Abstract

Purpose - This paper presents an IT system - Student Connectivity Module (SCM) - designed for support of administration of student exchange between universities in different countries, developed under the EU 7th Framework Programme. This paper aims to share the acquired knowledge on existing difficulties in mobility management, propose solutions to those problems, and present results of system validation using its prototype deployed at two universities.

Design/methodology/approach - Prior to the system design, the needs, plans and expectations concerning the academic IT services were surveyed among 100 universities. On this basis, in close with prospective system users, an original peer-to-peer system was developed using top-down model-driven and agile software development techniques.

Findings - The barriers to effective interoperation of academic information systems were revealed: 1) diversity and heterogeneity of campus IT solutions, 2) differences in patterns of international student mobility flow, 3) diversity in national personal data protection policies, 4) lack of standards for e-data exchange. The SCM system overcomes these problems by adopting platform-independent IT solutions, Web-Services, a network of trusted authority servers, and a novel “quasi-standard” solution for e-data exchange, with the use of home university campus cards to access facilities at host institutions.

Originality - The management of foreign student exchange is a complicated process. It involves students, faculty, administrative staff and external institutions. To our knowledge, there is no other comprehensive networked IT system available to facilitate administration of student mobility, make it better controlled, less laborious and faster, in a secure way. Our IT solution contributes to overcoming the current barriers to academic mobility within Europe and elsewhere.