

Histology practical revision



دعاً ما قبل المذاكرة

للهم افتح لي أبواب حكمتك وانشر علي رحمتك
وامن على بالحفظ و الفهم سبحانك لا علم لنا إلا
ما علمتنا انت أنت العليم الحكيم، ربی اشرح لي
صدری و يسر لی أمری و احلل عقدة من لساني
يفقهوا قولی .

For any correction, suggestion or any useful information
do not hesitate to contact us: **Histology434@gmail.com**

Color Index:

Blue = Question

Purple = Additional Notes

Things you should know before studying these slides

- ✓ The pictures show in these slide will be the same pictures you will see in the exam however, it may not be colored.
- ✓ Mention the full name always and don't use shortcuts
- ✓ Arrows in the pictures are very important.
- ✓ Don't worry it's easy ☺.

Nucleus

Q1- Identify :

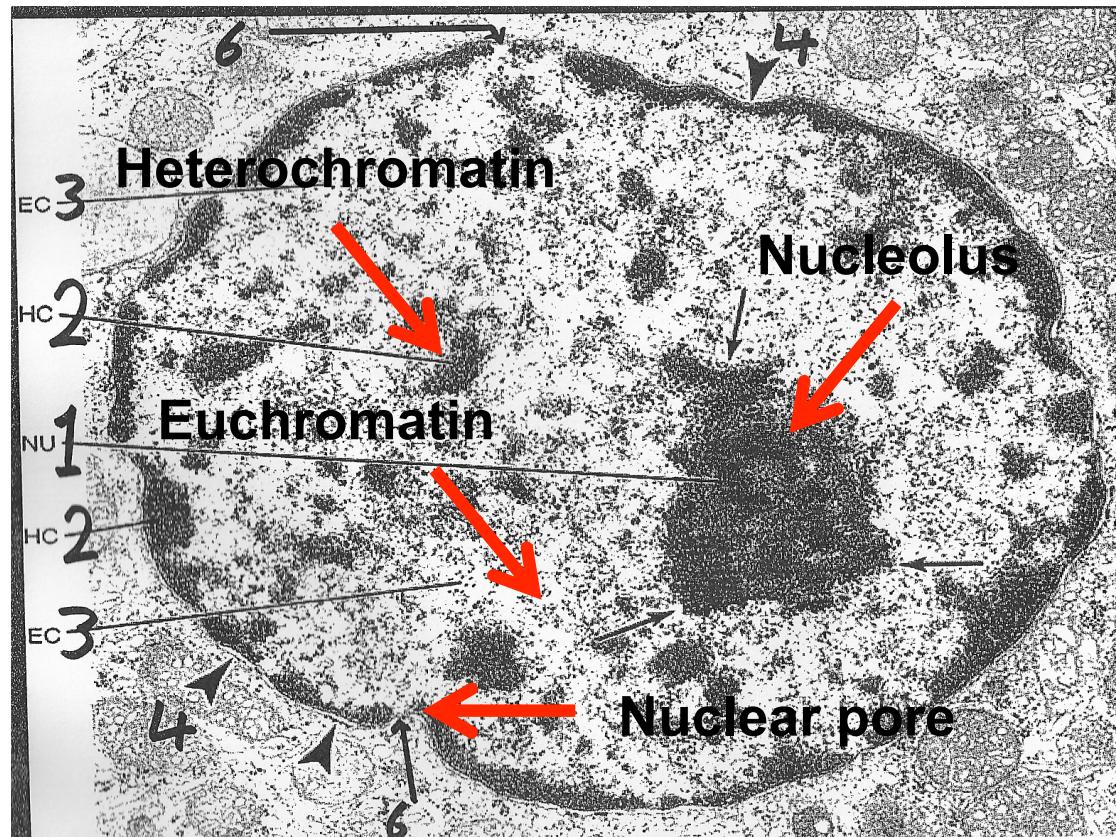
- ✓ Nucleus

Q2- Location of :

- Heterochromatin
- Euchromatin
- Nuclear pore
- Nucleolus

Q3- What is the function of Nucleolus ?

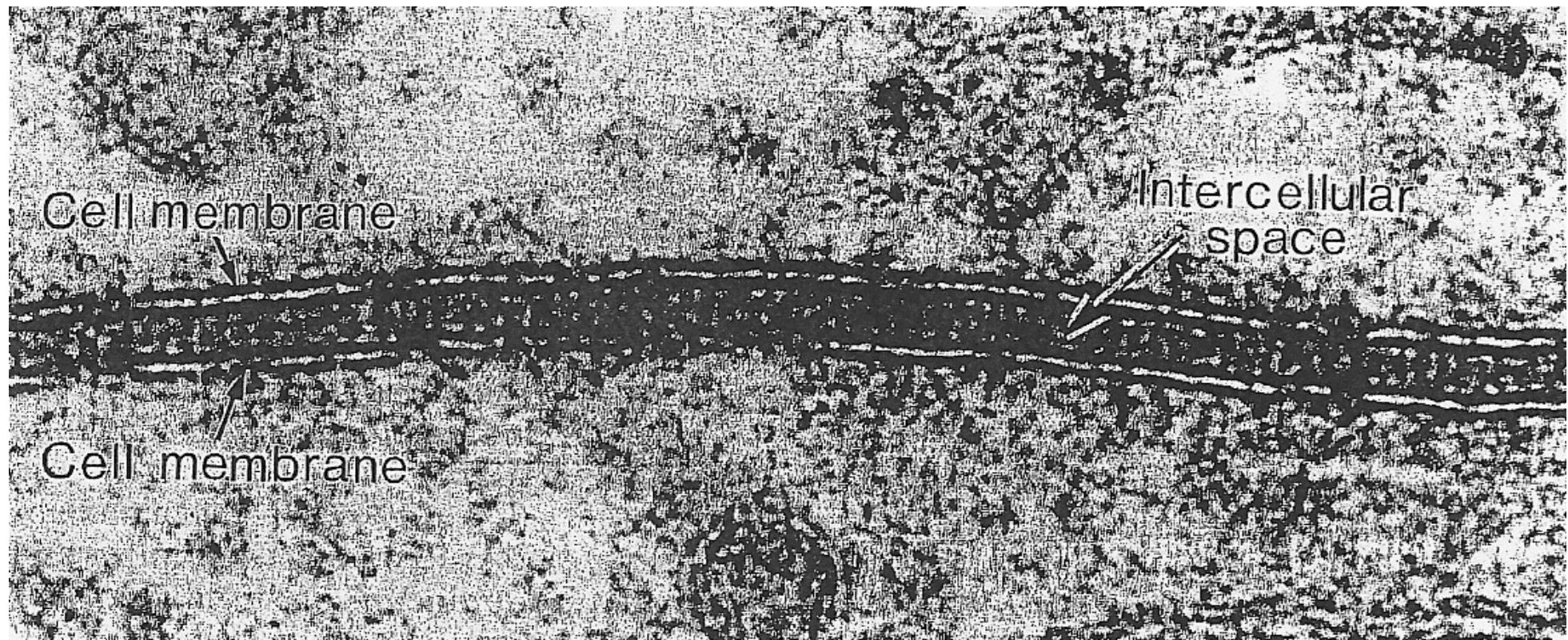
- ✓ Formation of ribosomal RNA (rRNA)



Cell membrane

Q1- Identify :

- ✓ Cell membrane (trilaminar appearance)



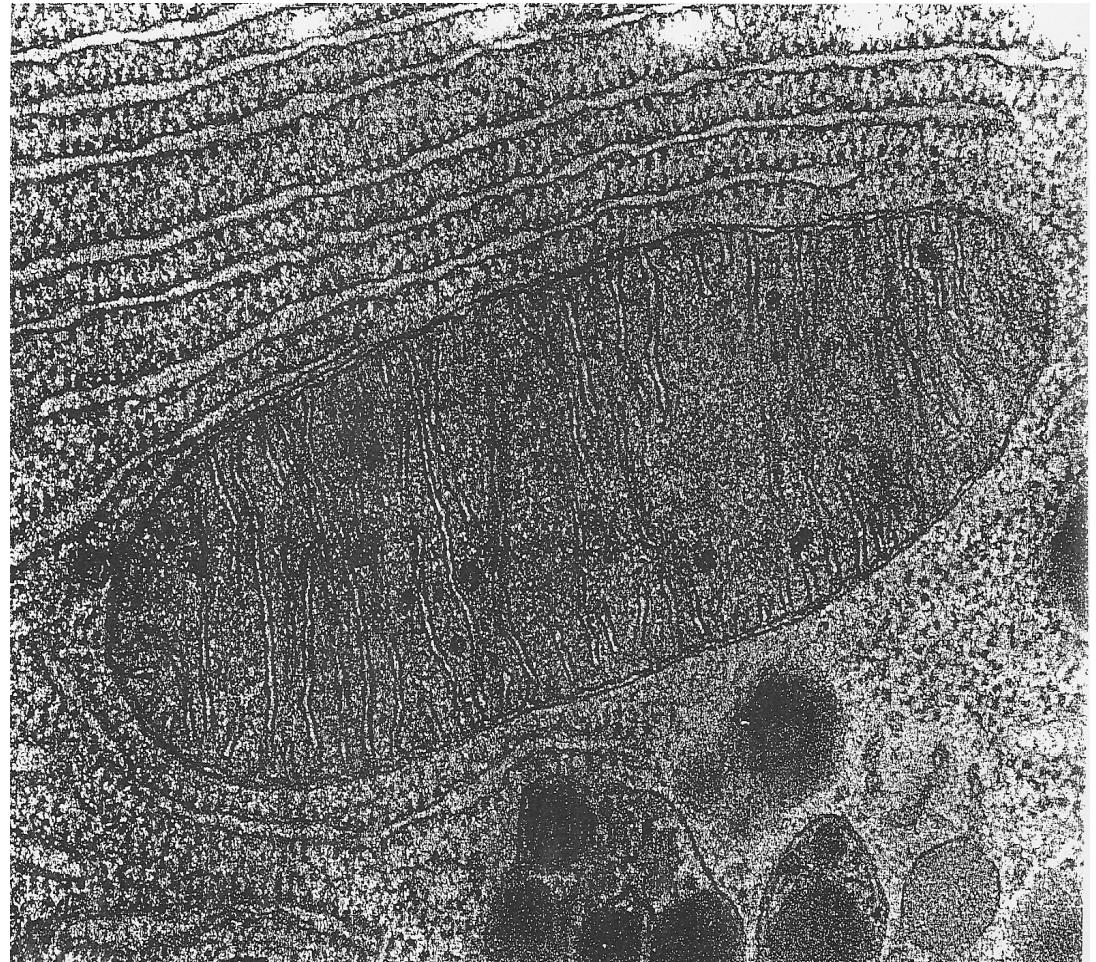
Mitochondria

Q1- Identify :

- ✓ Mitochondria

Q2- What is the function ?

