



<b>Course Code</b> MED-205	<b>Course Title</b> Integrated Clinical Practice I	<b>ECTS CREDITS</b> 6
<b>School</b> Medical School	<b>Semester</b> Fall (Semester 3)	<b>Prerequisites</b> Completion of Year 1
<b>TYPE OF COURSE</b> Required	<b>Field</b> Medicine	<b>Language of Instruction</b> English
<b>Level of Course</b> Undergraduate	<b>Year of Study</b> 2nd	<b>Course Lead</b> Dr Evie Vassiliou
<b>Mode of Delivery</b> Face-to-face	<b>Work Placement</b> Clinical visits	<b>Co-requisites</b> None

### Objectives of the Course:

This course will introduce students to the basic clinical and communications skills required for medicine. Furthermore students will meet, under supervision, selected patients in the local hospitals and clinics to practise these basic skills.

**Clinical Skills:** Students, in small groups, will practise some of the basic aspects of clinical skills in medicine using mannequins. All clinical examinations will be peer examinations i.e. the students will be examining each other.

**Communication Skills:** Students, in small groups, will learn the basic principles of patient doctor communication, and will learn how to gather information from a patient and how to give information to a patient.

**Clinical Placements:** Students will attend two clinical placements on **diabetes** and **hypertension**

**Workshops:** Students will attend three workshops on **diabetes, hyperlipidaemia** and **hypertension**

In addition to the above additional lectures, clinical reasoning sessions, tutorials and workshops will be scheduled to enhance the learning experience and to re-visit some topics covered in year 1 (spiral learning). These sessions will be in the areas of **professionalism, research methods and essential medical statistics** and **medical psychology**.

### Learning Outcomes:

The following list provides the learning objectives that will be covered in sessions of each week:

#### Week 1

#### **LOBs covered during communication skills sessions:**

1. Discuss the importance of good communication skills in medical consultations.

2. List some basic evidence in the area of clinical communication.
3. List and discuss some basic evidence regarding the benefits of good communication for doctors and patients.
4. Familiarize yourselves with the Calgary Cambridge Guide (CCG) to consultation skills
5. Practice opening the medical consultation and gaining consent.

***LOBs covered during clinical skills sessions:***

6. Discuss and outline what clinical skills are.
7. Discuss and outline the core principles of a systematic examination.
8. Discuss and practice safe disposal of material from the clinical setting.
9. Discuss the importance of good hand hygiene and practice effective hand washing technique.

***Additional lectures, tutorials and workshops:***

***Lobs for lecture 'Empathy and its importance in doctor patient relationships' (Medical Psychology - Dr Stelios Georgiades):***

10. Explain the definitions of cognitive empathy and sympathy and identify the differences between the two.
11. Outline the most up to date research evidence on the impact of empathy on patient outcomes.
12. Outline, based on current research evidence, the changes medical students' empathy undergoes during an undergraduate medical degree.

**Week 2**

***NO communication skills this week***

***LOBs covered during clinical skills sessions:***

13. Perform and practise measurement of temperature, blood pressure, pulse, respiratory rate.
14. Perform urinalysis with the urine dipstick and practise interpreting the results.

**Week 3**

***LOBs covered during communication skills sessions:***

15. Discuss the basic skills for structuring the consultation based on the CCG.
16. Practice the skills for structuring a medical consultation (role playing).

***LOBs covered during clinical skills sessions:***

17. Perform Basic Life Support (BLS) on a mannequin effectively and safely and pass the BLS exam.
18. Practise and perform the recovery position on a colleague.

***Additional lectures, tutorials and workshops:***

***Lobs for lecture 'Professionalism in Medical Practice' (Professionalism - Dr Paola Nicolaidis):***

19. Define the elements that constitute Professionalism in Medical Practice.

20. Outline the basis of professional behaviour of doctors and medical students in relation to their clinical practice.

#### Week 4

##### **LOBs covered during communication skills sessions:**

21. Continue revising the basic skills for structuring the consultation based on the CCG.
22. Introduce SOCRATES.
23. Practice pain history taking using SOCRATES.

##### **LOBs covered during clinical skills sessions:**

24. Discuss the basic principles of the cardiovascular examination (CVS).
25. Practise on a colleague general inspection, inspection, palpation, percussion and auscultation of the CVS.

##### **Additional lectures, tutorials and workshops:**

##### **LOBs covered during hypertension workshop:**

26. Outline primary and secondary prevention of hypertension (Hypertension Workshop).
27. Describe the principles of management of hypertension (Hypertension Workshop).

#### Week 5

##### **LOBs covered during communication skills sessions:**

28. Discuss the basic elements of building a relationship with a patient and structuring the consultation based on the CCG with an emphasis on appropriate non-verbal communication.
29. Outline the relevant content of the CVS history.
30. Discuss the main skills for exploring a patient's problems related to CVS using the CCG.
31. Practice the main skills for exploring a patient's problems related to CVS using the CCG.

