University of the West of England
BRISTOL

# MODULE SPECIFICATION

| Part 1: Information | | | |
|---|---|---|---|
| Module Title | Anatomy and Physiology | | |
| Module Code | USSKNC-15-1 | Level | 1 |
| For implementation from | September 2018 | | |
| UWE Credit Rating | 15 | ECTS Credit Rating | 7.5 |
| Faculty | Health and Applied Sciences | Field | Applied Sciences |
| Department | Applied Sciences | | |
| Contributes towards | FdSc Biological Laboratory Sciences | | |
| Module type: | Standard | | |
| Pre-requisites | None | | |
| Excluded Combinations | None | | |
| Co- requisites | None | | |
| Module Entry requirements | None | | |

## Part 2: Description

This module will cover the following topics within the anatomy and physiology area:

Anatomical terminology as it relates to the following body systems: musculoskeletal, digestive, circulatory, respiratory, endocrine and nervous systems.

Structure of the heart and major blood vessels, and its relationship with the ventilation system.

The structure of the organs that make up the digestive system, and how their structures enable the specific functions.

Structure and function of the key endocrine organs and their relationship to homeostasis.

Introduction to the nervous system, including the electrochemical nature of nervous signals, membrane and action potentials, nerve conduction, synaptic transmission.

Introduction to the musculoskeletal system and its function.

This module aims to deliver specialist knowledge through taught lectures, inductive tutorials, seminars and practical sessions to promote application of knowledge acquired, analytical and problem-solving skills. Student learning will be further supported through both UCW and UWE E-Learning Environment, with provision of materials and activities to guide independent study.

## Part 3: Assessment

The assessment strategy has been designed to support and enhance the development of subject-based knowledge and practical skills, whilst ensuring that the learning outcomes are achieved.

Component A is a written 2 hour exam. This assessment will provide students with an opportunity to demonstrate both their knowledge on a broad range of topics through a series of short answer questions, and more in-depth knowledge though a selection of medium length questions. This assessment will test a range of the learning outcomes and will provide a valuable learning experience through demonstrating and applying knowledge which will be of benefit when progressing to years 2 and 3.

The coursework is comprised of a 1500 word essay which will require students to investigate the relationship between the respiratory, circulatory and digestive systems. This assessment will provide a valuable learning experience through independent research of published literature and development of academic writing style.

Opportunities for formative assessment and feedback are built into teaching and practical sessions, through discussion and evaluation of current research and review of past exam papers. Students are provided with formative feed-forward for their exam through a revision and exam preparation session prior to the exam and through the extensive support materials supplied through the E-Learning Environment.

All work is marked in line with the UWE generic assessment criteria and conforms to university policies for the setting, collection, marking and return of student work. Assessments are described in the module handbook that is supplied at the start of module.

| | | |
|---|---|---|
| Identify final timetabled piece of assessment (component and element) | **Component A** | |
| **% weighting between components A and B** (Standard modules only) | **A:** **50** | **B**: **50** |

| **First Sit** | |
|---|---|
| **Component A** (controlled conditions)<br>**Description of each element** | **Element weighting**<br>**(as % of component)** |
| 1. Written examination (2 hrs) | 100 |
| | |
| **Component B**<br>**Description of each element** | **Element weighting**<br>**(as % of component)** |
| 1. Essay (1500 words) | 100 |
| | |

| **Resit (further attendance at taught classes is not required)** | |
|---|---|
| **Component A** (controlled conditions)<br>**Description of each element** | **Element weighting**<br>**(as % of component)** |
| 1. Written examination (2 hrs) | 100 |
| | |
| **Component B**<br>**Description of each element** | **Element weighting**<br>**(as % of component)** |
| 1. Essay (1500 words) | 100 |
| | |

**Part 4: Teaching and Learning Methods**

**Learning Outcomes**

On successful completion of this module students will be able to:

Use and understand basic anatomical terminology (A, B)

Explain the physiological principles of key body systems, (A, B)

Undertake independent literature research on key physiological systems (B)

Explain relationships between the structure and function of key systems and their organs (A, B)

Understand practical techniques required for collection and handling, and relate outcomes to the relevant physiology (A)

**Key Information Sets Information (KIS)**

**Key Information Set - Module data**

*Number of credits for this module* 15

**Contact Hours**

| Hours to be allocated | Scheduled learning and teaching study hours | Independent study hours | Placement study hours | Allocated Hours |
|---|---|---|---|---|
| 150 | 60 | 90 | 0 | 150 |

**Total Assessment**

The table below indicates as a percentage the total assessment of the module which constitutes a;

**Written Exam**: Unseen or open book written exam
**Coursework**: Written assignment or essay, report, dissertation, portfolio, project or in class test
**Practical Exam**: Oral Assessment and/or presentation, practical skills assessment, practical exam (i.e. an exam determining mastery of a technique)

| | |
|---|---|
| Total assessment of the module: | |
| Written exam assessment percentage | 50% |
| Coursework assessment percentage | 50% |
| Practical exam assessment percentage | 0% |
| | 100% |

**Reading List**

The following book is recommended as it covers most of the module material at an appropriate level.

- Cohen, B.J. and Hull, K.L. (2015) Memmler's The Human Body in Health and Disease. 13th Ed. Philadelphia: Wolters Kluwer.

Extensive notes will be provided via blackboard on the scientific topics. Links to useful and credible websites will also be provided.

The students are also advised to consult the basic scientific texts in UCW, Frenchay and Glenside libraries, of which the following is a representative sample:

The latest editions of:

- Waugh, A and Grant, A. (2014) Ross and Wilson Anatomy and Physiology in Health and Illness. 14th Ed. Churchill Livingstone: London.
- Moore, K.L., Dalley, A.F. and M.R. Agur, A.M.R. (2009) *Clinically Oriented Anatomy.* Philadelphia, PA: Lippincott Williams & Wilkins.
- Agur, A.M.R., Dalley, A.F. (2012) Grant's *Atlas of Anatomy.* 13th Ed. Philadelphia, PA. Lippincott Williams & Wilkins.
- Patton, K.T. and Thibodeau, G.A. (2012) Anatomy *& Physiology* St. Louis, MO: Mosby Elsevier.
- Marieb E.N. (2011) Human *Anatomy & Physiology*. 9th ed. London: Pearson.
- Martini Ober (2011) Visual *Anatomy & Physiology*. San Fransisco, CA: Benjamin Cummings.
- Stanfield CL (2009) Principles *of Human Physiology*. 4th ed. London: Pearson Education Ltd.
- Silverthorn D (2010) Human *Physiology an Integrated Approach*. 5th ed. London: Pearson Education Ltd.
- Tortora, G.J. & Derrickson, B. (2010*) Essentials of Anatomy & Physiology*. 8th ed. Hoboken, NJ: Wiley.

**FOR OFFICE USE ONLY**

| | | | | |
|---|---|---|---|---|
| First SUVP Approval Date | 17/5/2018 | | | |
| Revision Approval Date | | Version | 1 | APDG approval form 26/1/2018 |