- ✓ Production of ATP



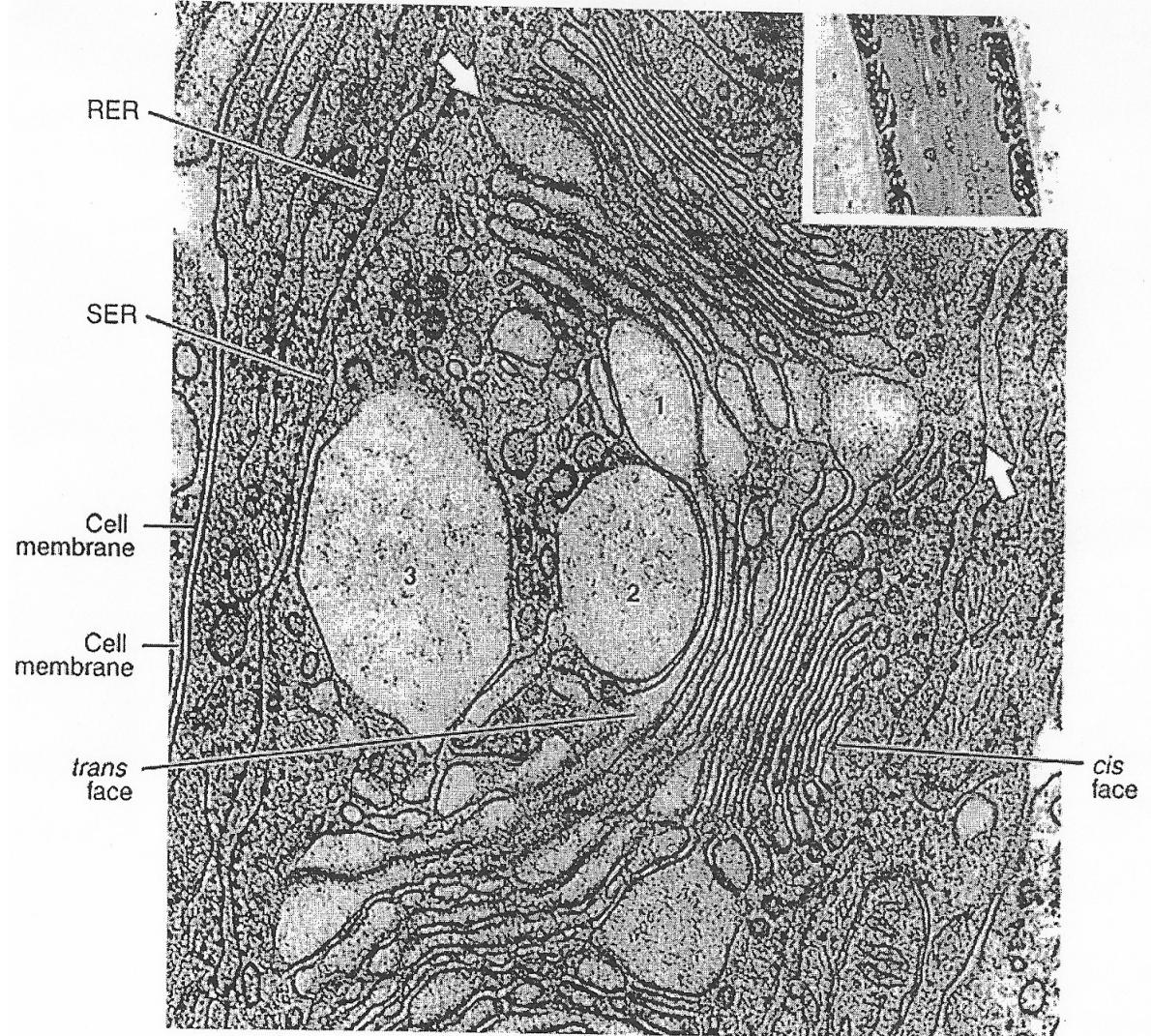
Golgi apparatus

Q1- Identify :

- ✓ Golgi apparatus

Q2- What is the function ?

- ✓ Packaging of proteins
- ✓ Modification of proteins



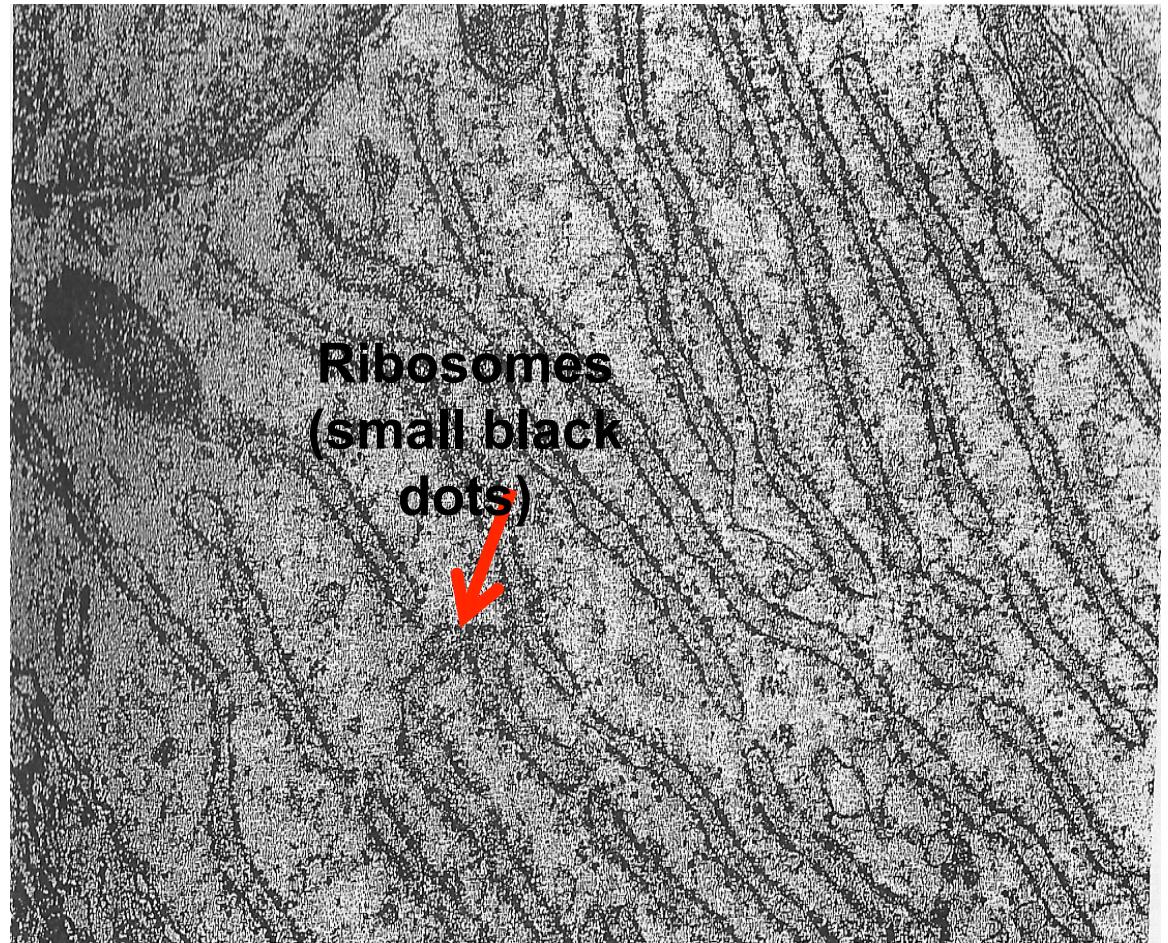
Rough Endoplasmic Reticulum

Q1- Identify :

- ✓ Rough Endoplasmic Reticulum

Q2- What is the function ?

- ✓ Synthesis of protein



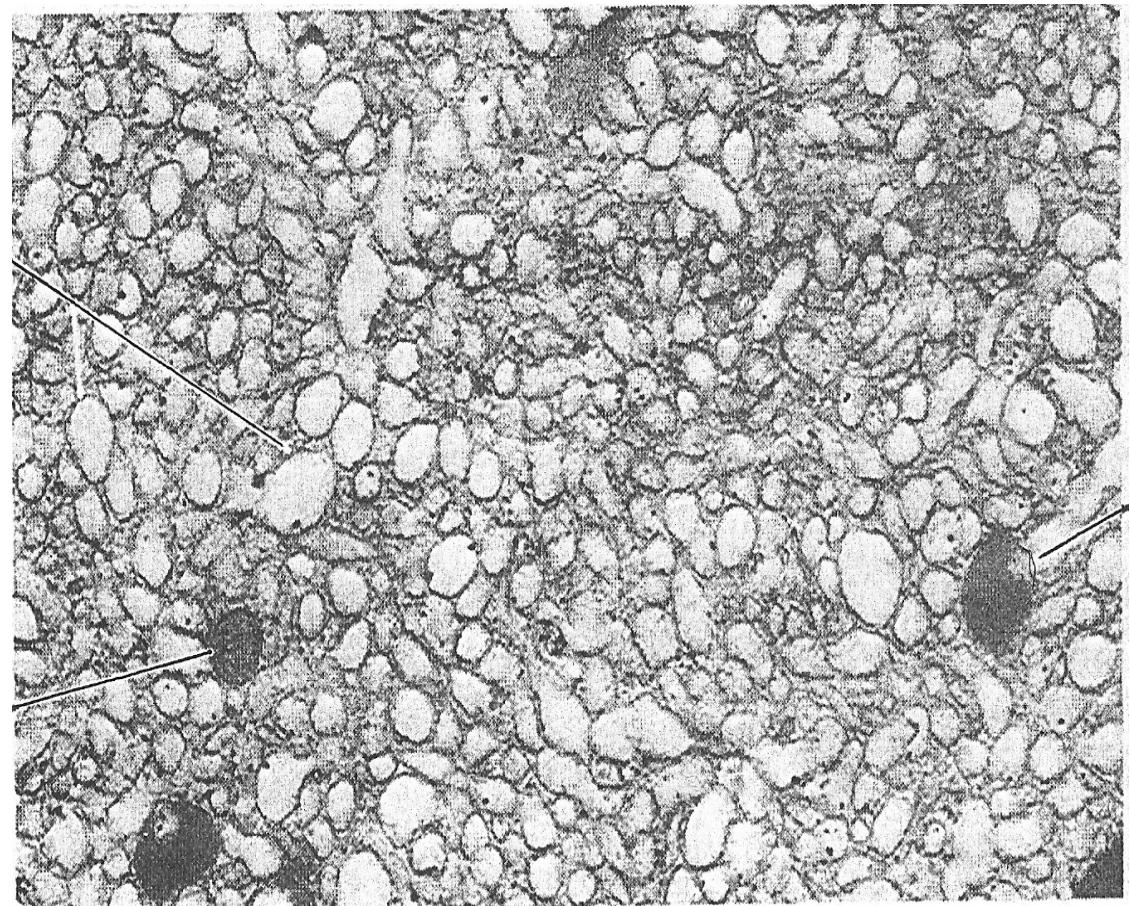
Smooth Endoplasmic Reticulum

Q1- Identify :

- ✓ Smooth Endoplasmic Reticulum

Q2- What is the function ?

