Engineering Graphics Courses in the Light of the National Qualifications Framework

R. A. Górska Faculty of Architecture Cracow University of Technology, PL

Summary

In recent years major changes have been introduced into the system of higher education in the common European Higher Educational Area (EHEA). On account of the Bologna Process the EHEA is leading to greater compatibility and comparability of the systems of higher education and is making it easier for learners to be mobile and for institutions to attract students and scholars from other continents. The author's interest focuses on the standardization on the content of two freshman level graphics courses of undergraduate studies, namely descriptive geometry and technical drawing. Educational objectives and learning outcomes for two graphics courses taught at Cracow University of Technology (PL) have been described. Some examples of students' projects have been shown to present their complexity level. Graphics courses are delivered to students at CUT as blended courses. The Moodle system serves as a medium for the on-line content delivery. The analysis of the query on student – teacher and student - student co-operation will also be provided.

Another anonymous survey has been also conducted in a paperwork form among the students and then used to evaluate the impact of various teaching methods on the learning habits and the educational objectives of our students. The results of the survey will be presented.

Some comparison between Polish universities has been done. The results will be shown.

The article describes the rationale for the introduction of the National Qualifications Framework (NQF) into graphics courses teaching. New requirements set up by the NQF have caused a revision of the curricula at all universities in Poland. Much stress has been put on the load of knowledge, abilities and competences, which resulted in re-formulation of the courses. The three-year delivery of the online content for the undergraduate engineering graphics (DG and TD) instruction in a form of blended courses has been beneficial to the students and it complies with a model of a student-centered education.