Faculty of Pharmacy

Farabi Quality Management of Education and Learning - 24/11/2020

University : Mansoura University

Faculty : Faculty of Pharmacy

Department :

1- Course data :-

Code:	PH417						
Course title:	Biostatistics						
Level:	Four						
Program Title:	• pharmaceutical sciences						
Specialization:	Major						
Teaching Hours:	**Theoretical:**	1	**Tutorial:**		**Practical:**	

2- Course aims :-

1. At the end of the course, the student will be able to make interpretation of any data using statistical analysis. Also the student can determine different methods of sampling, handle the results of different experimental and research studies using suitable statistical techniques.

3- Intended learning outcomes of course (ILO'S) :-

a- Knowledge and understanding

1. [a18] Distinguish the methods of statistical analysis and pharmaceutical calculations.

b- Intellectual skills

1. [b13] Interpret experimental data and published literatures, based on relevant chemical, pharmaceutical, statistical principles.

c- Professional and practical skills

1. [c11] Conduct experimental and research studies and present, analyze and interpret the results.

d- General and transferable skills

1. [d1] Communicate clearly by verbal and written means with patients and other health care professionals.
2. [d2] Retrieve and critically evaluate pharmaceutical information and clinical laboratory data from different sources to improve professional competencies.
3. [d3] Interact effectively in team working.
4. [d4] Exploit calculations and statistical methods as well as information technology (IT) tools.
5. [d5] Practice independent learning needed for continuous professional development.

4- Course contents :-

No	Topics	Week
1	Definition of Biostatistics	1
2	Methods of Data Collection & Presentation	2-4
3	Probability and Statistical Hypothesis (Null and Alternative Hypotheses)	5
4	Unpaired t test & paired t test	6-7
5	ANOVA	8
6	Chi Square	9
7	Correlation analysis & regression	10-11

5- Teaching and learning methods :-

S	Method	Knowledge and understanding	Intellectual skills	Professional skills	General skills
1	black board	a18	b13		d1,d2,d3,d4,d5
2	self learning	a18	b13	c11	d1,d2,d3,d4,d5
3	data show	a18	b13		d1,d2,d3

6- Teaching and learning methods of disables :-

1. not found

7- Student assessment :-

a- Student assessment methods

No	Assessment Method	Knowledge and understanding	Intellectual skills	Professional skills	General skills
1	theoretical exam	a18	b13		d1,d2,d3
2	practical exam	a18	b13	c11	d1,d2,d4
3	oral exam	a18	b13	c11	d1,d2,d3,d4,d5
4	midterm exam	a18	b13		d1,d3

b- Assessment schedule

No	Method	Week
1	theoretical exam	15
2	practical exam	12
3	oral exam	15
4	midterm exam	7

c- Weighting of assessments

No	Method	Weight
1	theoretical exam	50
2	practical exam	25
3	oral exam	15
4	midterm exam	10
Total		100%

8- List of references

S	Item	Type
1	Biostatistics notes	Course notes
2	Aviva, P. (2005): Medical Statistics at a Glance, Blackwell Company, 2nd, ed., Philadelphia	Books

9- Matrix of knowledge and skills of the course

S	Course contents	Knowledge and understanding	Intellectual skills	Professional skills	General skills
1	Definition of Biostatistics	a18	b13		d1,d3,d4

2	Methods of Data Collection & Presentation	a18	b13		d1,d2,d4
3	Probability and Statistical Hypothesis (Null and Alternative Hypotheses)	a18	b13	c11	d1,d2,d3
4	Unpaired t test & paired t test	a18	b13	c11	d1,d2,d3,d4,d5
5	ANOVA	a18	b13	c11	d1,d2,d3,d4,d5
6	Chi Square	a18	b13	c11	d1,d2,d3,d4,d5
7	Correlation analysis & regression	a18	b13	c11	d1,d2,d3,d4,d5

Course Coordinator(s): -

1. Ghada Mohamed Sedek Bostan

Head of department: -

Ghada Mohamed Sedek Bostan