- ✓ Synthesis of lipid
- ✓ Detoxification



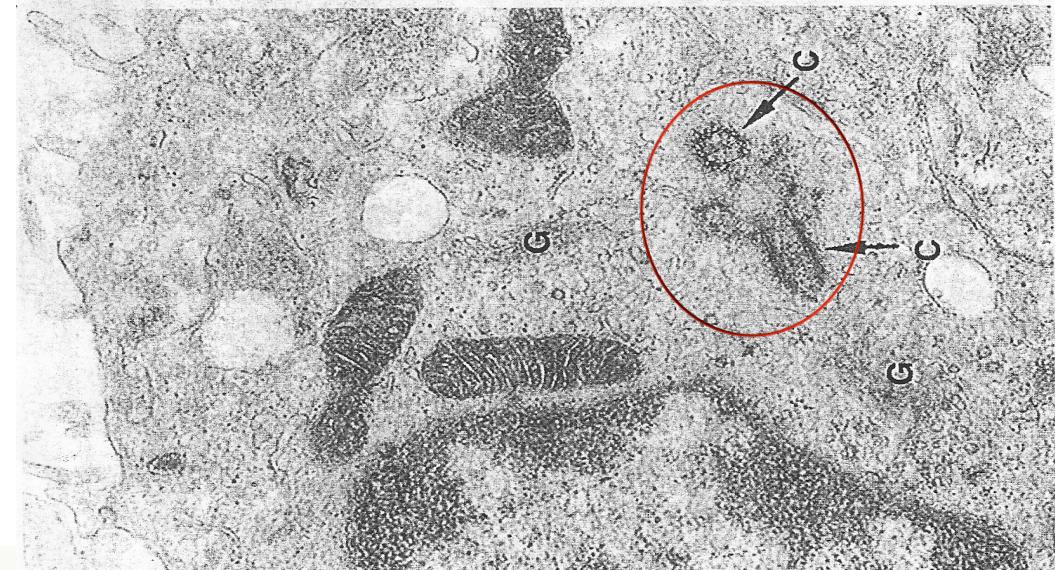
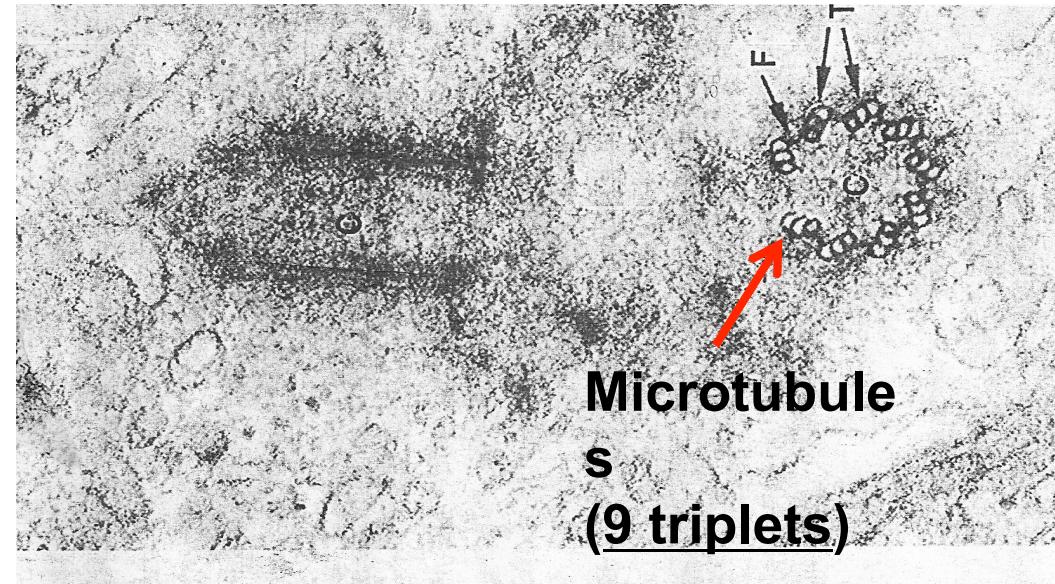
Centrioles

Q1- Identify :

- ✓ Centrioles

Q2- What is the function ?

- ✓ Cell division
- ✓ Formation of Cilia and Flagella



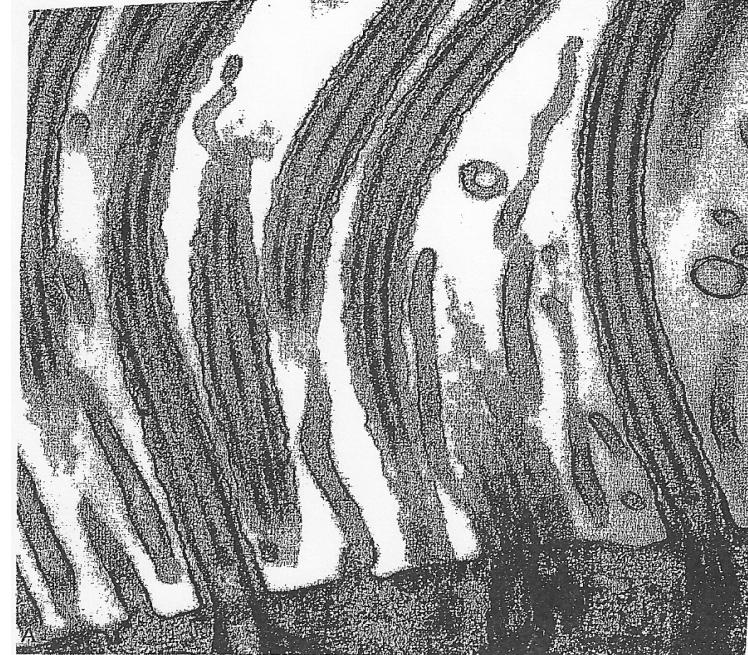
Cilia

Q1- Identify :

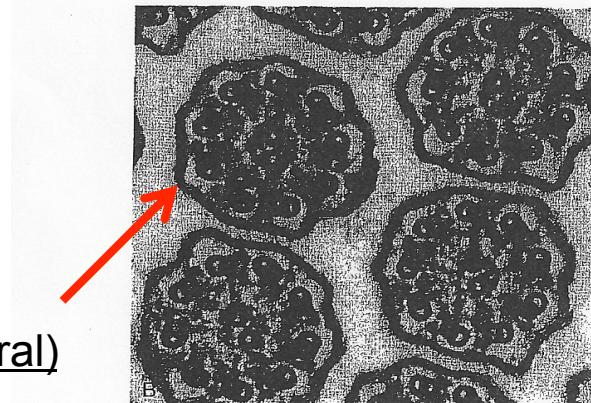
- ✓ Cilia

Q2- What is the function ?

- ✓ movement of particles or fluids in one direction



L.S.



T.S.

Microtubules
(9 doublets and 2 central)

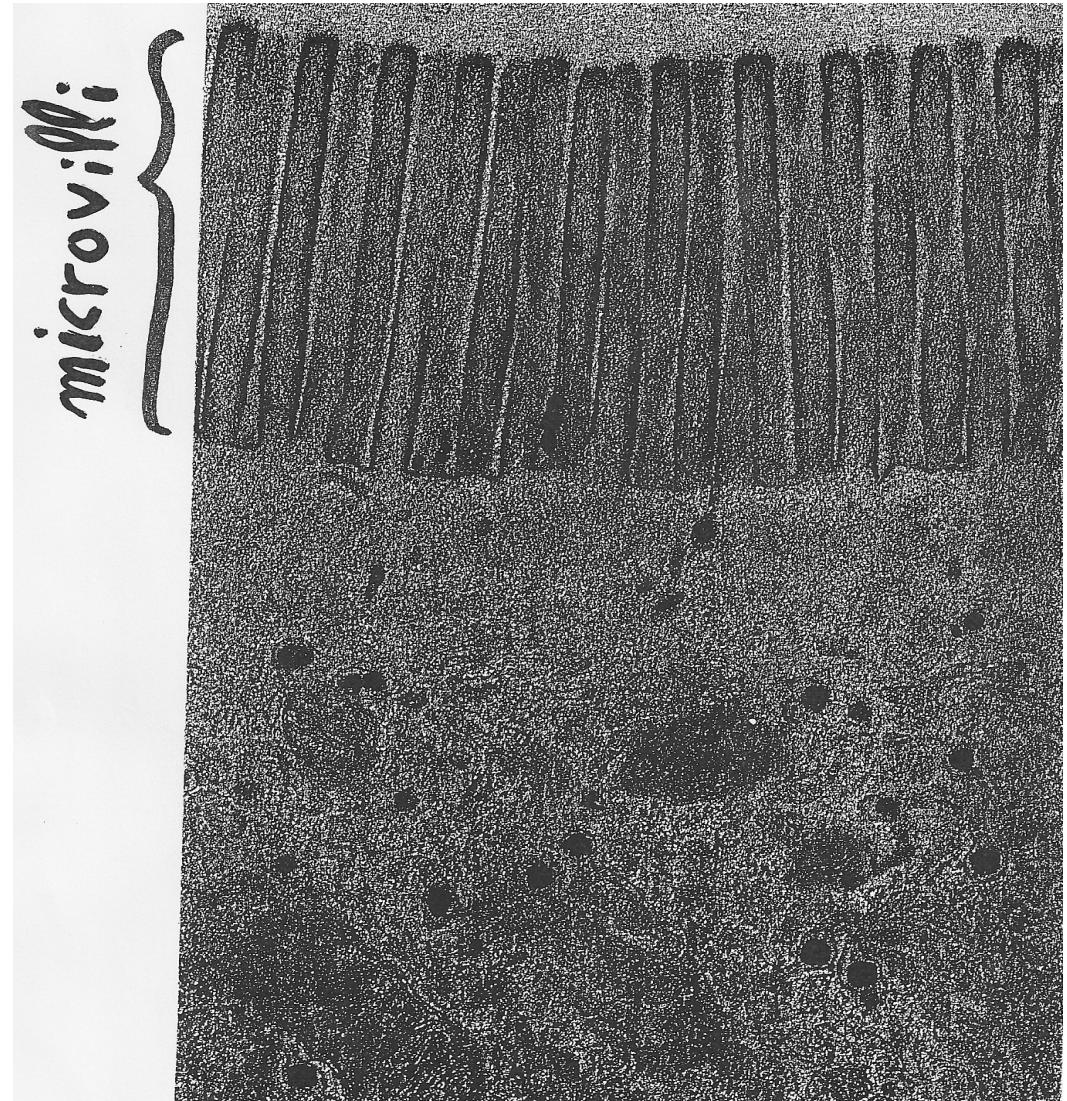
Microvilli

Q1- Identify :

- ✓ Microvilli

Q2- What is the function ?

