Quality Assurance Unit

TantaUniversity

Faculty of Medicine

Department of Medical Parasitology

Course Specifications

Medical Parasitology third year

2016-2017

Medical parasitology, third year Course specifications

University: Tanta **Faculty: Medicine** **Department: Medical Parasitology**

1- Administrative Information

1. **Course title: Medical Parasitology**
2. **Code: TMED.03:04**
3. **Department offering the course: Parasitology Department**
4. **Program (s) on which this course is given: M.B.B.Ch**
5. **Departments offering the program: All departments of Tanta Faculty of Medicine**
6. **Academic year/ Level : 3rd year of M.B.B.Ch**
7. **Semester in which the course is given: All the academic year**
8. **Date of specifications /revision: 31 /8 /2016**
9. **Date of approval by department council :4 /10 /2016**
10. **Date of approval by faculty council: / /2016**
11. **Taught hours: in 30 weeks**
    - **Lectures: 60 hours : (2hrs/week)**
    - **Practical: 60 hours: (2hrs/week)** **Extra added hours: Tutorial: 30 (1hr/week)**
    - **Total : 120 hours (4hrs/week)**

2 – Overall Course Aims

1- To help the studentsto acquire knowledge concerning biological, epidemiological and ecological aspects of parasites causing diseases to humans.
2- To develop students' awareness of the pathogenesis, clinical presentations and complications of these parasitic infections.
3- To help the students to select the diagnostic methods in order to reach the final proper diagnosis.
4- To help the students to know the general outline of treatment, the best drug of choice, prevention and control of parasitic diseases.
5- To develop students' knowledge about endemic parasitic problems and their impact upon health

3– Intended learning outcomes (ILOs):

a- Knowledge and understanding:

At the end of this course the student should be able to:

a1. Specifyvarious aspects of parasites of medical importance as Geographical distribution andepidemiologic principles and describe the morphology and life cycle.

a2. Explainhowthe previous aspects together with the social and demographic patterns could help incausation, propagation and maintenance of each parasitic disease.

a3. Recognize the pathogenesis of parasitic infections and relate the stage of the life cycle to its pathogenesis and clinical manifestations.

a4. Describe the clinical manifestations and recognize differential diagnosis and complications of parasitic diseases.

a5. Recognizethe scientific basis of the conventional and up-to-date diagnostic procedures needed to carry out accurate diagnosis of common parasitic diseases with emphasis on their prioritization in management plans.

a6. List the effective therapeutic measures of parasitic infections and alsodescribe how to prevent and control parasitic diseases.

a7. Identify common arthropods of medical interest and recognize their medical importance and methods of combat.

b- Intellectual skills

At the end of this course the student should be able to:

b1. Point out the most appropriate and cost effective diagnostic laboratory investigations for each parasitic infection to reach the proper final diagnosis within short time.

b2. Integrate the most important signs and symptoms of important parasitic infections and the laboratory test findings into a meaningful diagnostic significance (using case study) .

b3. Express systemic thinking and personal judgment for differential diagnosis with prioritization of the common possibilities for each parasitic infection.

c- Professional & practical skills:

At the end of this course the student should be able to :

c1. Practice the examination of mounted slides microscopically to identify**,** draw and labeldiagrams of parasites and their different stages (eggs, cysts, larvae, trophozoites) or any of their body parts (segment, hooks, scolices…etc).

c2. Practice the examination of some parasites or their stages (e.g. hydatid cyst) macroscopically for their identification and drawing.

c3. Practice the examination of the whole body or any part of arthropods of medical importance (in boxes or mounted slide) in order to identify them.

d- General transferable, Professional attitude and communication skills:

At the end of this course the student should be able to:

d1. Ensure the ability for health education in conjunction with prevention and control of parasitic diseases.

d2. Acquire self and lifelong learning using the available electronic facilities to update his/her knowledgeand gain presentation abilities (present information clearly in written, electronic and verbal forms).

d3. Work collaboratively in a team,adopt ethical behavior and respect the role of staff and co-staff members regardless of degree or occupation.

