

Faculty of Economic, Social and Political Sciences



COPS1121 Information Technology and Multimedia

[30h+15h exercises] 4 credits

Teacher(s): Jean-Pierre Couwenbergh, Thierry De Smedt, Marcel Lebrun
Language: French
Level: First cycle

Aims

By the end of this course, students should have acquired:

- a broad background in Information Technology, key concepts in Information Technology and networking, basic knowledge of computer systems (materials, functioning, basic software, multimedia technology and Internet)
- theoretical and practical working knowledge of the principal IT applications within Social Sciences (multimedia applications and Internet, document presentation and word processing)
- critical skills in the field of multimedia communication

Main themes

1. An introduction to the field of Information Technology:
 - definitions of Information Technology and the computer
 - a historical overview of computer science and its development
 - binary code - digitization
 - basic media technologies (sound, image)
 - programming languages, operating systems and application software
 - principles of computer network communication
2. Practical computer skills:
 - introduction to working with computerised databases and relevant software
 - introduction to working with sound and image files and to relevant software
 - introduction to multimedia composition software and related techniques
 - introduction to working with the Internet: web sites and communication tools
3. Analysis of issues in multimedia communication:
 - introduction to the status of multimedia information
 - introduction to Internet search engines
 - critical evaluation of sources available on the Internet

Content and teaching methods

Course Content:

The course approach the fundamental concepts of the data processing and the networks. It processes then main software applications used in social sciences (multimedia, Internet, data processing). Next the lecture, the teacher will implement(operate) inductive methods (illustrations, demonstrations, resolutions of problems) and concrete demonstrations.

Methods :

The course is structured around a series of lectures with use made, wherever possible, of inductive teaching methods (through illustrations, demonstrations, problem solving) and concrete demonstrations.

The course includes 30 hours of practical computer skills teaching which will take place in the Faculty computer labs.

Other information (prerequisite, evaluation (assessment methods), course materials recommended readings, ...)

Evaluation: the course is assessed through a written exam (for a part of which students may refer to their course materials). The aim of the exam is to test students' knowledge of basic definitions and concepts and their ability to solve problems similar to those presented during the course and worked on during the practical exercise sessions.

Course materials : course handout, notes and summaries, exercises and solutions, application software, data,

Supervision : The practical course work (15 hours), for which students are split into small groups, is supervised by assistants.

Additional information: Some software packages are available at reduced prices.

Other credits in programs

COMU11BA	Première année de bachelier en information et communication (4 credits)	Mandatory
HUSO12BA	Deuxième année de bachelier en sciences humaines et sociales (4 credits)	Mandatory
SOC21	Première licence en sociologie	
SOCA11BA	Première année de bachelier en sociologie et anthropologie (4 credits)	Mandatory
SPOL11BA	Première année de bachelier en sciences politiques (4 credits)	Mandatory
STAT21MS/DM	Première année du master en statistique, orientation générale, à finalité spécialisée (data management et data mining) (4 credits)	
STAT21MS/EA	Première année du master en statistique, orientation générale, à finalité spécialisée (économie et assurance) (4 credits)	
STAT21MS/MM	Première année du master en statistique, orientation générale, à finalité spécialisée (méthodes mathématiques) (4 credits)	
STAT21MS/MS	Première année du master en statistique, orientation générale, à finalité spécialisée (marketing et sondage) (4 credits)	
STAT21MS/ST	Première année du master en statistique, orientation générale, à finalité spécialisée (sciences et technologie) (4 credits)	
STAT22MS/DM	Deuxième année du master en statistique, orientation générale, à finalité spécialisée (data management et data mining) (4 credits)	
STAT22MS/EA	Deuxième année du master en statistique, orientation générale, à finalité spécialisée (économie et assurance) (4 credits)	
STAT22MS/MM	Deuxième année du master en statistique, orientation générale, à finalité spécialisée (méthodes mathématiques) (4 credits)	
STAT22MS/MS	Deuxième année du master en statistique, orientation générale, à finalité spécialisée (marketing et sondage) (4 credits)	
STAT22MS/ST	Deuxième année du master en statistique, orientation générale, à finalité spécialisée (sciences et technologie) (4 credits)	
STIC1PM	Année d'études préparatoires au master en sciences et technologies de l'information et de la communication (4 credits)	