VNIVERSITAT DE VALÈNCIA

Course Guide
43044 Rational use of medicinal products in primary, hospital and social health care

COURSE DATA

Data Subject	
Code	43044
Name	Rational use of medicinal products in primary, hospital and social health care
Cycle	Master's degree
ECTS Credits	6.0
Academic year	2022 - 2023

Study (s)

Degree	Center	Acad. year	Period
2138 - Master's Degree in Research in and Rational Use of Medicines	Faculty of Pharmacy and Food Sciences	1	Annual
3103 - PhD in Biomedicine and Pharmacy	Doctoral School	0	First term

Subject-matter

Degree	Subject-matter	Character
2138 - Master's Degree in Research in and Rational Use of Medicines	20 - Rational use of medicines in primary, secondary, hospital and social health care	Optional

Coordination

Name	Department
NOGUERA ROMERO, MARIA ANTONIA	135 - Pharmacology

SUMMARY

Course aimed at providing the student an overview of how to apply the principles of rational drug use in clinical practice in primary care and geriatric Hospital.
This is a subject which enable students to become familiar with the health system and the efficient use of the drug, identifying the problems that are detected at any time in the environment of medicine including both therapeutic aspects and management of resources, and its impact on society.
The course objective is the acquisition by the student of knowledge, skills and abilities related to:
• Use of drugs in different settings
• Efficient management of pharmacotherapy resources
• Critical handling of drug information
• Evaluation and selection of drugs
• Causes related to the misuse of drugs
• Factors affecting the prescription

• Indicators of prescribing quality.
• Conciliation therapeutic
• Location of new pharmacotherapy treatment
• The pharmaceutical industry
• Ethical and drugs use

It is noteworthy that the skills and learning outcomes to be acquired in this subject, as well as the teaching methodology used, integrate the sustainable development goals (SDG) promoted by the United Nations (Agenda 2030). Among them, it is important to highlight the Rational Use of Medication and the promotion of Community Health (Objective 3: Health and Well-being) and Quality Education (Objective 4). In addition, aspects related to SDG 5 (gender equality) and 10 (reduction of inequalities) are worked on by addressing the differences in the response to drugs according to gender and access to drugs.

PREVIOUS KNOWLEDGE

Relationship to other subjects of the same degree

There are no specified enrollment restrictions with other subjects of the curriculum.

Other requirements

There is no registration restriction

COMPETENCES (RD 1393/2007) // LEARNING OUTCOMES (RD 822/2021)

2138 - Master's Degree in Research in and Rational Use of Medicines

- Manejar adecuadamente las fuentes de información biomédica y poseer la habilidad de hacer una valoración crítica de las mismas integrando la información para aportar conocimientos a grupos asistenciales multidisciplinares
- Students should apply acquired knowledge to solve problems in unfamiliar contexts within their field of study, including multidisciplinary scenarios.
- Students should be able to integrate knowledge and address the complexity of making informed judgments based on incomplete or limited information, including reflections on the social and ethical responsibilities associated with the application of their knowledge and judgments.
- Students should communicate conclusions and underlying knowledge clearly and unambiguously to both specialized and non-specialized audiences.
- Students should demonstrate self-directed learning skills for continued academic growth.
- To acquire basic skills to develop laboratory work in biomedical research.
- Be able to make quick and effective decisions in professional or research practice.
- Be able to access the information required (databases, scientific articles, etc.) and to interpret and use it sensibly.

- Students should possess and understand foundational knowledge that enables original thinking and research in the field.
- Be able to integrate new technologies in their professional and/or research work.
- Know how to write and prepare presentations to present and defend them later.
- Ser capaces de analizar de forma crítica tanto su trabajo como el de su compañeros.
- To be able to assess the need to complete the scientific, historical, language, informatics, literature, ethics, social and human background in general, attending conferences, courses or doing complementary activities, self-assessing the contribution of these activities towards a comprehensive development.
- Be able to apply the research experience acquired to professional practice both in private companies and in public organisations.
- Dominar la comunicación científica. Poseer habilidades sociales y comunicativas en la práctica asistencial.
- Capacidad de seleccionar y gestionar los recursos disponibles (instrumentales y humanos) para optimizar resultados en investigación.
- Dominar el método científico, el planteamiento de protocolos experimentales y la interpretación de resultados en la búsqueda, desarrollo y evaluación de nuevos fármacos.
- Analizar la utilización de medicamentos para la buena práctica asistencial. Capacidad para evaluar resultados farmacoterapéuticos.
- Capacidad para desarrollar y proponer procedimientos que contribuyan al uso racional del medicamento.

LEARNING OUTCOMES (RD 1393/2007) // NO CONTENT (RD 822/2021)

At the end of the teaching-learning process the student should be able to:

- Analyze and evaluate scientific data concerning the use of medicines in primary care and geriatric Hospital and the problems involved in drug misuse

- Apply knowledge pharmacotherapy for appropriate choice / monitoring drug therapy at each level of care.

- Contrast the information provided by clinical trials and pharmaco-economic studies for drug selection.

- Identify the determinants of the prescription and assess prescribing quality indicators.

