

The University of Jordan

Faculty: Pharmacy

Department: Pharmaceutical Sciences

Program:

Academic Year/ Semester: 2014-2015 / 1st

Course Name: Toxic and Hallucinogenic Plants (1201531)

Credit hours	2	Level Undergraduate		Pre-requisite	Pharmacy degree
Coordinator/ Lecturer		Office number		Office phone 23306	
Course website		E-mail s.olimat@ju.edu.jo		Place	

Office hours					
Day/Time	Sunday	Monday	Tuesday	Wednesday	Thursday
	8-9	11-1	8-9	11-1	8-10

Course Description:

This course aims at acquainting students with basic knowledge of toxic, hallucinogenic and narcotic plants.

The course involves two parts; the first part deals with toxic plants mainly those who are endemic to Jordan. Focus mainly on the toxic part(s), toxic constituents, symptoms of poisoning, treatment and precautions. The second part 2 deals with hallucinogenic and narcotic plants. Concentration on the narcotic and hallucinogenic materials, their effect on the brain, their side effects on the health in general.

Learning Objectives:

- **Understanding the toxic, hallucinogenic and narcotic plants.**
- **Acquainting knowledge of their effects on human health.**
- **Understanding type, shape, location and the hazardous of these plants.**

Intended Learning Outcomes (ILOs):

Successful completion of the course should lead to the following outcomes:

A. Knowledge and Understanding: Student is expected to:

- Understand the science of toxic and hallucinogenic plants
- Acquaint the knowledge of the constituents of plants and their effect on health and brain.

B. Intellectual Analytical and Cognitive Skills: Student is expected to:

- Generally define and investigate in the field the and disciplines related to study toxic and hallucinogenic plants
- Define, identify and evaluate of toxic and hallucinogenic plants

C. Subject-Specific Skills: Student is expected to:

- Acquaint practical knowledge of methods of identification, chemical and physical evaluation of toxic and hallucinogenic plants
- Evaluate the hazardous effects of toxic and hallucinogenic plants on human health and CNS.

D. Transferable Key Skills: Students is expected to:

- Work in a team as work group and discuss results with other colleagues. Know how to conduct a literature survey, access specific information about toxic and hallucinogenic plants as well as how to collect data of others research to prepare a group common reports.

ILOs: Learning and Evaluation Methods

ILO/s	Learning Methods	Evaluation Methods
Knowledge and Understanding	Lectures and Discussion	Exams
Intellectual Analytical and Cognitive Skills	Lectures and Discussion	Exams and Quiz
Subject-Specific Skills	Lectures and Discussion and Assignments	Project and Quiz
Transferable Key Skills	Assignments and Presentation	Presentation, and assignments.

Course Contents

Content	Reference	No. of lectures (1 each)
Part 1		
Introduction to poisonous plants		2
Removal of poisoning material		1
General antidotes		2
Plants containing Oxalates		1
Plants containing Cardiac glycosides		2
Plants containing Tropane alkaloids		1
Ricin toxicity		1
Plants containing toxic di- and triterpenoids		3
Poison Hemlock		1
Plants containing solanine alkaloids		1
Plants containing Pyrrolizidine alkaloid		1
Part 2		
Introduction to hallucinogenic and narcotic plants		1
CNS Neurotransmitters and their role with hallucinogenic and narcotic materials		2
Plants affecting dopamine neurotransmitter		2
Plants affecting γ-aminobutyric acid neurotransmitter		2

<u>Cannabinoid Receptors</u>		2
Amphetamine		1

Learning Methodology

Projects and Assignments

Evaluation

Evaluation	Point %	Date
Midterm Exam	30	
Project	15	
Quiz	5	
Final Exam	50	

Main Reference/s:

- Pharmacognosy, Phytochemistry, Medicinal Plants
By Jean Bruneton. , 1999.
- Trease and Evans ' Pharmacognosy''. 15th Edition; 2000.

- سليمان العليمات
كيمياء النواتج الطبيعية (القلويدات)
دار مجدلاوي للنشر والتوزيع- عمان- ٢٠١٥.