

## Course Unit Description - (APLIN)

(Computer Applications in Power Systems)

(Mestrado em Engenharia Electrotécnica - Sistemas Eléctricos de Energia)

Academic year: 2009/2010

### Subject group: Sistemas de Energia

	Semestral	Compulsory	
<b>Mode of study</b>	Diurno	Hours/Week	T-Teórica
<b>Year</b>	1 <sup>o</sup>		PL-Prática-Laboratorial
<b>Semester</b>	2 <sup>o</sup>		OT-Orientação Tutorial
<b>ECTS</b>	7.5		

### Objectives

This course addresses the use, specification, choice and design of computer applications for Power Systems (PS).

### Course Contents

Computer applications in Power Systems (PS)  
Computational methodologies in PS  
Design and implementation of computer applications for PS:  
.Data modelling  
.Database programming in ACCESS  
.VBA & ACCESS  
.MatLab

### Recommended reading

Site <http://moodle.isep.ipp.pt/>  
Access 2007 Macros & VBA - Curso Completo  
Access 2007 VBA Programmer's Reference  
MatLab 7&6 Curso Completo. Vagner Morais, Claudio Viera, FCA

### Teaching Methods

Theoretical lessons will be used for subject matter exposition and case studies discussion.  
Laboratorial lessons will be used for work group development, using the approach "learning based on problems".

### Assessment methods

Evaluation during the learning period, NFREQ, will be obtained by means of a practical work, which will weight 60% of the final classification.

The minimum classification for NFREQ is 8.

Final written exam, PE, will contribute with 40% for the final classification.

The minimum classification for PE is 8.

$(xNFREQ + yPE)/(x + y)$

x = 60%

y = 40%

	Name
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