

## Faculty of Oral & Dental Medicine

### Botany & Genetics

**Information :**

**Course Code :** SGS 131

**Level :** Undergraduate

**Course Hours :** 3.00- Hours

**Department :** Faculty of Oral & Dental Medicine

**Instructor Information :**

Title	Name	Office hours
Associate Professor	Maha Mohamed Youssef Khazendar	6
Lecturer	Mohamed Ahmed Mosa Mohamed	
Lecturer	Doaa Mohamed Nabwy Zarzour	
Assistant Lecturer	Sara Seleem Mahmoud Seleem	
Assistant Lecturer	Dina Magdy Abdel Salam Abdel Aziz	
Assistant Lecturer	Hussien Mohamed Hussien Hassan Ibrahim	
Assistant Lecturer	Eman Saeed Korany Muhammed Abdelatti	
Assistant Lecturer	Dina Abd El Hameid Hamdi Abd El Hameid	
Assistant Lecturer	Esraa Hafez Saad Hafez	
Teaching Assistant	Naglaa Awaad El Nagdy El Hadi	
Teaching Assistant	Michael Wafik Sami Androwes	
Teaching Assistant	Abdelfattah Ahmed Abdelkhalek Ahmed Soliman	
Teaching Assistant	Doaa Adel Hafez Ahmed Aboalinin	

**Area Of Study :**

- To raise awareness of the students to plant cell physiology
- To distinguish between different plant cell components microscopically
- Conduct experiments and be able to write a report
- Understand the use of plants in medicine

**Description :**

molecular biology (proteins, enzymes, DNA mutation, regulation of protein synthesis) genetics (genetic material, gene) and anatomy & morphology of seed plants (general structure of seed plants, variations in structure and development , seeds & seed germination)

**Course outcomes :**

**a.Knowledge and Understanding: :**

1 -	Provide the basic knowledge needed for botany science.
2 -	Identify the plant cell structure

3 -	Differentiate between living and nonliving components of the cell
4 -	Raise awareness of the students to plant cell physiology
<b>b. Intellectual Skills: :</b>	
1 -	Viewing the cellular world
2 -	Distinguish between different plant cell components microscopically.
3 -	Use the library and internet resources to develop independent study skills through assignments.
<b>c. Professional and Practical Skills: :</b>	
1 -	Identify cell structure of the plant.
2 -	Be able to use the microscope
3 -	Be able to draw specimens up to the microscopic scale
4 -	Conduct experiments and be able to write a report
<b>d. General and Transferable Skills: :</b>	
1 -	Apply the study of plant physiology and cell structure in the production of medicine.

<b>Course Topic And Contents :</b>			
<b>Topic</b>	<b>No. of hours</b>	<b>Lecture</b>	<b>Tutorial / Practical</b>
Plant cell structure	4	Plant cell structure	Plant cell structure
Living and non living components	4	Living and non living components	Living and non living components
Living and non living components	4	Living and non living components	Living and non living components
Physiology	4	Physiology	Physiology
Colloids	4	Colloids	Colloids
Colloids	4	Colloids	Colloids
Water transport	4	Water transport	Water transport
Water transport	4	Water transport	Water transport
Solute and solvent transport	4	Solute and solvent transport	Water transport
Solute and solvent transport	4	Solute and solvent transport	Solute and solvent transport
Enzymes	4	Enzymes	Enzymes

### **Teaching And Learning Methodologies :**

Lectures

Practical training

Demonstrations

Small group discussion

### **Course Assessment :**

Methods of assessment	Relative weight %	Week No	Assess What
1st Mid Term Examination	20.00	6	
2nd Mid Term Examination	20.00	10	
class work	20.00		
Final Written Examination	30.00		
Practical Examination	10.00		

### **Books :**

Book	Author	Publisher
No Book	no	no

### **Recommended books :**

Principles of Botany by Uno et al., 2007

Biology of plants by Peter Raven 2008