



# كيفية إعداد توصيف المقررات الدراسية للدراسات العليا

توصيف المقررات الدراسية يتضمن توضيح أقل المتطلبات الواجب توافرها في طالب الدراسات العليا للحصول على درجة الماجسـتير والدكتـوراه. يشمل توصيف المقرر الدراسي الاتي:

- الأهداف التعليمية للدرجة العلمية
- المعرفة والمهارات التي يجب أن يحصل عليها الطالب في نهاية فترة الدراسة والتدريب
  - طرق التدريس (مثال: محاضرات ، ورش عمل، تدريب معملي)
- محتويات المنهج العلمي (الموضوعات العلمية ومراجعها، عدد ساعات تدريس الجزء النظري والعملي والإكلينيكي)
  - طرق تقييم الطالب ( مثال: الامتحانات بكافة صورها، الحضور، المقال العلمي، log book)
    - نظام الامتحانات وكيفية توزيع الدرجا<mark>ت</mark>
      - طرق التقييم للمقرر الدراسي
      - المراجعة السنوية والمسئولين عنها.

## PROGRAMME SPECIFICATION FOR POSTGRADUATE DEGREE

This specification provides a concise summary of the main features of the course and the learning outcomes that a typical candidate might reasonably be expected to achieve and demonstrate if he or she takes full advantage of the learning opportunities provided. More detailed information on the specific learning outcomes, context and the teaching, learning and assessment methods of each module can be found in the Programme Descriptions Handbook.





# **COURSE SPECIFICATION**

# (Musculo-skeletal radiology)

# Faculty of Medicine- Mansoura University

# (A) Administrative information

1.39			
(1) Programme offering the course:	Msc degree of Radiology program		
(2) Department offering the programme.	Radiology Dpt.		
(3) Department responsible for teaching the course.	Radiology Dpt.		
(4) Part of the programme:	Second part		
(5) Date of approval by the Department's council	28/6/2016		
(6) Date of last approval of programme specification by Faculty council	9/8/2016		
(7) Course title:	Musculoskeletal radiology		
(8) Course code:	RAD 529 Tc		
(9) Total teaching hours:	٤٥		

## (B) Professional information

# (1) Course Aims:

The broad aim of the course is to provide the students with the basic principles of different radiologic imaging modalities used for musculoskeletal system examination, differential diagnosis of various pathological diseases and their radiologic appearance.

## (2) Intended Learning Outcomes (ILOs):

On successful completion of the course, the candidate will be able to:

#### A) Knowledge and Understanding

- A3. Demonstrate and express the radiologic appearance of different pathological diseases that affect the musculoskeletal system.
- A4. Recognize the Differential diagnosis between the various pathological conditions on the different imaging modalities.
- A5. Identify the clinical correlation between the radiologic appearance and the etiology, pathogenesis and clinical features of common neurological life threatening illnesses.
- A12. Be aware of and recognize the national code of ethics, medico-legal aspects, malpractice and common medical mistakes.

#### **B- Intellectual skills**

- B1. Integrate basic physical, technical and radiological principles with clinical history and data offered by the referring clinician to gather a full picture of the case available.
- **B2.** Reason deductively in solving clinical problems:
  - a. Pick up the abnormality in the film
  - b. Interpret the available data into a full radiologic report
  - c. Analyze and evaluate the results to exclude or suggest the necessity of further evaluation.
  - d. Decide the final diagnosis or differential diagnosis of the case.
  - e. Discriminate between technical errors, normal anatomical variants and pathology.
  - f. Suggest the imaging modality of choice best for evaluating the specific organ of interest.

- B3. Use personal judgment for critical and analytical problem solving and seek out information.
- B4. Recognize and cope with uncertainty that is unavoidable in medical practice by accepting and reacting with uncertain situation through proper counseling, consultation and referral.
- B5. Assemble advanced imaging modalities, scientific methods, regular conference attendance and computer & internet for research purposes.

#### C-Professional/practical skills

- C5. Develop communication skills with colleagues, various health and social care professionals.
- C6. Recognize limitations in knowledge and equipment and refer patients to an appropriately equipped facility.

#### **D- Communication & Transferable skills**

- D1. Use the different computer programs in the different units of the diagnostic radiology department and communicate efficiently with medical staff of other departments.
- D2. Retrieve, manage and manipulate information by all means, including electronic means to regularly updated with the recent technical innovations.
- D3. Present information clearly in the form of written radiology reports, electronic and oral forms.
- D4. Attend interactive case study sessions and express ideas and effective arguments about debatable cases.
- D5. Work efficiently within a team work to reach the goal of a research.
- D6. Analyze and use numerical data (including the use of simple statistical methods) to assess the results of a number of case studies and assess the efficiency of a certain imaging modality in the radiologic characterization of a certain organ disease.

## 3) Course content:

Subjects	Lectures	Clinical	Total Teaching Hours
- AVN & Paget's	1	2	
- Metabolic &	1	2	
endocrine	1	2	
- Infection	2	4	
- Arthritis	1	2	
- Oncology	2	4	
- Bone marrow	1	2	
- Trauma	1	2	
- Shoulder	1	2	
- Knee	1	2	
- Hip	1	2	
- Elbow & TMJ	1	2	
- Ankle	1	2	
- Wrist	15	30	Total time = 45 Hrs.

## 4) Teaching methods.

- 4.1. Lectures
- 4.2. Meetings
- 4.3. Case presentations
- 4.4. Video demonstrations

# 5) Assessment methods.

- **5.1: Written examination for assessment of** knowledge and intellectual skills.
- **5.2: Structured oral examination for assessment of** knowledge and intellectual skills.
- **5.3: OSCE examination for assessment of** practical and communication skills.
- **5.4: MCQ examination for assessment of** knowledge and intellectual skills.
- **5.5:** Log book for activities for assessment of: mainly for assessment of practical & transferable skills which are accepted through attending different conferences, thesis discussions, seminars, workshops, attending scientific lectures as well as self learning.

- **5.6:** The supervisor requires certain assignments: meetings and case presentations that are evaluated and signed by the supervisors in the log book (without marks).
- **5.7: Meetings:** the candidate should prepare and present at least one seminar in a topic related to the course and determined by the supervisors in front of the department staff (without marks).

Assessment schedule.

Written exam. After the candidate finishes all semesters

OSCE exam After the candidate finishes all semesters

MCQ 15 weeks after the start of the semester

Percentage of each Assessment to the total mark.

Written exam. 60 %.

OSCE exam: 10%::

Structured oral exam: .30%...

MCQ:

Other types of assessment: ----

Other assessment without marks: log book

- 6) References of the course.
- 6.1. Hand books.
- 6.2: Text books: Textbook of Radiology and Imaging, David Sutton.
  - Musculoskeletal MRI; Kaplan.
- 6.3: Journals: www.MsskR.com

www.radiology.com

www.radiographics.com

# 6.4. Websites. www.medcyclopaedia.com www.radiopaedia.com www.learningradiology.com.

#### 6.5. Others.

- 7) Facilities and resources mandatory for course completion:
  - Lecture rooms: available in the department
  - Facilities for image analysis
  - Computers for data analysis
  - Data show facilities
  - Video demonstrators

#### Course coordinator.

- D. Eman Abd El Salam
- D. Nehal ElBatooty

Head of the department: Prof. Dr/ Mahmoud Abd Elshaheed Date: