



Sveriges lantbruksuniversitet
Swedish University of Agricultural Sciences

SLUkurs

Syllabus

PVSoo81 Principles of molecular biology, 3.5 credits

Syllabus approved

2012-08-23

Subjects

Biology

Education cycle

Third cycle

Grading scale

Pass / Failed

The requirements for attaining different grades are described in the course assessment criteria which are contained in a supplement to the course syllabus. Current information on assessment criteria shall be made available at the start of the course.

Language

English

Prior knowledge

Degree in veterinary or animal science or similar background in biology. Accepted into a PhD program in animal science or veterinary medicine or other programs in biology or medicine.

Objective, including learning outcomes

The scope of this course is to provide the participants with the most recent up-date on the principles behind molecular biology, the techniques that are used and possible

applications to be used in basic research. All PhD students that are studying some aspects on molecular mechanisms behind disease, health and biological principles will benefit from this course.

Content

The participants will learn the most recent molecular techniques that are available for studying genes, their organisation, evolution etc, the expression of mRNAs, and further the translation and characterization of the proteins that are expressed. Also, general principles will be studied by reading and discussion of a book on the subject.

Maximum participants 20.

Requirements for examination

Attendance at minimum 6 meetings and home-exam

Additional information

The course is given within the Research school for Food and Feed Safety and Quality. It is open for all PhD students with the prerequisites but FFSQ students have priority. Maximum 20 students per course occasion will be accepted and the course will only be given if five or more students participate. The main part is to read and discuss the contents of the course literature. The meetings will be for about two hours per second week where two to three chapters are discussed at every occasion. In addition, external experts will be giving lectures on the applications of molecular techniques in connection to some of the meetings.

Preliminary Schedule: 2015: 4/9, 25/9, 9/10, 23/10, 6/11, 20/11, 4/12, 18/12. All meetings will be held between 13.00-15.00

Responsible department

Department of Biomedical Sciences and Veterinary Public Health