UNIVERSITÀ DEGLI STUDI DI PALERMO

DEPARTMENT	Medicina di Precisione in area Medica, Chirurgica e Critica		
ACADEMIC YEAR	2023/2024		
MASTER'S DEGREE (MSC)	DENTISTRY		
INTEGRATED COURSE	SCIENTIFIC ENGLISH LANGUAGE AND COMPUTER SCIENCE - INTEGRATED COURSE		
CODE	17614		
MODULES	Yes		
NUMBER OF MODULES	2		
SCIENTIFIC SECTOR(S)	L-LIN/12, ING-INF/05		
HEAD PROFESSOR(S)	CANZIANI TATIANA	Ricercatore	Univ. di PALERMO
OTHER PROFESSOR(S)	CICCERI GIOVANNI	Ricercatore a tempo determinato	Univ. di PALERMO
	CANZIANI TATIANA	Ricercatore	Univ. di PALERMO
CREDITS	8		
PROPAEDEUTICAL SUBJECTS			
MUTUALIZATION			
YEAR	1		
TERM (SEMESTER)	1° semester		
ATTENDANCE	Mandatory		
EVALUATION	Out of 30		
TEACHER OFFICE HOURS	**CANZIANI TATIANA** Wednesday 09:00 12:00 Tramite piattaforma Teams o in presenza presso il Plesso di Anatomia ed Istologia. Per prenotare il ricevimento inviare una mail alla docente. **CICCERI GIOVANNI** Tuesday 14:30 16:30 Dipartimento di Biomedicina, Neuroscienze e Diagnostica avanzata (Bi.N.D.), Sez. Radiologia, 1° piano, Laboratorio di Medical Imaging "Casimiro La Grutta" (Stanza 109).		

DOCENTE: Prof.ssa TATIANA CANZIANI

PREREQUISITES	An A2 level of English (as described by the Common European Framework of References for Languages), and an ECDL (European Computer Driving License) are recommended but not compulsory.
LEARNING OUTCOMES	Knowledge and understanding At the end of the course students will be expected to have acquired linguistic and communicative skills (B2 Level of CEFR), a basic use of the specialized terminology and language registers required to pursue the profession of dentist in different communicative situations and a basic knowledge of simple computer system structures and principles, methods and techniques for health information management. Applying knowledge Students should be able to understand and write simple specialized texts (e.g. abstract; formal letters), record patient data on a clinical chart, deal with most communicative situations likely to arise when talking with a dental patient according to the different language registers. Students will be also expected to have acquired the ability to use health information and communication technology as a useful support for diagnostic, therapeutic and preventive health practice. Students should also be able to use the common tools for medical data analysis (e.g. electronic spread sheet) as well as to implement and manage a simple electronic health record. Making judgments At the end of the course students will be expected to have acquired: 1) the ability to identify, in an autonomous way, the different registers of English, the relevant specialized terminology of Dentistry, the consequences arising from proper\improper use of a foreign language in dental contexts; 2) the skills needed to handle challenging situations in their own working lives within the field of the English language and computer science applications. Communicative skills Students should be able to report (in a clear and confident way) on the topics dealt with during the course and related to dentist-patient communication and Computer Science. Learning skills This course does not pretend to cover all the aspects and topics of English for Dentistry and Computer Science but it aims at developing students' awareness of the acquired competences for self-directed learning of content and methods necessary and required in their professional lives.
ASSESSMENT METHODS	This assessment is used to evaluate the student's knowledge and understanding of the programme content, independent judgement, ability to apply the knowledge acquired and specific technical terminology. As far as the English oral exam is concerned, students are asked to read and translate a short scientific text and answer at least four questions related to the topics covered in the syllabus, referring to the suggested texts and the teacher-made resources. As far as the Computer Science exam is concerned, it consists of a practical exam on the computer and includes 4 questions: two open-ended questions to assess critical and reasoning skills and two questions focused on the application management to assess operational and technical competences. ASSESSMENT CRITERIA The assessment grades are given as numerical scores awarded out of a possible 30 points, and as follows: - 30 - 30 cum laude - ECTS grades: Excellent (A – A+) Result: Excellent knowledge of the taught subject matter. The student demonstrates good analytic-synthetic capabilities and is able to apply knowledge to resolve highly complex problems. - 27 – 29 – ECTS grades: Very good (B) Result: Very good knowledge of the taught subject matter and good use of language. The student demonstrates analytic-synthetic capabilities and is able to apply knowledge to resolve some complex problems. - 24 – 26 – ECTS grades: Good (C) Result: Good knowledge of the taught subject matter and good use of language. The student is able to apply knowledge to resolve problems of medium complexity. - 21 – 23 – ECTS grades: Satisfactory (D) Result: Reasonable knowledge of the taught subject matter, in some cases limited to the main topics. Acceptable use of technical language and capacity to apply acquired knowledge independently. - 18 – 20 – ECTS grades: Sufficient (E) Result: Minimal knowledge of the taught subject matter, often limited to the main topics. Modest use of technical language and some capacity to apply acquired knowledge independently. - 1 – 17 – ECTS grades: Fail (F) Result: Unacceptable knowledge of the taught subject matter. Little or no use of technical language and capacity to apply acquired knowledge independently. Exam failed.

TEACHING METHODS	Frontal teaching

MODULE
COMPUTER SCIENCE

Prof. GIOVANNI CICCERI

SUGGESTED BIBLIOGRAPHY

1) D. Sciuto, G. Buonanno, L. Mari; Introduzione ai sistemi informatici, 5/ed, McGraw-Hill. ISBN-13: 978-8838668326.
2) A. Brogi, A. Martinelli, V. Gervasi, P. Manghi, A. Fabrizio, G. Pacini; Il foglio elettronico per Medicina e Farmacia, Collana IT4PS, 1/ed, McGraw-Hill. ISBN-13: 978-8838662546.
3) P. Manghi, A. Brogi, V. Gervasi, A. Martinelli, G. Fiorentino, A. P: Pala; Le basi di Dati per Medicina e Farmacia, Collana IT4PS, 1/ed, McGraw-Hill. ISBN-13: 978-8838662577.