- ✓ Increase surface area
- Has Microfilaments



Simple Squamous Epithelium

Q1- Identify the type of epithelium:

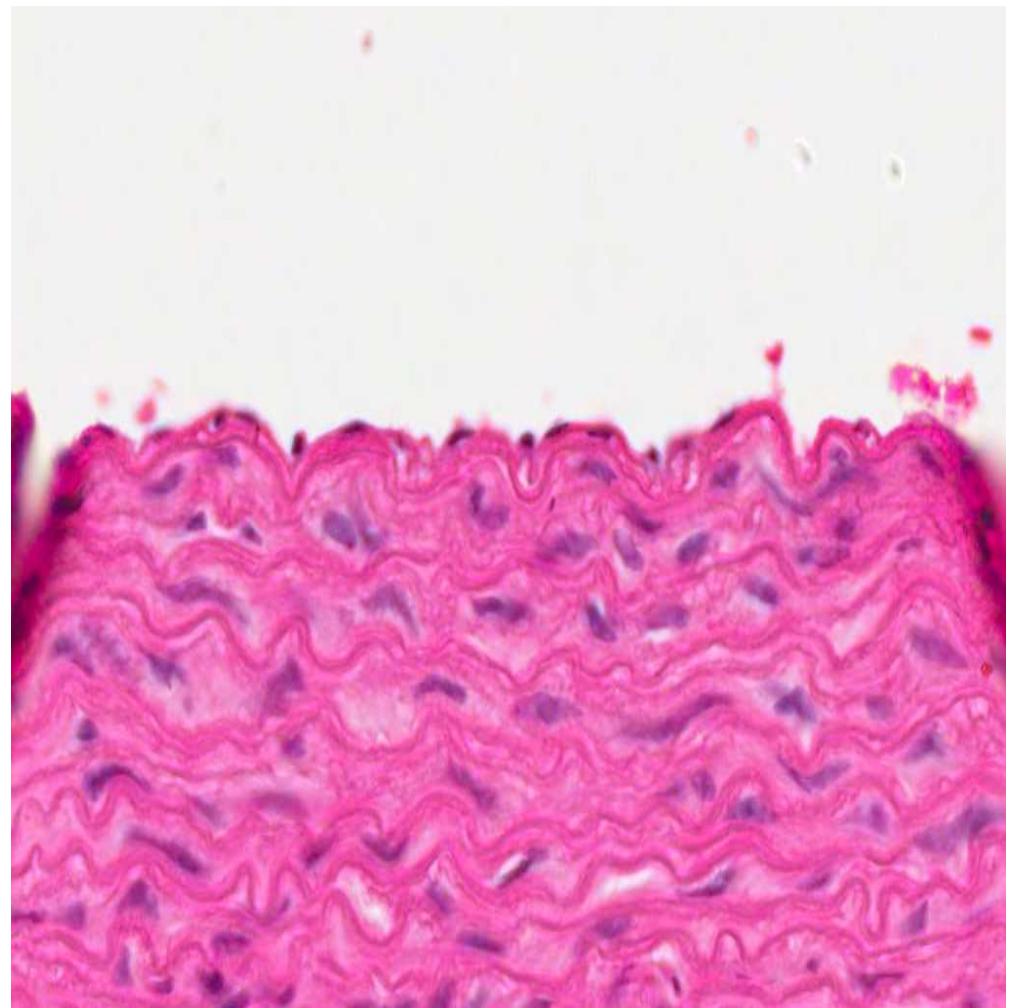
- ✓ Simple Squamous Epithelium

Q2- What is the type of Connective tissue ?

- ✓ Elastic connective tissue

Q3- Mention the organ:

- ✓ Aorta



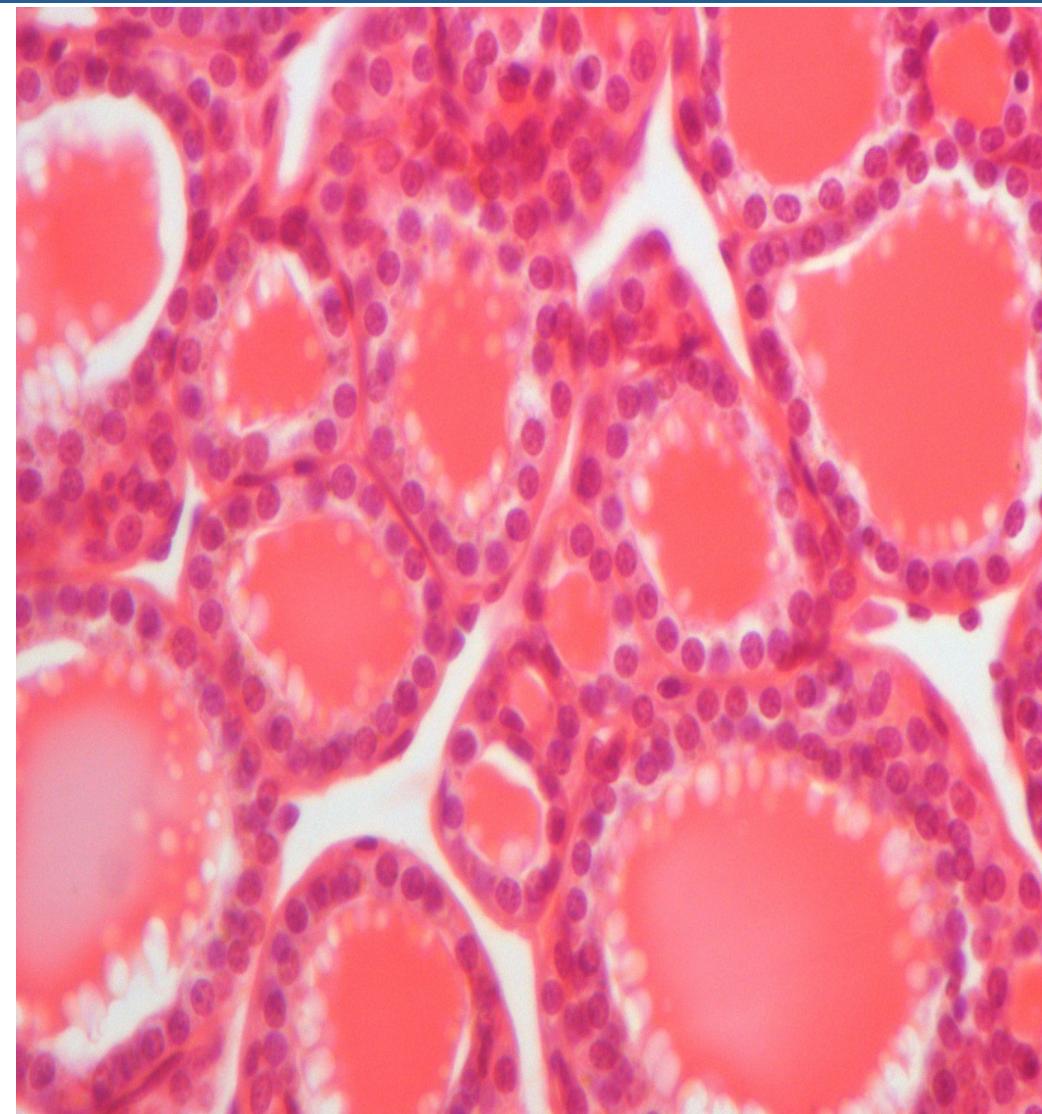
Simple Cuboidal Epithelium

Q1- Identify the type of Epithelium:

- ✓ Simple Cuboidal Epithelium

Q2- Mention the organ:

- ✓ Thyroid gland



Simple Columnar Epithelium

Q1- Identify the type of epithelium:

- ✓ Simple Columnar Epithelium

Q2- Mention the organ:

- ✓ GIT small intestines



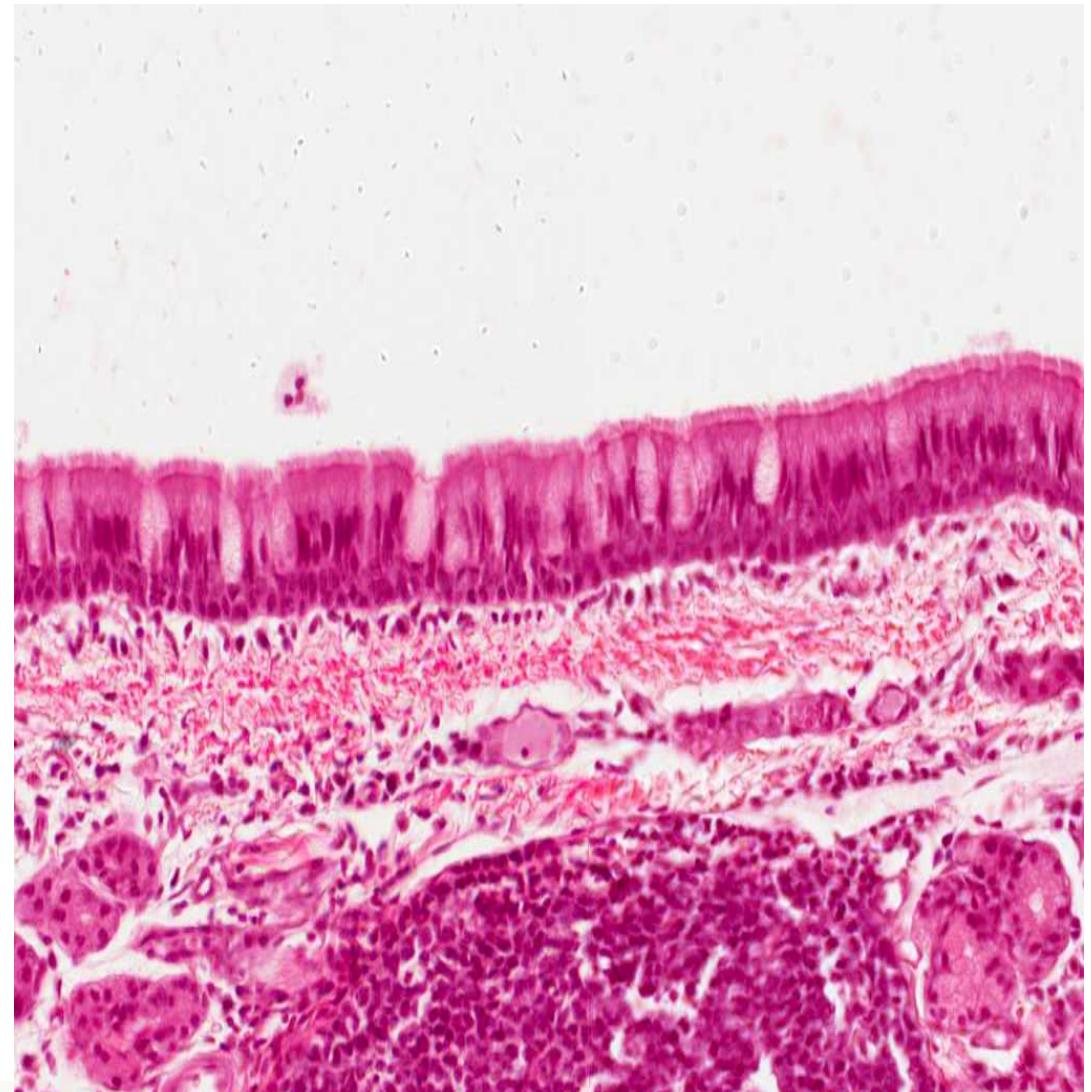
Pseudostratified Columnar Ciliated Epithelium with Goblet Cells

Q1- Identify the type of epithelium:

- ✓ Pseudostratified Columnar Ciliated Epithelium with Goblet Cells

Q2- Mention the organ:

