



PHYS2910 Analysis methods

[22.5h+15h exercises] 3.5 credits

This two-yearly course is taught in 2006-2007, 2008-2009,...

This course is taught in the 2nd semester

Teacher(s): Patrick Bertrand
Language: French
Level: Second cycle

Aims

To initiate the student to new physical methods of solid surfaces and thin layer analysis.

Main themes

The new physical methods of analysing surfaces and thin layers are based on irradiation of material by different types of particules: ions, electrons and photons. The course establishes a link between fundamental physics and the science of materials. The applications will be treated in different domains: microelectronic, catalysis, polymeres, thin layers, metallurgy, etc.

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

Prerequisites: basics in nuclear physics and solid state physics.

Support: Copy of overhead transparencies used during the course.

References: a bibliographic list is given to students. These books may be consulted.

The course will be enriched with demonstrations and lab manipulations.

Other credits in programs

MATR22	Deuxième année du programme conduisant au grade d'ingénieur civil en science des matériaux	(3.5 credits)
PHYS22/A	Deuxième licence en sciences physiques (Physique appliquée)	(3.5 credits)