

Right cavernous sinus (open)

Left cavernous sinus (closed)



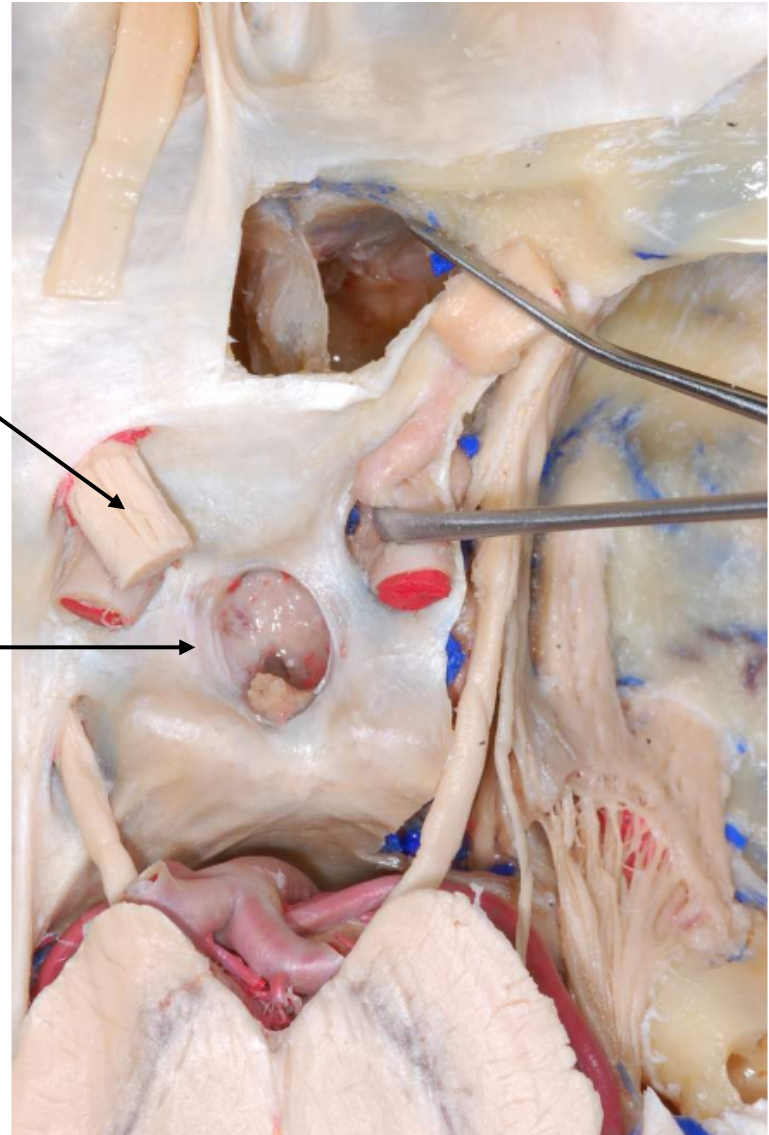
## **N.B.:**

The picture showing cranial cavity, with pituitary gland in the sella turcica, covered by diaphragma sellae.