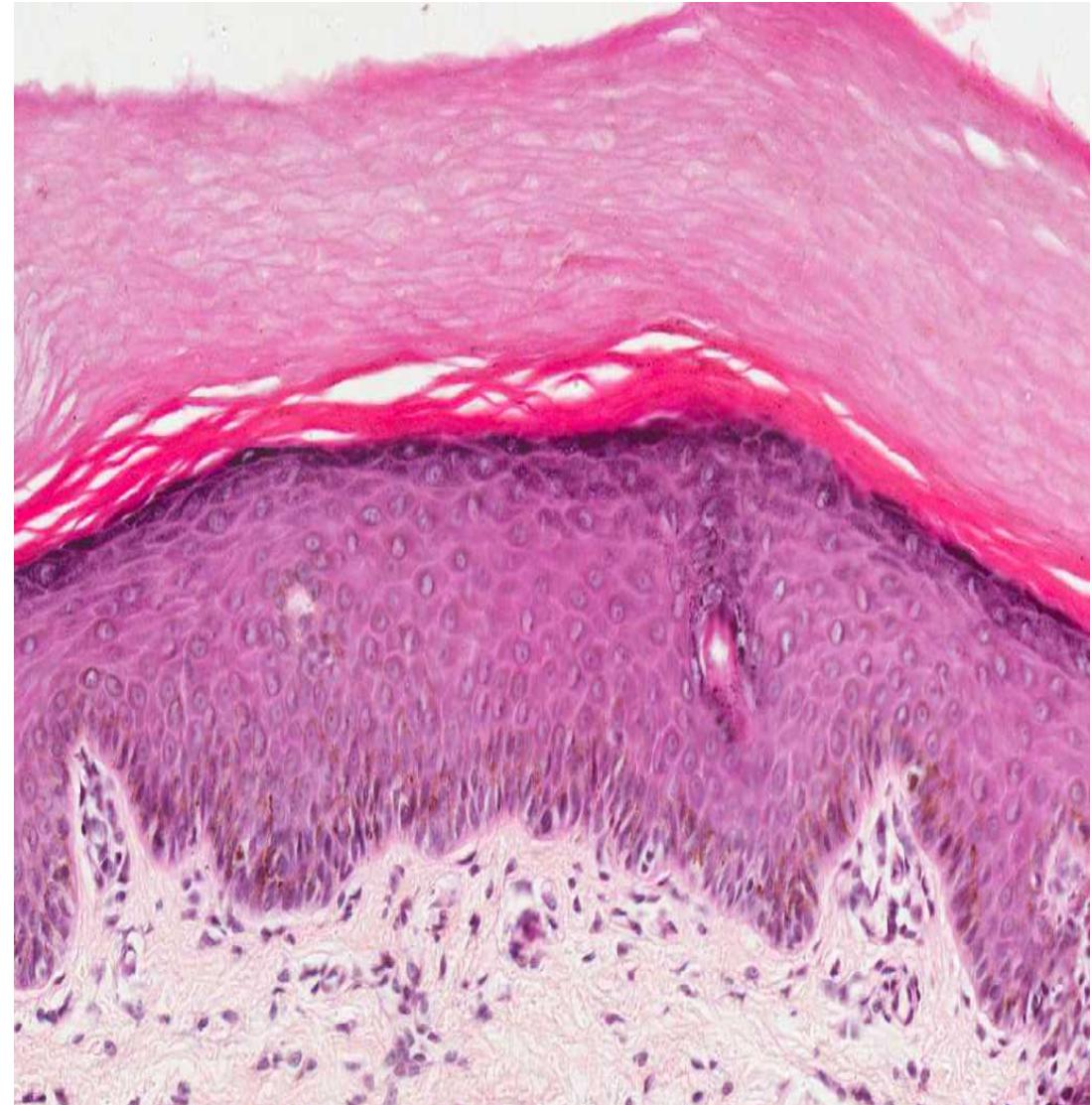
- ✓ Trachea and Bronchi



Stratified Squamous Keratinized Epithelium

Q1- Mention the organ :

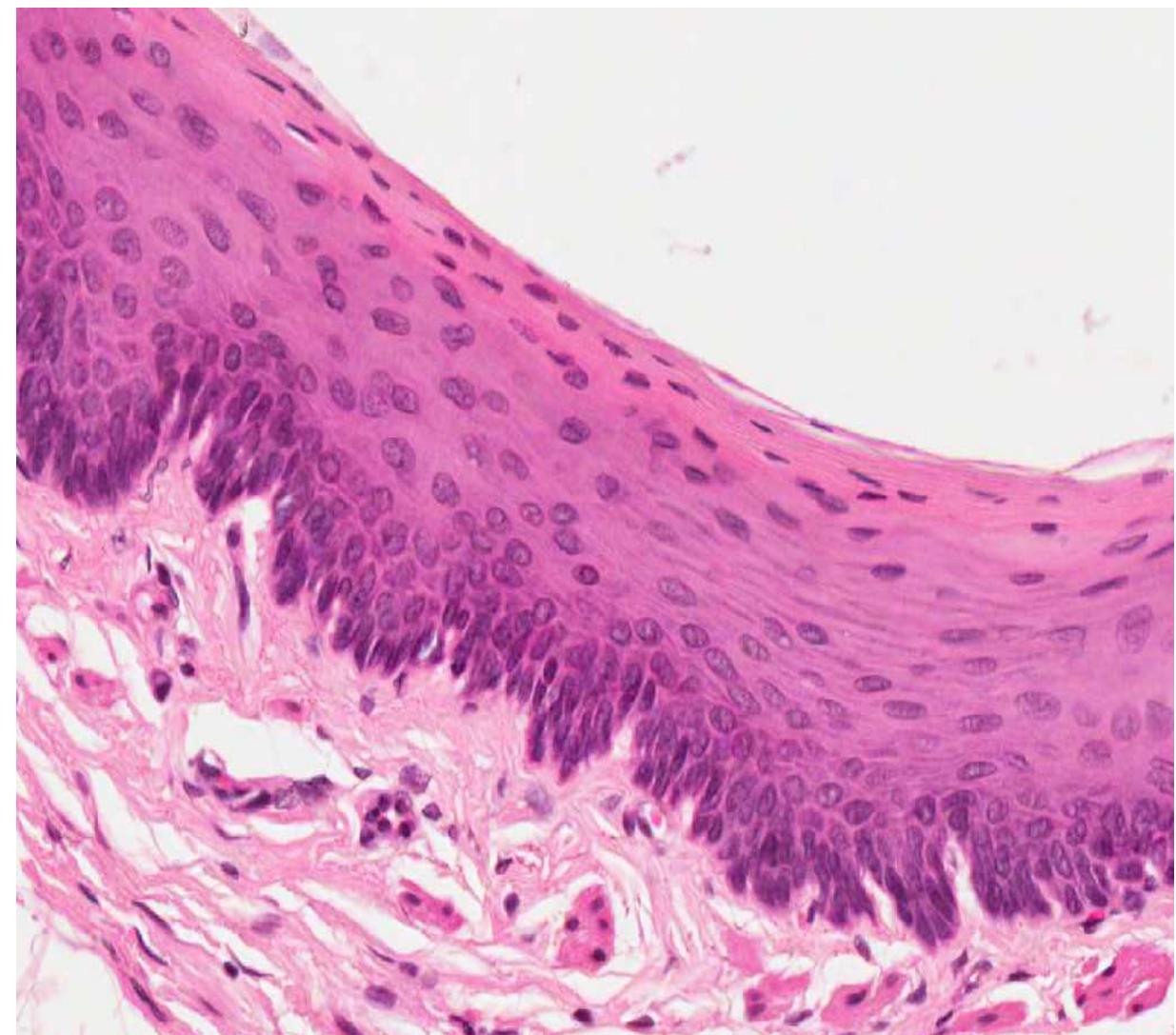
- ✓ Epidermis of skin



Stratified Squamous Non-Keratinized Epithelium

Q1- Mention the organ :

- ✓ Esophagus



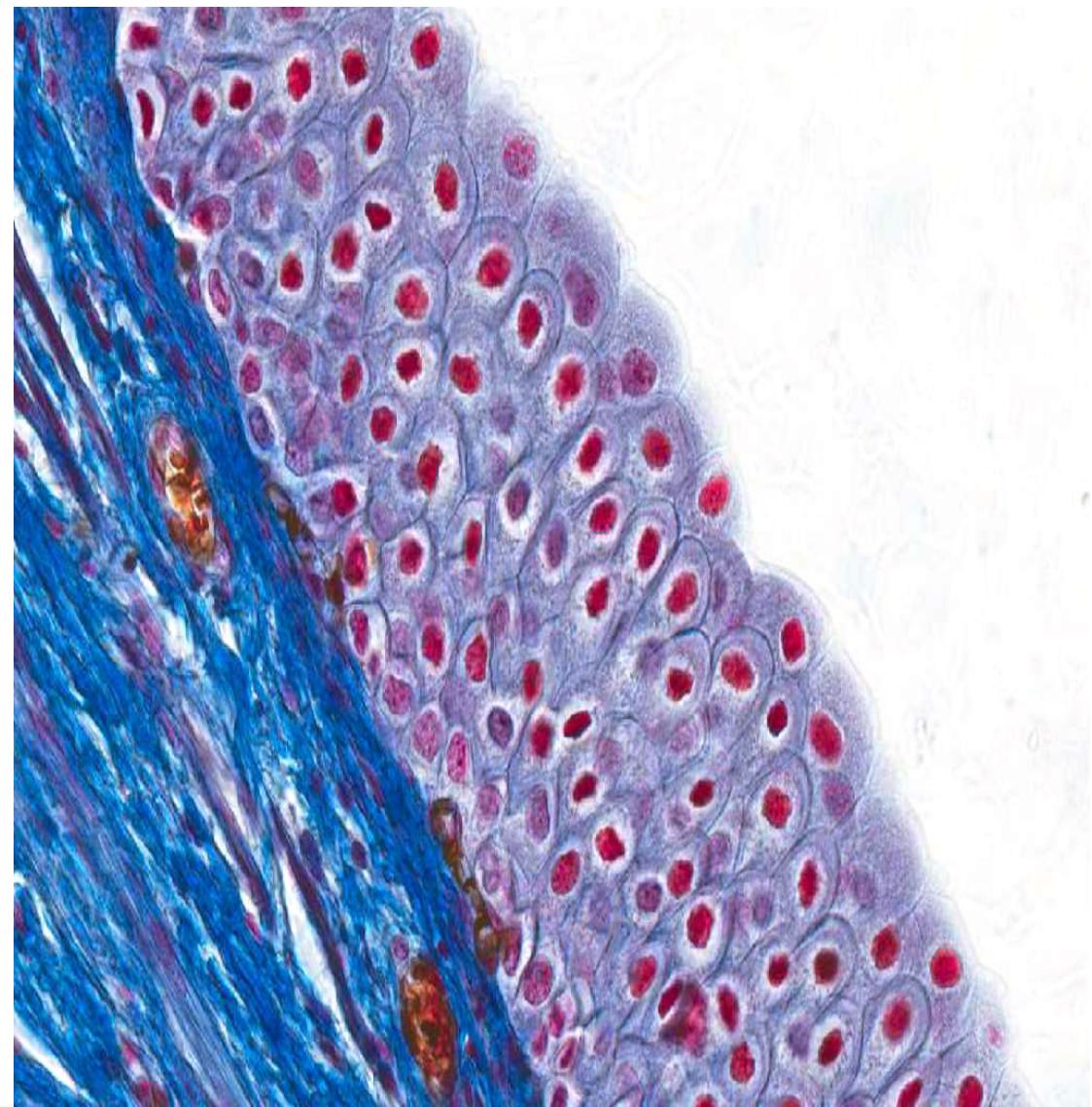
Transitional Epithelium

Q1- Identify the type of epithelium:

- ✓ Transitional epithelium

Q2- Mention the organ :

