

# Course specs physiology C

**Benha University**

**Faculty of Veterinary Medicine**

Program on which the course is given: **Bachelor of Veterinary Medical Sciences**

Department offering the course: **physiology**

Academic year / Level : 2nd year 1st term

Date of specification approval: Ministerial Decree No 921, on 15/9/1987

Date of Dept approval:

## **A- Basic Information**

**Title:** Physiology

**Code:** Vet 00614 b

No of Hours:

**Lecture: 3 h / W**

**Practical: 2 h / W**

**Total: 5 h / W**

## **B- Professional Information**

### **1 – Overall Aims of Course:**

The aim of the course is to provide the students with basic information about physiology of the Central nervous system, Autonomic nervous system, Endocrine system and cardiovascular system.

### **2 – Intended Learning Outcomes of Course (ILOs)**

#### **a-Knowledge and Understanding:**

After successful completion of this course the students should have the ability to:-

- a.1- Identify the different endocrine organs, hormones and their mechanism of action.
- a.2- Recognize the structure of the cardiovascular system including the heart and blood vessels and realize the different properties of cardiac muscle.
- a.3. Summarize the mechanism by which CNS and ANS work.
- a.4. Know reflex arc and reflex action and understand different type of reflexes

### **b-Intellectual Skills**

. After successful completion of this course the students should have the ability to:-

b.1- Determine the integrated function of the CNS and autonomic nervous systems in order to facilitate understanding of certain mechanisms of some diseases and their treatment

b.2.Enhance certain types of production by knowing functions and modes of action of some hormones

### **c-Professional and Practical Skills**

After successful completion of the course the students should be able to:

C1. practice how to measure blood pressure and pulse rate.

C2. perform dissection of the frog's heart to understand and study properties of cardiac muscles

### **d-General and Transferable Skills**

After successful completion of the course the students should be able to:

#### **Information technology skills**

- ▶ Using computers (word, spreadsheet, presentation, database)
- ▶ Conduct a search in digital library

- ▶ Communication skills: direct, ...etc.
- ▶ Self-learning skills (retrieve information from different sources independently)
- ▶ Working in a teamwork: recognizing and identifying views of others

### **3- Contents**

<b>Topic</b>	<b>No. of hours</b>	<b>Lecture</b>	<b>Practical</b>
<b>Physiology of the Autonomic Nervous System</b>	<b>12</b>	<b>5</b>	<b>7</b>
<b>Physiology of the Central Nervous System</b>	<b>24</b>	<b>10</b>	<b>14</b>
<b>Physiology of the Cardiovascular System</b>	<b>22</b>	<b>10</b>	<b>12</b>
<b>Physiology of the Endocrine System</b>	<b>17</b>	<b>5</b>	<b>12</b>

<b>Total</b>	<b>75</b>	<b>30</b>	<b>45</b>
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#### 4- content-ILOs matrix

Content	ILOs			
	Knowledge and understanding	Intellectual	Professional and practical	General and transferable
Physiology of the Autonomic Nervous System	a <sup>3</sup> ,		c <sup>4</sup> ,	d <sup>1,2</sup>
Physiology of the Central Nervous System	a <sup>3</sup> ,		c <sup>4</sup> ,	d <sup>1,2</sup>
Physiology of the Cardiovascular System	a <sup>3</sup> ,		c <sup>4</sup> ,	d <sup>1,2</sup>
Physiology of the Endocrine System	a <sup>3</sup>		c <sup>4</sup>	d <sup>1,2</sup>

#### 5- Assessment-ILOS matrix

Assessment	ILOs			
	Knowledge and understanding	Intellectual	Professional and practical	General and transferable

#### 6– Teaching and Learning Methods

Lectures and lab sessions in which one or more of the following facilities are used:

Lectures and lab sessions in which the following facilities are used:

- 4.1- Experimental animals.
- 4.2- Over head projector.
- 4.3- CD's, slides and video tapes.

**7- Student Assessment Methods**

- 5.1. Quiz to assess the understanding of the course.
- 5.2. Practical to assess practical skills.
- 5.3. Written exam to assess knowledge, understanding and intellectual skills.
- 5.4. Oral to assess understanding and transferable skills.

**Assessment Schedule**

Assessment 1	Mid term exams	Week 4,6,8,10,12.
Assessment 2	Practical exam	week 13
Assessment 3	Oral exam	Week 13
Assessment 4	Written exam	Week 15

**wighting of Assessments**

Quiz examination	10	%
Practical examination	30	%
Final- term examination	50	%
Oral examination	10	%
Other types of assessment	0	%
Total	100	%

**8- List of References**

**8.1- Course Notes**

Veterinary Physiology, Edited by M.E. Azab

**8.2- Essential Books (Text Books)**

1- Ruchebusch, Y., Phaneuf, I. and Dunlop, R (1991) Physiology of small and large Animals. B.C.Decker ,Inc, Philadelphia, Hamilton.

- 2- Swensonm M.J, Reece, W.O. and Comstock (1993) Duke's Physiology of Domestic Animals. 11th edition, publishing Associates a division of Cornell University press. Ithaca and London.
- 3- Gunningham, J. (1992) Text book of Veterinary Physiology. W.B. Saundero Company, Toronto, Montreal, Tokyo.
- 4- Guyton, A. (1991) Text book of Medical physiology. 8th, W.B. Saundero Company.
  
- 5- Ganong, W.F. (1989) Review of Medical Physiology. 9th (Middle East edition) Appleton and Lang.

8.3- Periodicals, Web Sites, ... etc

### **9- Facilities Required for Teaching and Learning**

Data show, Video Tapes. Kymographs, microscopes and ECG **Course Coordinator: Prof. Dr. M. E. Azab**

**Head of Department: Prof. Dr. M. E. Azab**

**Date**