

PHYSICS

FYD421 Programming in the C#-language Part I, 7.5 higher education credits

C#-programmering I, 7,5 högskolepoäng *First Cycle*

Confirmation

This course syllabus was confirmed by Department of Physics on 2009-11-24 and was last revised on 2016-03-18 to be valid from 2016-07-01, autumn semester of 2016.

Field of education: Science 100% *Department:* Physics

Position in the educational system

Advanced course in the main subject physics. The course is given in the programme Computer-aided physical measuring techniques and as a freestanding course at University of Gothenburg. This course replaces the courses FYD420 and FY0330 and only one of these courses may be included in a degree.

Entry requirements

For admission to the course, previous experiences in programming are required in e g C, C++ or Java (at university level).

Learning outcomes

The aim of the course is that the student should acquire knowledge in programming of modern measurement systems as well as the structure of these.

After having gone through the course "C# programming I" the student should:

• be able to write simple programmes in the C# to handle and control modern measurement systems.

- be able to handle in and output signals in simple measurement systems.
- have a basic understanding of good program structure and debugging of C# programs.
- have obtained a basis for advanced studies in programming of measurement system.

Course content

The student utilises C# programing, to develop Windows based measurement applications as well as analysis programs for measurement data. The student will also acquire knowledge about dynamically linked libraries (DLLs). NET technology etc

Form of teaching

The teaching is given in the form of lectures and supervision in connection with laboratory sessions.

Language of instruction: Swedish

Assessment

For examination, it is required that the required number of laboratory sessions is completed and passed and that a final assignment has been carried out and been presented. Depending on the degree of difficulty of the final assignment and submitted exercises, the grade Pass is given or Passed with distinction.

Grades

The grading scale comprises: Pass with Distinction (VG), Pass (G) and Fail (U). Report to course coordinator no later than a week after start of the course if ECTS grade is required.

Course evaluation

Course evaluation is carried out by students and teachers during the course.