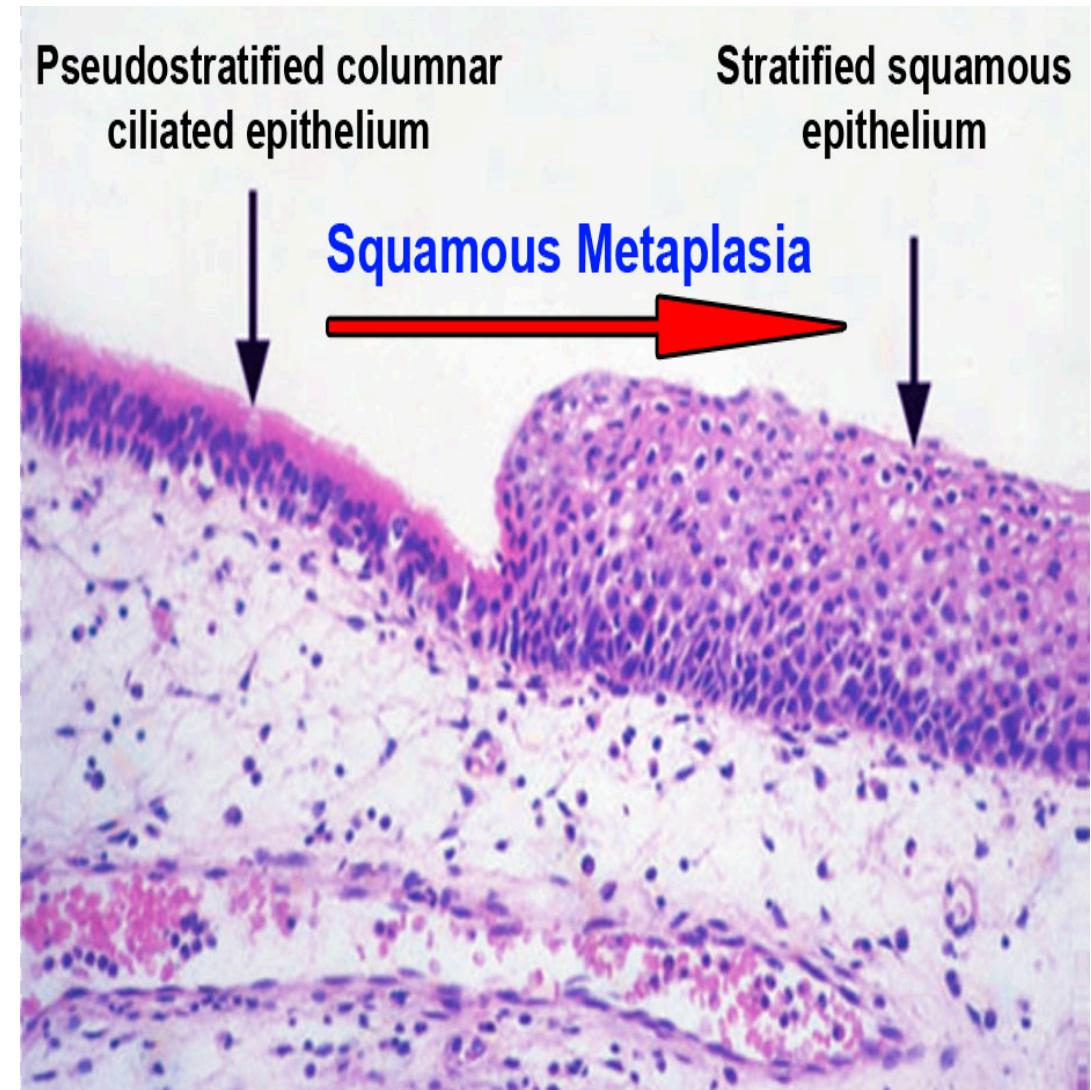
- ✓ Urinary bladder



Squamous Metaplasia

Q1- Identify :

- ✓ Squamous Metaplasia
- **From** pseudostratified columnar ciliated epithelium **to** stratified squamous epithelium



Dense collagenous regular connective tissue

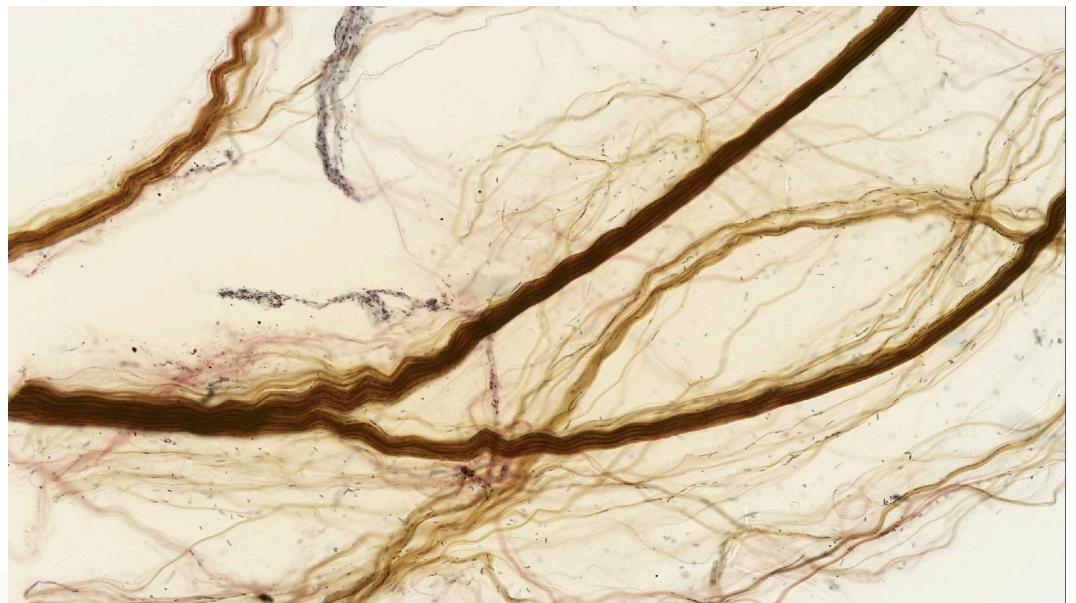
Q1- What is the type of fibers ?

- ✓ Collagen Fibers



Q2- What is the type of cells ?

- ✓ Fibroblasts cells



Q3- Mention the organ:

- ✓ Tendons and ligaments

Elastic connective tissue

Q1- Identify:

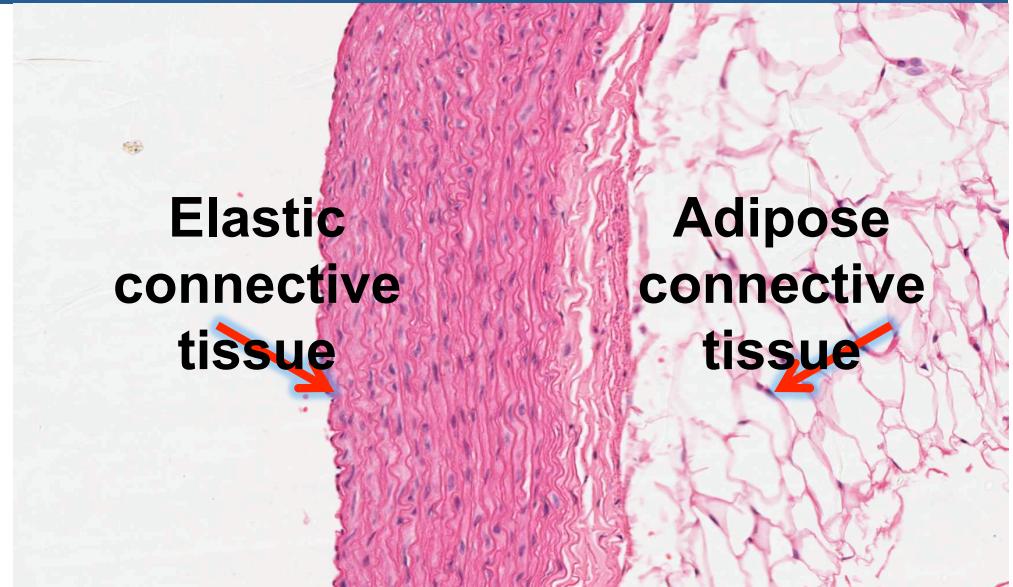
- ✓ Elastic connective tissue

Q2- Type of epithelium:

- ✓ Simple squamous

Q3- Mention the organ :

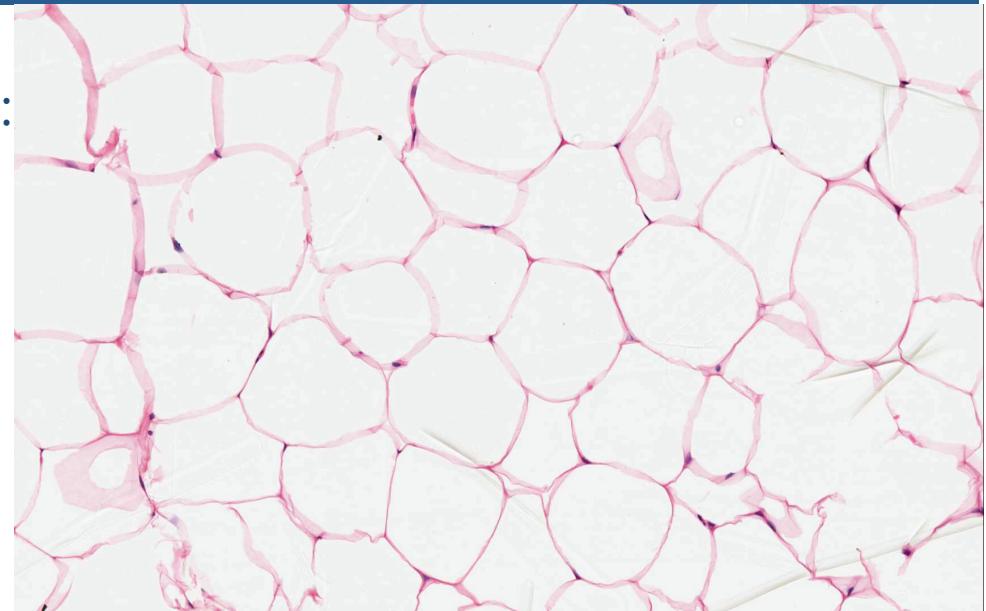
- ✓ Aorta



Adipose Connective Tissue

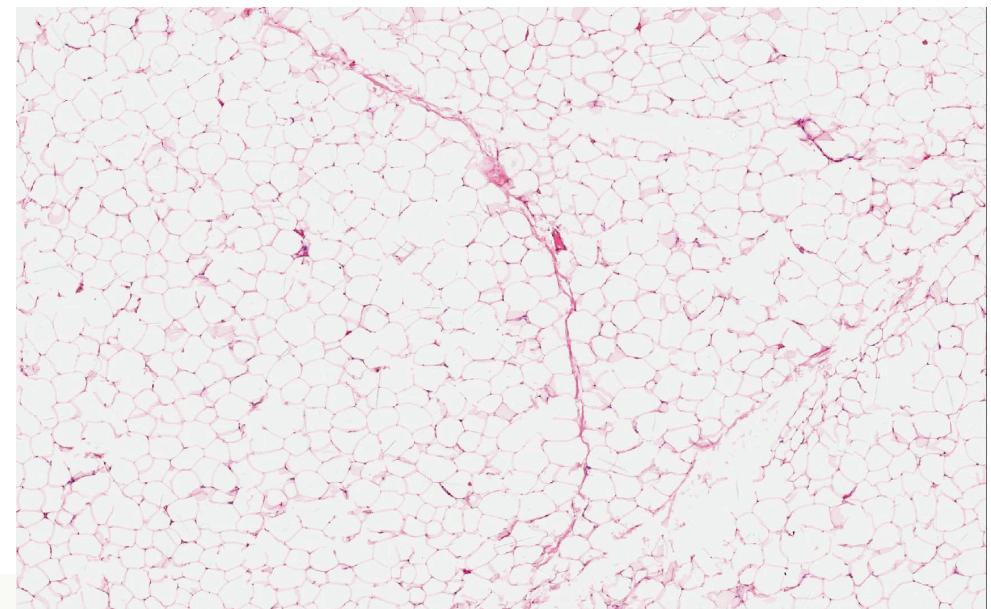
Q1- Identify the type of connective tissue:

- ✓ Adipose connective tissue



Q2- What is the type of cells ?