4- Topics (Contents of the course)

Topic	No. of hrs.			
	Lectures	Practical	Total	Small groups
	60	**60**	**120**	**30**
I-Introduction to parasitology: -Host-parasite relationship -Types of parasites -Types of hosts.	**1**		**1**	
Trematodes&cestodes	**12**	**12**	**24**	**6**
Introduction to trematodes	**1**			
- Fasciola species	**1**	**2**		
- Heterophyesheterophyes	**1**	**2**		
- Schistosoma species	**3**	**2**		
-Snails	**1**	**1**		
-Taenia species	**1**	**2**		
-Cysticercosis&Ecchinococcus species + hydatid disease	**2**	**2**		
Hymenlepis spp.	**1**	**1**		
Diphyllobothrium latum	**1**			
Nematodes	**13**	**18**	**31**	**9**
Introduction to cestodes	**1**			
- Entrobiusvermiicularis	**1**	**2**		
- Ascarislumbricoides	**1**	**2**		
- Trichuristrichiura	**1**	**2**		
Ancylostomadoudenale	**1**	**2**		
- Trichostrongyluscolubriformis	**1**	**2**		
- Stongyloidesstercoralis	**1**	**2**		
- Capillariaphilippinensis	**1**	**2**		

Topic	No. of hrs.			
	Lectures	Practical	Total	Small groups
- Trichinellaspiralis	1	2		
- Filariae	3	2		
- Larva migrans	1			
Protozoa	**17**	**16**	**33**	**8**
- Introduction to protozoa	1			
Amoebae	1	2		
- Potentially pathogenic free-living amoebae	1			
- Balantidium coli	1	2		
- Giardia lamblia	1	1		
-Trichomonasvaginalis	1	1		
- Leishmania species	2	2		
- African trypanosomes	2	2		
- Plasmodium species (vivax& falciparum)	2	2		
Intestinal coccidian	2	2		
- Toxoplasma gondii	1	2		
Revision	2			
- Entomology	**9**	**14**	**23**	**7**
Introduction to entomology	1			
- Mosquitoes & their control	2	2		
- Phlebotomuspapatsii + Muscidae, Calliphoridae&Myasis	2	4		
- Fleas, Lice, Bugs,	2	4		
- Ticks & Mites + Cyclops	2	4		
- Immunology -As regards the immunopathology of parasitic infections, parasite immune evasion and immunodiagnosis of parasiticinfections.	**2**		**2**	
- Diagnostic techniques	**2**		**2**	
- **Miscellaneous** e.g.Parasites causing symptoms complexes, (diarrhoea, dysentery, anaemia,	**4**		**4**	

Topic	No. of hrs.			
	Lectures	Practical	Total	Small groups
fever), opportunistic parasites etc.				

5-Teaching and learning methods

5.1 Lectures: 2 hours / week (Student-centered teaching).

5.2 Practical classes: 2 hours / week.

5.3 Tutorials: 1 hour / week - The students are divided in groups, each of 15

5.4 E learning: an electronic copy of the course is available on line.

5.5 Log book including research assignmentand practical notebook to draw, sketch and classify different Parasites.

7-Student Assessment :

a) Methods used

.1- Written exam: (3 hours): to assess a1-a7, b1-b3, and d1

.2- Practical exam: to assess c1- c3

.3- Oral exam: (one session): to assess a1-a7, b1-b3 and d3

.4-Research assignment: to assess d1- d3

5- Practical notebook and student-centered teaching: to assess c1-c3

b) Assessment schedule التوقيت

Assessment	Week
1- Mid-year exam.: One-hour written examination composed of MCQs, true or false, matching, enumerate, explain why, drawing & labeling…etc	The second week of **February / 2017**
2- Periodical examinations: 2 Quizzes	One after finishing helminthology and one

	after protozoa
3- Practical exam: Identification of parasites & their different stages by data show and microscopically + macroscopical identification of parasites in boxes and Jars	**April / 2017**
4- Student–centered teaching: The students prepare and present the lecture under the supervision of their professors.	**All the academic year**
5-Research assignment: **a-**Preparing and presenting data shows and posters on the life cycles of the endemic parasites in Egypt and how to prevent and control the parasitic diseases provided with illustrations and presented clearly in written, electronic and verbal forms for primary school children.	
6- Final exam: Three -hours written examination composed of short essay questions, MCQs, explain why, case report, drawing & labeling and problem solving…etc**.**	Once at the end of academic year,**May 2017**

c) Weighing of assessments (توزيع الدرجات)

Exam	Marks	% of Total
Mid-year examination	15	10%
Final year examination	75	50%
Oral examination	20	13.33%
Practical/laboratory work	25	16.67%
Periodical examinations	6	4%
Student-centered teaching	5	3.33%
Other types of assessment (research assignments)	4	2.67%
Total	**150**	**100%**

D- Attendance criteria:

1. 1. Practical attendance: Students should be according to the Faculty bylaws attending at least 75% of the Practical course otherwise the student will be not able to attend the practical exam.
2. 2. Log books: It is used to register daily attendance besides the requested activities and assignments which must be done.