# Relations of Pituitary Gland

**Optic nerve**  
(entering optic canal)

**diaphragma sellae**  
(**superiorly**)



## Relations of pituitary

### **Posteriorly:**

dorsum sellae, basilar artery, pons and mammillary bodies

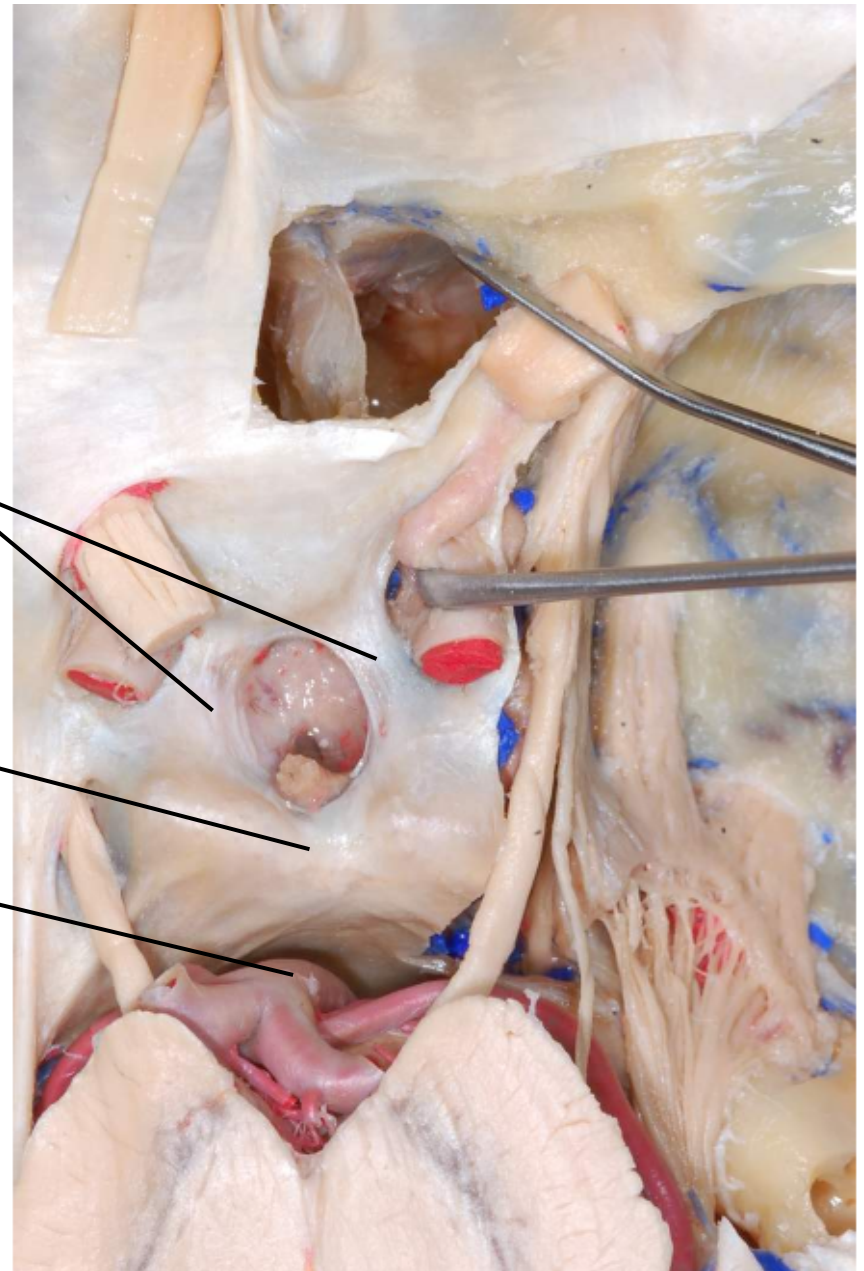
### **Superiorly:**

Diaphragma sellae

Diaphragma sellae

Dorsum sellae

Basilar artery



# Relations of Pituitary Gland

**mb:** midbrain

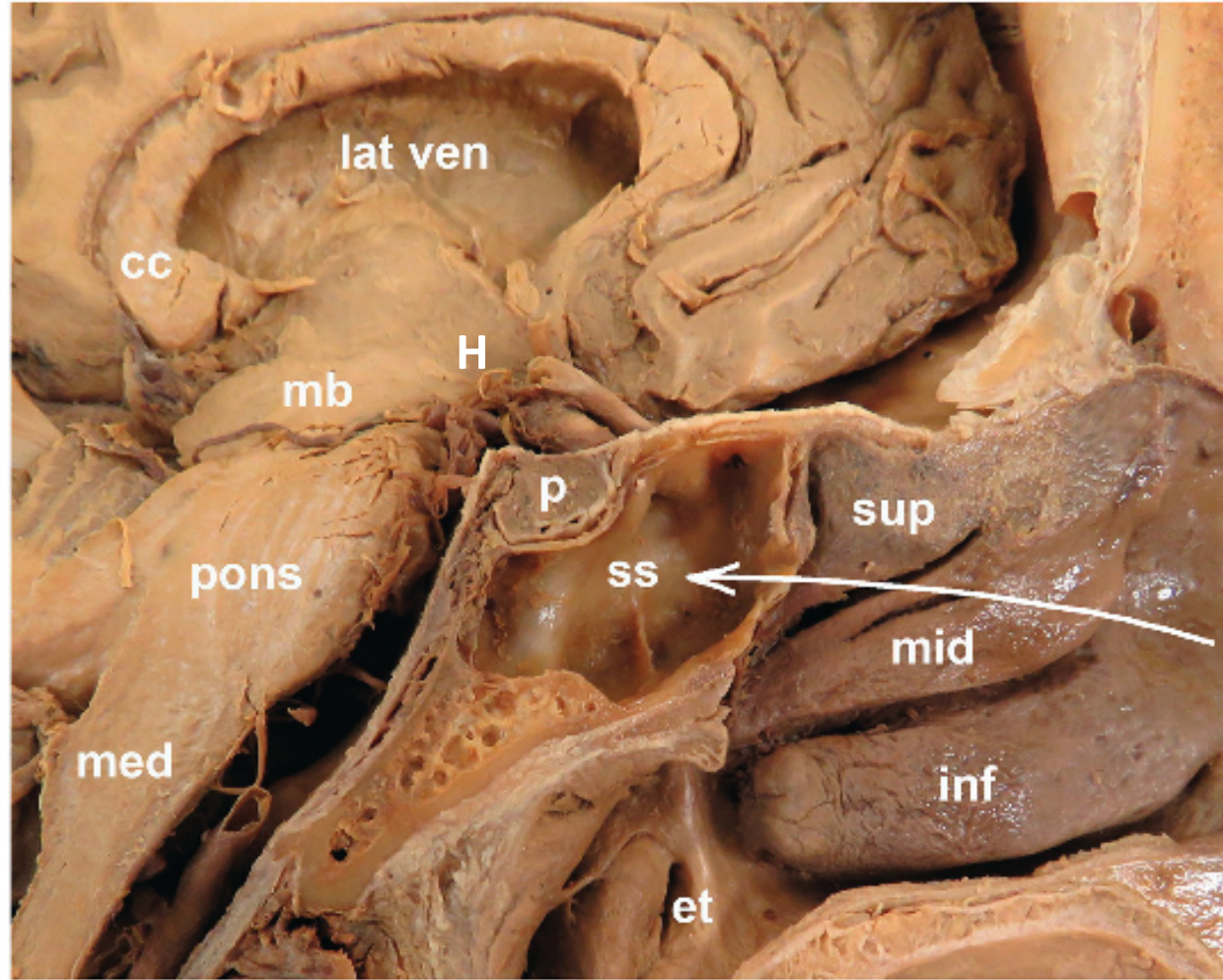
**med:** medulla oblongata

**P:** pituitary gland

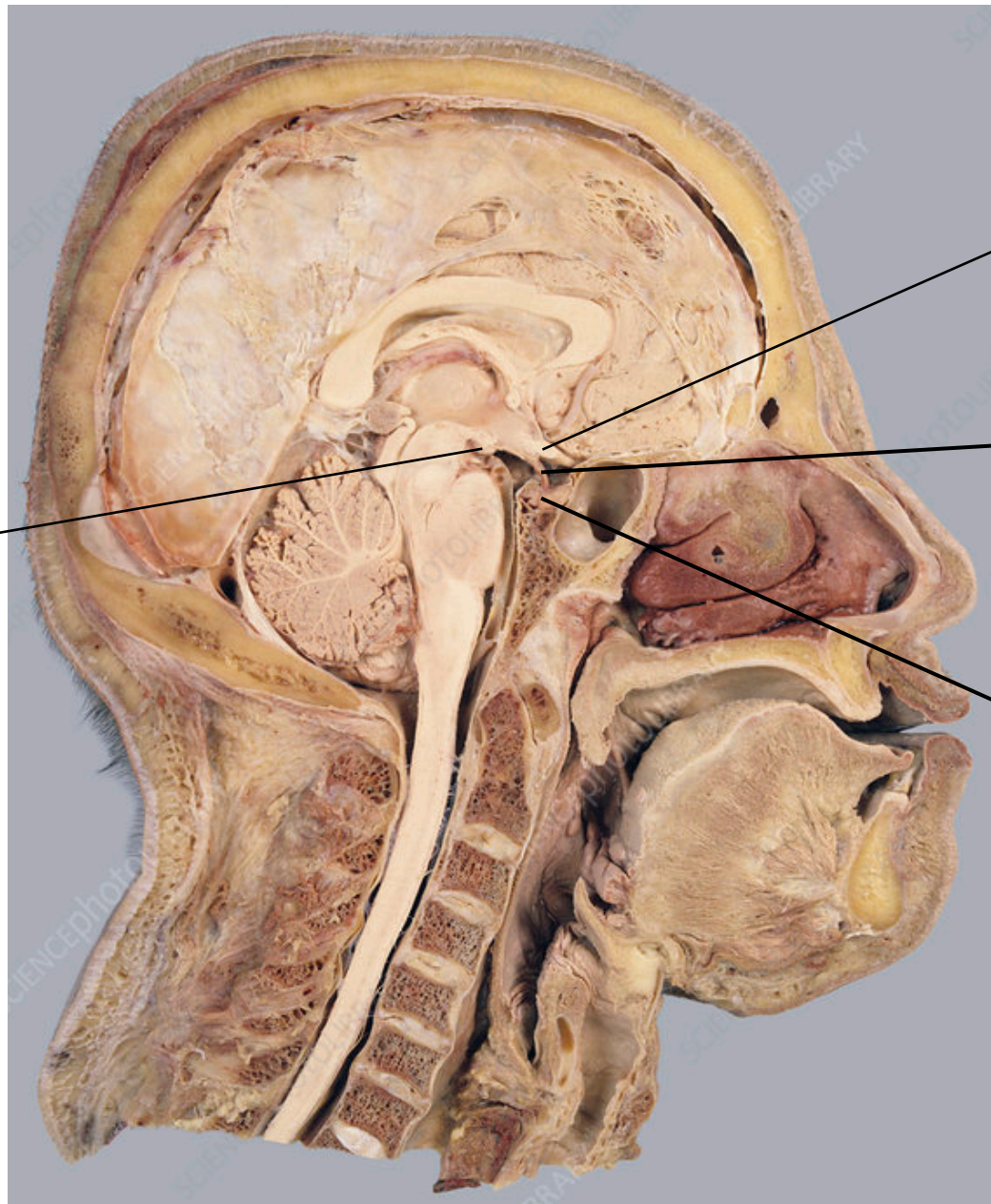
**ss:** sphenoid air sinuses

**cc:** corpus callosum

**H:** hypothalamus



**Mamillary body**  
**(Posteriorly)**



**Optic chiasma**  
**(Anteriorly)**

**infundibulum**

**Pituitary gland**



**Thank You**

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