##### **LOBs covered during clinical skills sessions:**

32. Perform a cardiovascular examination on a colleague in a systematic way.

##### **Additional lectures, tutorials and workshops:**

##### **Lobs for lecture 'Validity and reliability of assessment tools' (Research methods and essential medical statistics - Dr Alexandros Heraclides):**

33. Differentiate between the concepts of validity and reliability (lecture)
34. Describe the major types of validity and reliability (lecture)
35. Evaluate the validity and reliability of different assessment tools (tutorial)

##### **Lobs covered during clinical placement (PTS on Hypertension)**

36. Explain the aims of management of Hypertension in Primary Care.
37. Describe the strong risk factors for the development of Hypertension and the key diagnostic factors for this disease).
38. Interview and perform a hypertension check on a patient.

39. Describe how a Hypertensive patient should a) monitor their blood pressure and b) comply with their medication scheme and lifestyle modifications.
40. Discuss the management of a patient with Hypertension.

## Week 6

### **LOBs covered during communication skills sessions:**

41. Discuss the basic elements of building a relationship with a patient and structuring the consultation based on the CCG, with an emphasis on developing rapport.
42. Outline the relevant content of the Peripheral Vascular Disease (PVD) History.
43. Discuss the main skills for exploring a patient's problems related to PVD using the CCG.
44. Practice the main skills for exploring a patient's problems related to PVD using the CCG.

**Written reflective assignment: Please write a reflective paragraph, no more than 300 words, on what you have learned so far and the areas you would like to improve in.**

### **LOBs covered during clinical skills sessions:**

45. Describe and identify the surface anatomy of the limb arteries.
46. Describe the pulses of the limbs.
47. Perform and practise a full peripheral vascular system examination of the arterial aspect in a systematic way on a colleague.

### **Additional lectures, tutorials and workshops:**

#### **Lobs for lecture 'Psychological aspects related to cardiovascular conditions (Medical Psychology - Dr Stelios Georgiades):**

48. Identify the psychosocial factors contributing to the development of cardiovascular disease.
49. Outline the impact that psychosocial factors have on cardiovascular disease.
50. Describe current psychological interventions for cardiovascular disease.
51. Outline the efficacy of psychological interventions in contributing to the treatment of cardiovascular disease.
52. Identify psychological conditions often considered to be linked to cardiovascular disease and the impact of psychological interventions in their treatment.

## Week 7

### **LOBs covered during communication skills sessions:**

53. Discuss the basic elements of building a relationship with a patient and structuring the consultation based on the CCG with an emphasis on involving the patient.
54. Outline the relevant content of the respiratory history.
55. Discuss the main skills for exploring a patient's problems related to respiratory history, using the CCG.
56. Practice the main skills for exploring a patient's problems related to respiratory history, using the CCG.

57. Discuss the contents of a social history and practice gathering social history information.

**LOB covered during clinical skills sessions:**

58. Perform and practise the respiratory examination on a colleague in a systematic way.

**Additional lectures and workshops:**

**Lobs for lectures on 'Systematic reviews and meta-analyses' (Research methods and essential medical statistics – Dr Alexandros Heraclides):**

59. Describe the main concepts of systematic reviews and meta-analyses (lecture on research methods and essential medical statistics).
60. Describe the importance and usefulness of systematic reviews and meta-analyses in medicine (lecture on research methods and essential medical statistics).
61. Use the PICO process to frame a clinically relevant research question (lecture on research methods and essential medical statistics).
62. Familiarize with the main scientific search engines (PubMed, Cochrane Library) used for seeking evidence relevant for the biomedical sciences. (Lecture on research methods and essential medical statistics).

**Lobs for lecture 'Psychological aspects related to respiratory conditions' (Medical Psychology - Dr Stelios Georgiades):**

63. Identify the psychosocial factors contributing to the development of respiratory infections and asthma.
64. Describe current psychological interventions for respiratory conditions.
65. Outline the efficacy of psychological interventions for respiratory conditions.

**Lobs covered during clinical placement (Hyperlipidaemia Specific Workshop)**

66. Outline primary and secondary prevention of hyperlipidaemia.
67. Describe the principles of management of hyperlipidaemia.

**Week 8**

**LOBs covered during communication skills sessions:**

68. Discuss the content of information gathering based on the disease-illness model.
69. Continue exploring elements of building the relationship with a patient with an emphasis on eliciting a patient's ideas, concerns and expectations (ICE) based on the CCG.
70. Outline the relevant content of a gastrointestinal (GI) history.
71. Discuss and practice the main skills necessary in gathering a GI history from a patient.