3. The continuous assessment must be fulfilled before the final exam. **The students with accepted excuse will be subjected to another evaluation before the final exam.**

E- Grading System

Examination	Topic	Description	Marks
Midterm exam	Written	One-hour written examination composed of MCQs, true or false, matching, enumerate &, explain why, drawing & labeling…etc	15marks
Practical exam		Identification of parasites & their different stages by data show and microscopically + macroscopical identification of parasites in boxes and Jars	25
Final Examination	Written	Three -hours written examination composed of short essay questions, MCQs, explain why, case report, drawing & labeling and problem solving.	75
	Oral exam		20
Quiz		2 quizzes composed of MCQs, true or false, matching, explain why, drawing & labeling…etc	6
Student-centered teaching		The students prepare and present the lecture under the supervision of their professors.	5
Assignments & other activities		a- Preparing and presenting data shows and posterson the life cycles of the endemic parasites in Egypt and how to prevent and control the parasitic diseases provided with illustrations and presented clearly in written, electronic and verbal forms for primary school children.	4

8- List of references

8.1 Course notes

- Department books
- Practical and self-evaluation book.
- A colour atlas.

- Hand outs.
- E learning: an electronic copy of the course is available on line.
- Microscopic slides photos are available on line.

8.2 Text books

1- Basic Clinical Parasitology: By H.W., Brown, F.A. Neva (2005)

2- Medical Parasitology: By E.K., Markell; M.A., Marietta Voge and D.T., John.(2007)

8.3 Recommended books:

1. Topley&Wilson's microbiology & microbiological infections By F.E.G. Cox, Derek Wakelin, Stephen H. Gillespie and Dickson D. Despommier (2009)

2. Colour Atlas of Tropical Medicine and Parasitology By W. Peters& H.M. Gillies(1989).

3. Atlas of Medical Helminthology and Protozoology. By H.C. Jeffrey, R.M. Leach and G.O. Cowan,3rded., Churchil Livingstone (2002).

8.4 Periodicals and web sites

1- Parasites online:http://WWW.parasitesonline.net/homepage.htm.

2- http://WWW.asp.unl.edu.

3- http://WWW.parasitology.org.uk

4- http://WWW.dpd.cdc.gov/dpdx

5- http://WWW.cvm.okstate.edu/~users/jcfox/htdocs/clinpara/index.htm

6- http://WWW.parasite.biology.Qiowa.edu.

7- http://www.parasites on line.

8- http://www.Tanta.edu.Eg/ar1/medicine1/para.Htm/index htm.

9- http://www.Tanta.edu.Eg/ar1/medicine1/para.Htm/para htm.

We verify that the above Course and the analysis of students and external evaluator opinions are accurate.

Course coordinator and head of department
name:……..signature: Date / /2016

Head of quality assurance unit: name……..signature…….Date / /2016…….

(A)Intended learning outcomes of the course

Academy / University:Tanta
Faculty: Medicine
Department: Parasitology

The name of course	Medical Parasitology
Code of course	TMED.03:04

Topics of the course	Total hours (lecture+practical) + research assignment	Knowledge & Understanding	Intellectual Skills	Practical (Professional) skills	General transferable skills, attidude and communication skills
Introduction, Trematodes and Cestodes	25	A1-A6	B1-B3	C1 &C2	D1
Nematodes	31	A1-A6	B1-B3	C1 &C2	D1
Protozoa	33	A1-A6	B1-B3	C1 &C2	D1
Entomology	23	A7		C3	D1
Immunology	2	A5	B1		
Diagnostic techniques	2	A5	B1		
Miscellaneous (parasites causing symptom complex as diarrhoea, dysentery, hepatosplenomegaly, menigoencephalitis, fever, anaemia…etc	4	A4	B2&B3		
tnemngissa hcraeser (tcejorp)		a1-a7			D2 & D3
Total	**120**	**100%**	**100%**	**100%**	**%100**

- ILO's of the course were 100% achieved by lectures, research assignment and practical lessons

Course coordinator: SirriaElmarhoumy Head of the department: SamyElkorany

The name of course	Medical Parasitology
Code of course	TMED.03:04

Academy / University: Tanta
Faculty: Medicine:
Department: Parasitology

Matrix of the course ILO,s with the Program ILO,s

Course ILOS \ program ILO		knowledge & understanding					Intellectual skills					Professional & practical skills					General , transferable, Professional Attitude and communication skills				
knowledge & understanding	a.1.	a13																			
	a.2.	a5	a13																		
	a.3.	a5																			
	a.4.	a10																			
	a.5.	a6																			
	a.6.	a11																			
	a.7.																				
Intellectual skills	b.1.						b2														
	b.2.						b5														
	b.3.						b4														
Professional & practical skills	c.1.											c1 e									
	c.2.											c1 e									
	c.3.											c1 e									
General , transferable, Professional Attitude and communication skills	d.1.																d8				
	d.2.																d12	d13	d14		
	d.3.																d15	d25			