Materiali didattici integrativi:
1) Dispense e lucidi forniti dal docente.

AMBIT	20959-Attività formative affini o integrative
INDIVIDUAL STUDY (Hrs)	45
COURSE ACTIVITY (Hrs)	30

EDUCATIONAL OBJECTIVES OF THE MODULE

The course aims at providing basic knowledge associated to the Information and Communication Technology, as a useful support for diagnostic, therapeutic, and preventive health practice. The course offers an introduction to computer systems, taking a Personal Computer as the driving paradigm and analysing the related operating principles of the basic infrastructures: the hardware, the software, and the network infrastructures. In addition, the course will introduce the use of two main software tools for data analysis and management in health domain: the electronic spreadsheet and the database. In particular, databases will be presented as the basic element for electronic health record development and management. An introduction to the search strategies in the most common on-line databases is the final part of the course.

SYLLABUS

Hrs	Frontal teaching
3	Course introduction; Data and Information; Coding Systems.
2	Information representation and coding.
2	Main characteristics of algorithms, programming languages, and source codes.
4	Hardware Infrastructure: introduction to computer architetture; central processing unit; memory systems; I/O devices.
3	Software Infrastructure: features and purposes of an operating system; major components of an operating system.
2	Network Infrastructure: data and information transmission; computer networks.
2	A brief introduction to TCP/IP; World Wide Web and e-mail.
1	Application programs.
1	An introduction to electronic spreadsheets.
4	Electronic spreadsheets: definition and management of a patient diet.
1	An introduction to databases and DBMS.
4	Database and DBMS: definition and management of electronic health records.
1	Search strategies in Google and Pubmed.

MODULE
SCIENTIFIC ENGLISH LANGUAGE

Prof.ssa TATIANA CANZIANI

SUGGESTED BIBLIOGRAPHY

Per la parte grammaticale\Grammar:
(consigliati\recommended)
Hird, J., The Complete English Grammar for Italian Students, Oxford University Press (ISBN 978-0-194810050).
Swan M., Practical English Usage, Oxford University Press (per livelli superiori al B1- for upper and intermediate Students) ISBN 978-0-19-4202435.

Per la parte di Inglese specialistico\ Medical English texts (a scelta uno dei seguenti testi\ recommended but not compulsory):
Bettinelli et al. English for Medicine. Hoepli (ISBN 978-8820332457).
Pesce, Carlo. Medical English. Zanichelli (ISBN 978-88-08-42049-7).

Materiali didattici integrativi\Supplementary teaching materials:
Power point forniti dal docente e materiale tratto dal web su argomenti specifici della comunicazione medico-paziente\ Teacher's resources and web materials on doctor-patient communication.

AMBIT	50445-Inglese scientifico e abilità linguistiche, informatiche e relazionali, pedagogia medica, tecnologie avanzate e a distanza di informazione e comunicazione
INDIVIDUAL STUDY (Hrs)	75
COURSE ACTIVITY (Hrs)	50

EDUCATIONAL OBJECTIVES OF THE MODULE

The main focus of this course is to improve students' vocabulary, grammar and reading skills with special emphasis on doctor-patient communication. The teaching objectives of this course are: 1) to improve students' ability to communicate with their patients using different language registers; 2) to improve students' reading comprehension ability while browsing English medical websites. Special attention will be given to the specialised lexicon, and the lexical composition and reading of specialised texts to guide students to use English in their professional daily life and research.

SYLLABUS

Hrs	Frontal teaching
1	Subject and object personal pronouns, possessive adjectives and pronouns.
2	Regular and irregular plurals and the plural of nouns of Greek and Latin origin; the Possessive Case.
1	Cardinal and ordinal numbers. How to say the date and the time.
1	Definite and indefinite articles. Use of the definite article before parts of the body and diseases. Indefinite Pronouns.
1	Time and place prepositions.
2	Relative and question pronouns. Defining and non-defining relative clauses.
1	Comparative and superlative adjectives.
2	The nominal style in medical English. Particular use of the -ing form to build up discourse. The gerund. Some preopositions followed by the -ing form.
2	The Simple Present of auxiliary and non auxiliary verbs. The Present Continuous.
4	The forms of future.
1	The Imperative.
2	Simple Past and Present Perfect. Frequency adverbs and time expressions.
2	Present and Past Perfect Simple and Continuous and Duration Form.
3	The Conditionals: 0, 1st, 2nd and 3rd type with particular attention to doctor/patient communication. Future in the past and Mixed Conditionals.
2	Present and Perfect Conditional and Past Perfect.
3	Modal and semi-modal verbs.
1	Question Tags.
2	Phrasal verbs. The Passive Form.
1	Make\Let\Get\have + infinitive.
1	Reported Speech and modifiers.
9	Doctor – patient communication in English when filling a medical chart. Asking about personal details (1); Asking about pain: location, duration and type of pain (2); General health questions concerning: - Medical history (2) - Family History (2) On examination: Instructions (2).
2	Medical Written Communication: abstract, scientific paper and IMRAD with a special focus on narrative tenses.

3	Specialized lexicon: Human body, clinical chart, medical specialties, health professions,Hospital wards\departments, medical acronyms and initialisms. Medical and lay terms when talking about symptoms in doctor-patient communication.
1	Expressing habits in the past: used to and would. Expressing regrets: wish and if only.