**LOBs covered during clinical skills sessions:**

72. Identify and describe the anatomical landmarks and surface lines that overlie the major abdominal organs.
73. Perform an abdominal examination on a colleague in a systematic way.
74. Discuss the principles of an examination in the acute setting (acute abdomen examination).

**Additional lectures, tutorials and workshops:**

**Lobs for lectures on 'Systematic reviews and meta-analyses' (Research methods and essential medical statistics – Dr Alexandros Heraclides):**

75. Interpret a forest plot, including the pooled (meta-analysed) estimate and heterogeneity between studies (lecture on research methods and essential medical statistics).
76. Describe the strengths of systematic reviews and meta-analyses over individual studies (lecture on research methods and essential medical statistics).

**Lobs for tutorial on 'Systematic reviews and meta-analyses' (Research methods and essential medical statistics – Dr Alexandros Heraclides):**

77. Systematically search the literature on a specific research topic using PubMed (tutorial on research methods and essential medical statistics). Systematically search the literature on a specific research topic using PubMed.
78. Use the results from a forest plot to make evidence-based decisions regarding the effectiveness of a treatment regime (tutorial on research methods and essential medical statistics).

**Week 9**

**LOBs covered during communication skills sessions:**

79. Discuss the basic elements of building a relationship with a patient and structuring the consultation based on the CCG, with an emphasis on clinical empathy (RAV).
80. Outline the relevant content of the Endocrine History.
81. Discuss the main skills necessary in gathering an Endocrine History from a patient using the CCG.
82. Practice the main skills necessary in gathering an Endocrine History using the CCG.

**LOBs covered during clinical skills sessions:**

83. Discuss the principles of an intimate examination.
84. Perform a rectal examination on a model.

**Additional lectures, tutorials and workshops:**

**Lobs for lecture 'Psychological factors related to gastrointestinal health' (Medical Psychology - Dr Stelios Georgiades):**

85. Describe the physiological basis for the relationship between psychological factors and gastrointestinal health.
86. Outline the role of stress in gastrointestinal functions and illness.
87. Outline the role of psychosocial factors in gastrointestinal disorders.

**Week 10**

**LOBs covered during communication skills sessions:**

88. Discuss the basic elements of building a relationship with a patient and structuring the consultation based on the CCG with an emphasis on explanation and planning.

89. Discuss the main skills necessary in giving information to a patient with endocrine problems based on the CCG.
90. Practise the main skills necessary in giving information to a patient with endocrine problems using the CCG.

***LOBs covered during clinical skills sessions:***

91. Perform and practise the thyroid status assessment.
92. Perform and practise the thyroid gland examination on a colleague in a systematic way.
93. Perform an examination of the lymph nodes of the neck.

**Week 11**

***LOBs covered during communication skills sessions:***

94. Discuss the basic elements of building a relationship with a patient and structuring the consultation based on the CCG with an emphasis on achieving shared understanding.
95. Discuss the basic elements of closing the medical consultation.
96. Revise the main skills necessary in giving information to a patient with Endocrine problems, based on the CCG.
97. Continue practicing the main skills necessary in giving information to a patient with Endocrine problems, using the CCG.

***LOBs covered during clinical skills sessions:***

98. Perform and revise urinalysis.
99. Practise measuring blood glucose using a glucometer.
100. Discuss the metabolic syndrome and practise measuring the Body Mass Index (BMI) and explain its significance.
101. Discuss the complications of the diabetic foot.
102. Discuss the importance of sharps SAFETY.
103. Discuss the protocol for needle stick injuries.
104. Practise phlebotomy (obtain a blood sample) from a mannequin.
105. Identify areas that need improvement and further practice.
106. Revise in an OSCE format way, skills that will be identified by students as areas for improvement (4 stations in total and there will be rotation by the students every 20 minutes).

***Additional lectures and workshops:***

***Lobs for lecture 'Psychological aspects of intimate physical examinations' (Medical Psychology - Dr Stelios Georgiades):***

107. Outline the importance of intimate physical examination (lecture on medical psychology).
108. Describe the emotions associated with intimate physical examinations (lecture on medical psychology).
109. Outline the potential psychological impact that intimate physical examinations have on patients (lecture on medical psychology).

***Lobs for lecture 'Psychological aspects of Endocrine related disorders' (Medical Psychology - Dr Stelios Georgiades):***

110. Describe the major links between endocrine disorders and psychosocial wellbeing.
111. Outline the main issues associated with the use of hormonal treatments.

**Lobs on Type 2 Diabetes Mellitus Workshop (Dr George Athanasiou):**

112. Describe primary and secondary prevention of Type 2 diabetes mellitus.
113. Describe the principles of management of Type 2 diabetes mellitus.