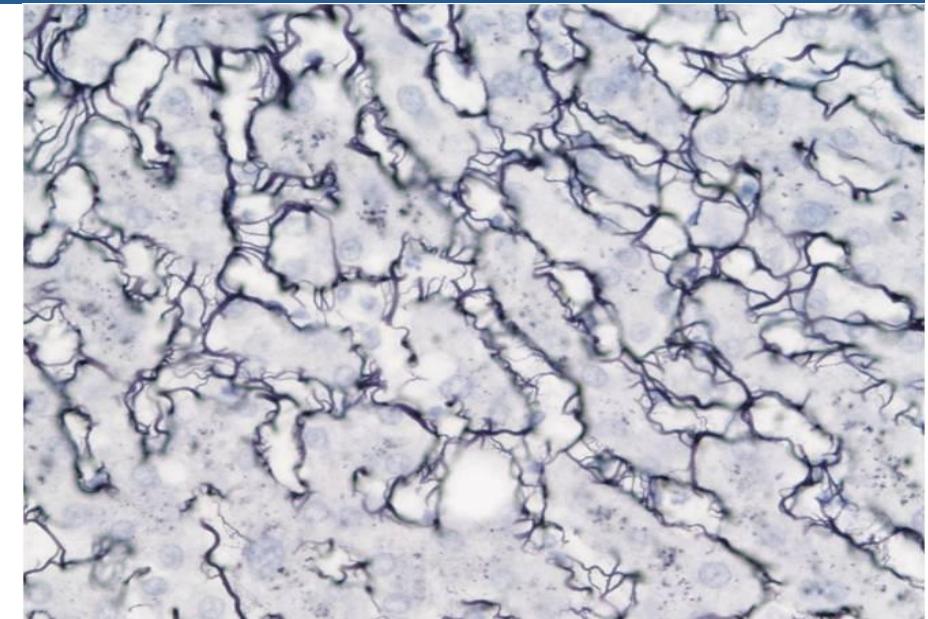
- ✓ Adipocyte



Reticular connective tissue

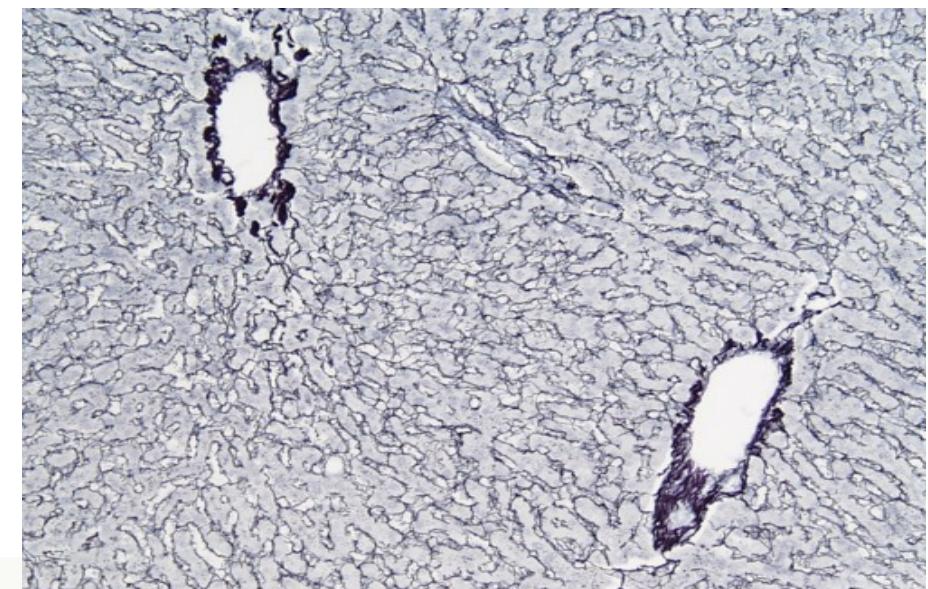
Q1- Identify the type of connective tissue:

- ✓ Reticular connective tissue



Q2- Mention the organ:

- ✓ Lymph node and Spleen



Plasma cell

Q1- Identify the type of the cell :

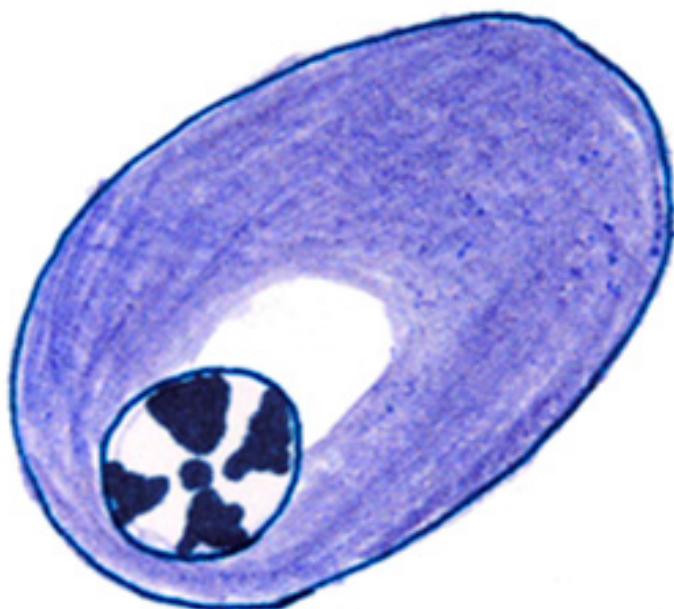
- ✓ Plasma cell (Clock-face)

Q2- What is the function ?

- ✓ Secretion of Antibodies

Q3- What is the type of cytoplasm ?

- ✓ Basophilic cytoplasm



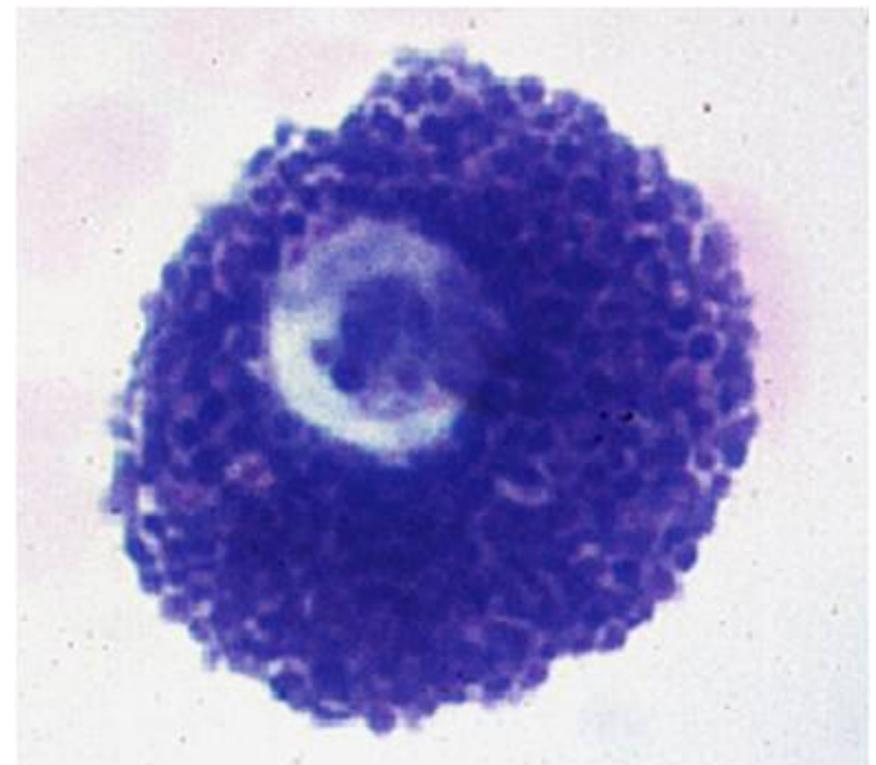
Mast cell

Q1- Identify the type of the cell:

- ✓ Mast cell

Q2- what is the function ?