-Prevent, identify and resolve medication-related problems and promote therapeutic reconciliation

-Set the location of new pharmacotherapy treatments

-Understand and assess adherence to treatment as a factor contributing to the risk-benefit balance of drugs

DESCRIPTION OF CONTENTS

1. Promotion of the rational use of medicine

Item 1. General concepts: rational drug use in our environment
Item 2. Ethics and health resources
Item 3. Legal and regulatory agencies
Item 4. Critical reading of drug information
Item 5. Drug selection
Item 6. Process of rational treatment
Item 7. Generics
Item 8. The pharmaceutical industry
Item 9. Drugs and Society

2. Rational Use of the Drug in clinical practice

Item 10. Primary Care
Item 11. Hospital Care
Item 12. Health and Social care
Item 13.Conciliation of health professionals and care levels
Item 14. Identifying patients which need improvement in the quality of pharmacotherapy.
Item 15. Pharmaceutical care programs and evaluation of patient outcomes

WORKLOAD

ACTIVITY	Hours	% To be attended
Group work	20,00	100
Seminars	20,00	100
Theory classes	15,00	100
Tutorials	5,00	100
Development of group work	40,00	0
Development of individual work	10,00	0
Study and independent work	10,00	0
Readings supplementary material	10,00	0
Resolution of case studies	20,00	0
TOTAL	**150,00**	

TEACHING METHODOLOGY

During the activities, both theoretical and practical, the applications of the subject contents in relation to the Sustainable Development Goals (SDG) will be indicated. This is intended to provide knowledge, skills and motivation to understand and address these SDGs, while promoting reflection and criticism.

Lectures. Aimed at obtaining basic skills. Dogmatic method is used combined with the heuristic method for the presentation of fundamental concepts and the relevant contents of the course, using the media necessary for their development. Health professionals will be invited experts in these topics.

Conferences and Seminars Expert. Based on lectures given by renowned healthcare professionals, we propose different problems to be solved by students and discussed in sessions supervised by the teacher, which will involve active student participation.

Debates. Will be discussions on real and current situations that generate a conflict regarding the rational use of medicines. These discussions may involve a health professional but are the students who must provide arguments, defend and agree solutions ..

Working group. What made the students into groups of 6-8, surveys of drug use, analysis and evaluation of pharmacotherapeutic findings of these surveys and oral presentation of work after the course

Practice (voluntary) in the center of Pharmacovigilance, Clinical Trials Unit, Drug Information Center, Health Care centers, ...

Tutorials. The tutorials are organized into small groups of students, according to the schedule. In them, the teacher will propose individually or collectively specific issues of greater complexity than those resolved in the regular seminars to the needs of students. Also, the tutorials will serve to resolve the doubts that have arisen over the lectures and advising students on strategies to circumvent the difficulties they may have.

To complete the classroom hours: The tools "questionnaires" and "tasks" of the virtual classroom will be used. The grade obtained will be taken into account for the continuous evaluation.

EVALUATION

There will be a formative assessment throughout the course, based on class attendance (30%), active participation (20%) and resolution of problems and issues (20%)
It will also make a final assessment with the development of a job (15%) and oral presentation of the same (15%).
To pass the course will require attendance at 80% of the sessions and obtaining a score greater than or equal to 50% in each section evaluated.

REFERENCES

Basic

- Guía terapéutica en Atención Primaria. 7ª ed. SEMFYC, 2019
- Andres JC, Fornos JA, Andres NF. Introducción a la investigación en farmacia comunitaria. Grupo Berbes y Aula COFANO, 2010
- Sempere E, Vivas C. Uso racional de los medicamentos. Apuntes para el médico de familia. Obrapropia SL, 2011
- Moitala I, Bosch F, Farréa M, Maddalenob M y Banos JE. (2014) El caso Glivec®: primer ejemplo de debate global en torno al sistema de patentes de medicamentos. Gac Sanit. 2014;28(6):470474, 2014.
- - Promoción del uso racional de medicamentos: componentes centrales. Perspectivas políticas de la OMS sobre medicamentos. OMS, 2020
- La farmacovigilancia: garantía de seguridad en el uso de los medicamentos. Perspectivas políticas de la OMS sobre medicamentos. OMS 2004
- Maldonado JC. Prescripción de medicamentos y problemas en el proceso terapéutico. Revista Médica Vozandes. 2017; 28:5-8.
- Comprender la promoción farmaceutica y responder a ella. OMS, 2010.
- Gallo C, Vilosio J, Salmovici J. Actualización de los criterios STOPP-START: una herramienta para la detección de medicación potencialmente inadecuada en ancianos. Actualización en la Práctica Ambulatoria. 2015; 18(4): 124-129.

Additional

- Agencia Española del Medicamento. http://www.agemed.es
- Base de Datos del medicamento. Consejo General de Colegios Oficiales de Farmacéuticos. http://www.portalfarma.com
- Base de Datos PubMed. U.S. National Libary of Medicine and the National Institutes of Health. http://www.pubmed.com
- Fundació Institut Català de Farmacologia http://www.icf.uab.es/Index.html#
- Cochrane Library. Biblioteca Cochrane Plus www.cochrane.org
- EMEA.Agencia europea del Medicamento. emea.eu.int/
- Embase http://www.elsevier.nl
- Food and Drug Administration. http://www.fda.gov
- Información Terapéutica del Sistema Nacional de Salud http://www.msc.es/biblioPublic/publicaciones/recursos_propios/infMedic/home.htm

- National Institute for Health and Clinical Excellence. http://www.nice.org.uk
- OMS. Organización Mundial de la Salud. http://www.who.int/en/
- GENESIS http://gruposdetrabajo.sefh.es/genesis/genesis/