**Lobs for clinical placements (PTS Diabetes)**

By the end of the visit, students should be able to:

114. Explain the aims of diabetic care in Primary Care.
115. Describe the strong risk factors for developing Type 2 diabetes mellitus and the key diagnostic factors.
116. Interview and perform a diabetic check on a patient.
117. Describe how a patient should a) monitor their glucose and b) administer their insulin.
118. Discuss the management of a patient with Type 2 Diabetes Mellitus.

**Week 12**

**LOBs covered during communication skills sessions:**

119. Identify areas of clinical communication that have been covered so far that need improvement.
120. Revise the skills that could help refine the areas that need improvement.

**Formative OSCE, Friday December 08, 2017**

**Course Contents:**

**Topics covered in communication skills:**

1. Introduction to communication skills.
2. Structuring the medical consultation I
3. Structuring the medical consultation II – Pain history (SOCRATES)
4. Building the relationship with the patient - CVS history
5. Building the relationship with the patient-PVD history
6. Involving the patient – Gathering a social history from a patient with respiratory problems
7. Building the relationship with the patient using ICE – GI history
8. Building the relationship with the patient using RAV – Endocrine history
9. Building the relationship with the patient with an emphasis on explanation and planning – Giving information to a patient with Endocrine problems
10. Building the relationship with the patient with an emphasis on explanation and planning – Achieving shared understanding by incorporating the patient’s perspective

**Topics covered in clinical skills:**

1. Introduction to clinical skills.
2. Vital Signs and urinalysis
3. Basic Life Support

4. Intro to the Cardiovascular system (CVS) exam
5. Cardiovascular System (CVS) Examination (HYPERTENSION CLINICAL SKILLS WORKSHOP)
6. Peripheral Vascular System (PVD) Examination
7. Respiratory System Examination
8. Abdominal Examination
9. Rectal Examination
10. Thyroid Gland Examination
11. DIABETES CLINICAL SKILLS WORKSHOP
12. Phlebotomy

**Topics covered in other lectures, tutorials and Workshops:**

**Workshops:**

1. Hypertension Workshop (week 4).
2. Hyperlipidaemia Specific Workshop (week 7).
3. Type 2 Diabetes Mellitus Workshop (week 11).

**Clinical Placements:**

**2 protected time sessions (PTS):**

1. Hypertension.
2. Diabetes.

**Lectures & Tutorials:**

***Professionalism (Dr Paola Nicolaidis)***

1. Professionalism in Medical Practice.

***Research methods and essential medical statistics (Dr Alexandros Heraclides)***

1. Validity and reliability of assessment tools
2. Systematic Reviews and Meta-analyses I & II

***Medical Psychology (Dr Stelios Georgiades)***

1. Empathy and its importance in doctor patient relationships.
2. Psychological aspects related to cardiovascular conditions.
3. Psychological aspects related to respiratory conditions.
4. Psychological factors related to gastrointestinal health.
5. Psychological aspects of intimate physical examinations.
6. Psychological aspects of Endocrine related disorders.

**Learning Activities and Teaching Methods:**

The course is delivered through a variety of teaching methods:

**Communication skills:** small group teaching, group discussions, role playing.

**Clinical skills:** small group teaching, demonstration of examination techniques, and examinations on peers, practicing and performing the skills on mannequins.

**Clinical Placements:** Students will attend two clinical placements on **diabetes** and **hypertension**

**Workshops:** Students will attend three workshops on **diabetes, hyperlipidaemia** and **hypertension**

**Lectures, tutorials and workshops:** In addition to the sessions shown above, lectures, tutorials and workshops will be scheduled in the fields of professionalism, research methods and essential medical statistics and medical psychology.

**Assessment Methods:**

Clinical Placement attendance and professional behaviour (10%).

Final examination (20%).

End of semester mini-OSCE (70%).

**It should also be noted that a formative OSCE will take place during the last week of classes. The formative OSCE does not contribute towards the students' overall course grade.**

**Required Textbooks/Reading:**

Authors	Title	Edition	Publisher	Year	ISBN
Silverman J, Kurtz S, Draper J.	Skills for Communicating with Patients	3 <sup>rd</sup> Edition	Radcliffe Medical Press	2013	9781846193651
Khan, H et al.	OSCE's For Medical Finals	1 <sup>st</sup> Edition	Blackwell, Oxford	2013	9780470659410
Douglas, Graham (ed.)	Macleod's clinical examination	13 <sup>th</sup> Edition	Elsevier Churchill Livingstone	2013	9780702047282

**Recommended Textbooks/Reading:**

Authors	Title	Edition	Publisher	Year	ISBN
Lloyd, Margaret	Communication skills for medicine	3 <sup>rd</sup> Edition	Churchill Livingstone/ Elsevier	2009	9780702030581
Talley and O'Connor	Clinical examination: a systematic guide to physical diagnosis	7 <sup>th</sup> Edition	Churchill Livingstone/ Elsevier	2013	9780729541473