- ✓ Secretion of Histamine and Heparin



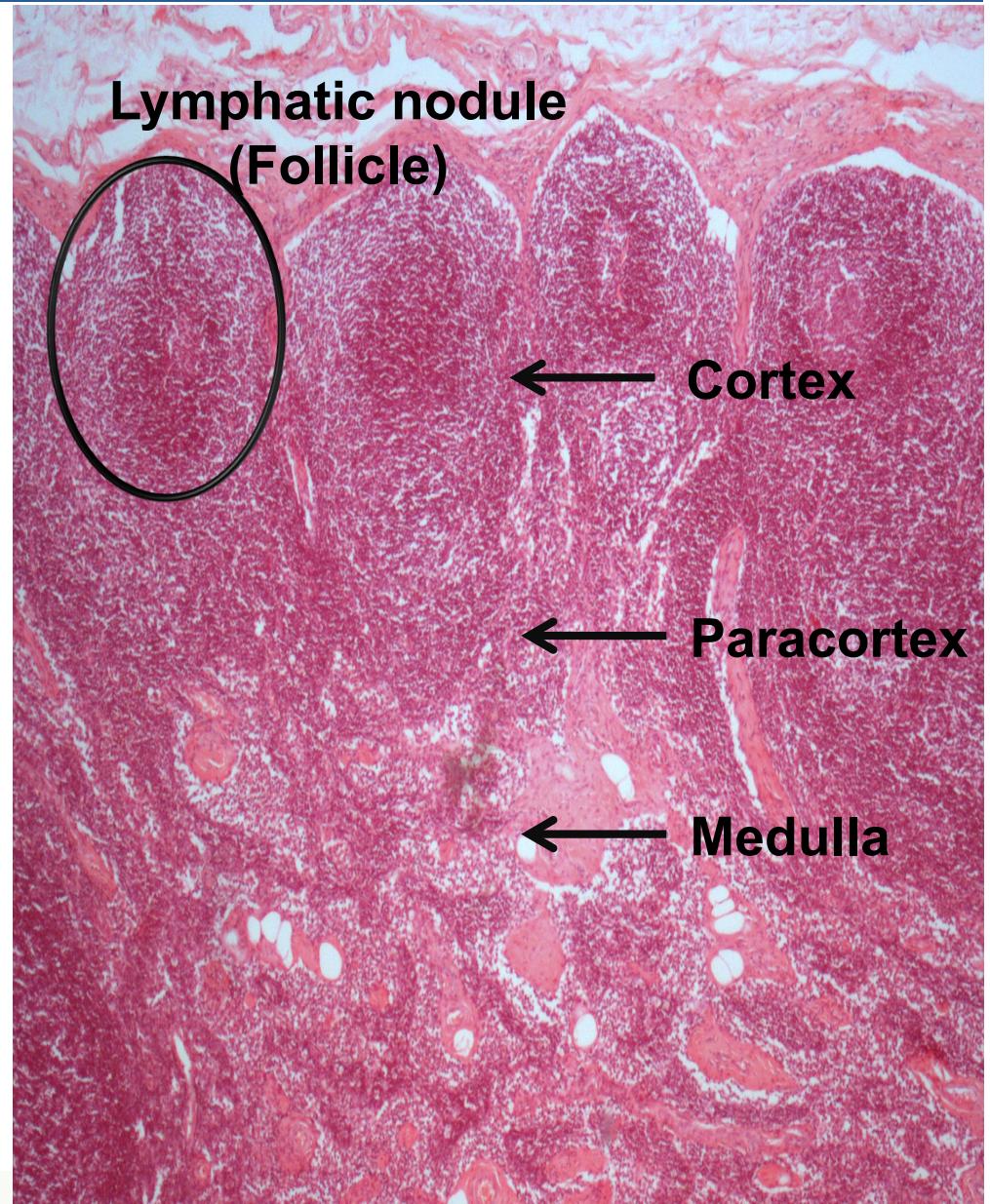
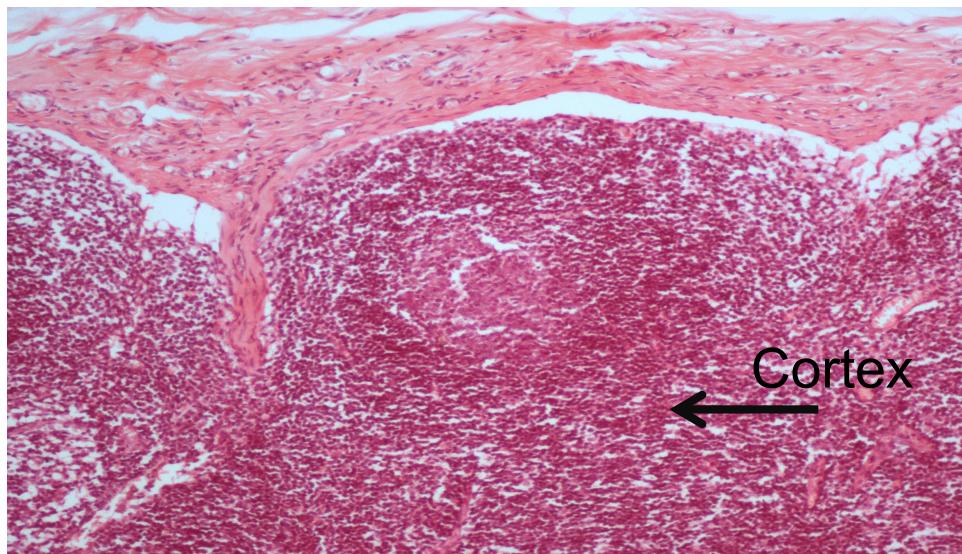
Lymph Node

Q1- Identify :

- ✓ Lymph Node

Q2- Location of :

- Lymphatic nodule (Follicle)
- Cortex
- Paracortex
- Medulla



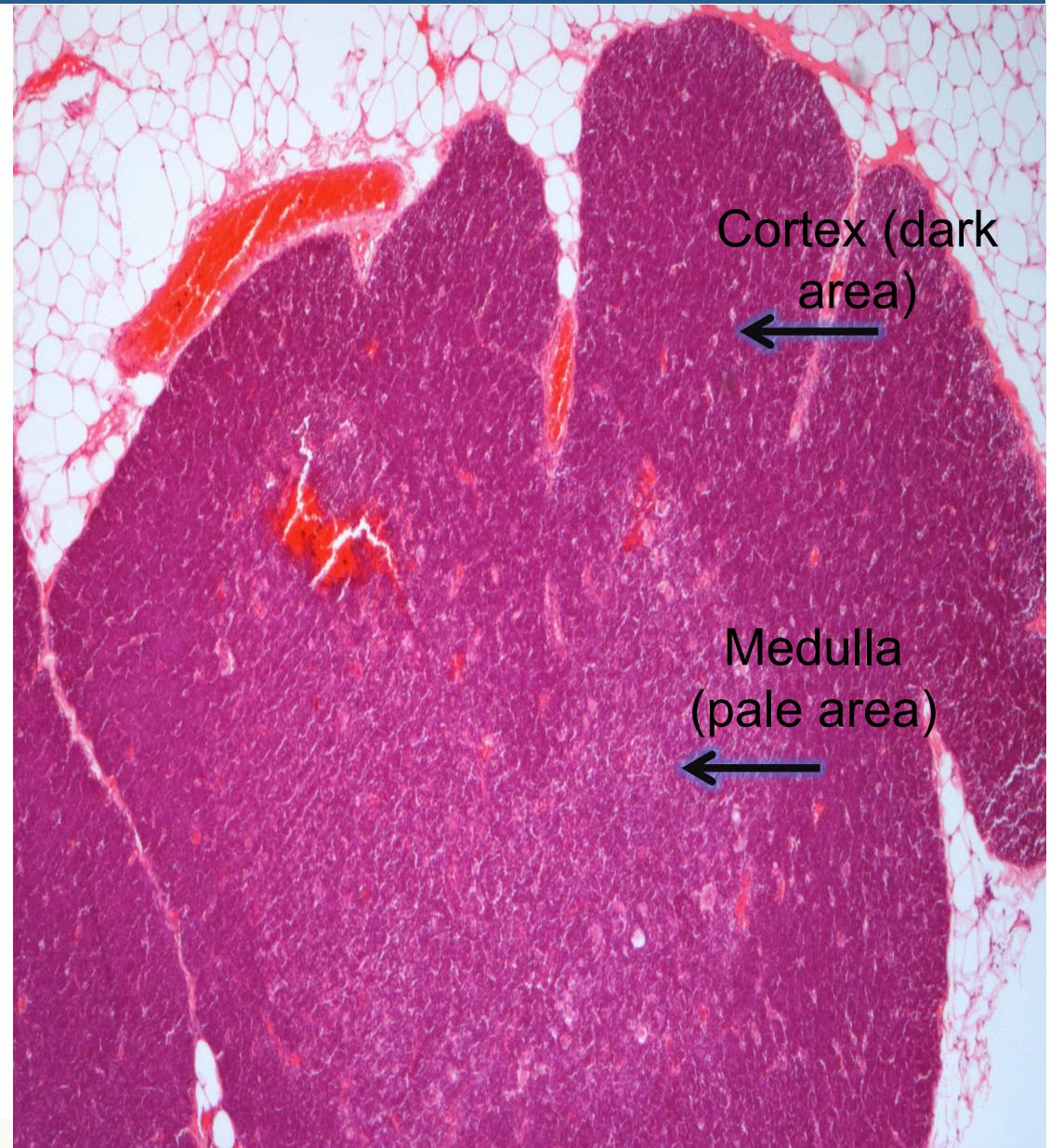
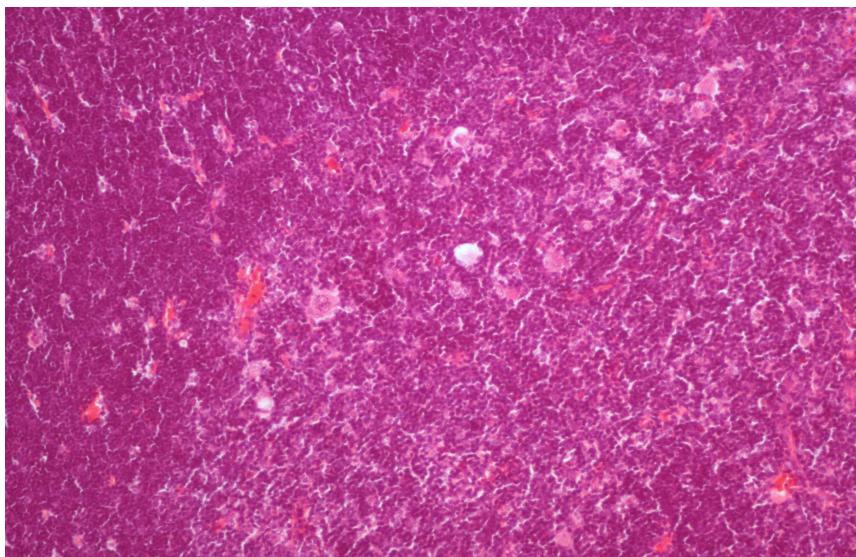
Thymus

Q1- Identify:

- ✓ Thymus “Incomplete septum”

Q2- Location of :

- Cortex
- Medulla (**Hassall's corpuscles**)



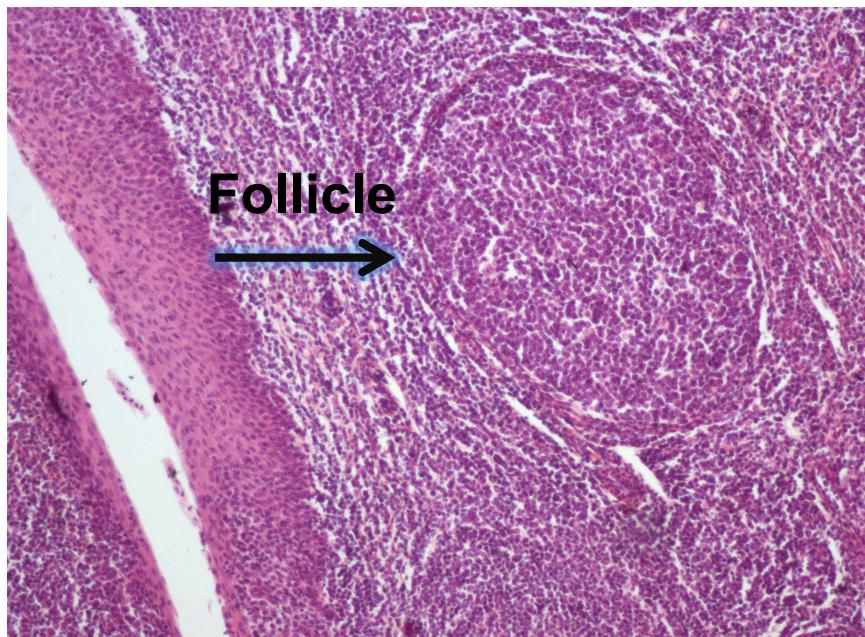
Palatine Tonsil

Q1- Identify:

- ✓ Palatine Tonsil

Q2- What is the type of epithelium ?

- ✓ Stratified squamous epithelium



Follicle
→



Thank you for checking our work...

❖ Done By :

Ouf Al Oufy

❖ Edited By:

Amal Afrah

دعاً ما بعد المذاكرة
اللهم إني استودعك ما تعلمت و
فهمت و حفظت فرده إلى ساعة
حاجتي إليه ولا تنسنيه و افتح علىي
اللهم فتحا مبينا يا نور السماوات و
الأرض.

For any correction, suggestion or any useful information do
not hesitate to contact us: Histology434@gmail.com