UNITEL Project

UNITEL

Modernisation and Internationalisation of Iranian HEIs via Collaborative TEL-based Curriculum Development in Engineering and STEM/UNITEL

HEI: Higher Education Institution

TEL: Technology Enhanced Learning

STEM: Science, Technology, Engineering and Mathematics

Follow us on:

WebSite:
 https://unitelproject.net

Instagram:
 https://instagram.com/unitel_project?igshid=YmMyMTA2M2Y=

ResearchGate:
 https://www.researchgate.net/profile/Unitel-Project

LinkedIn:
 https://www.linkedin.com/company/unitel-project/

AIMS and GOALS

The main purpose of the UNI-TEL project is to support modernisation, internationalisation and accessibility of the HE system within the partner country (Iran) through the development of innovative pedagogical approaches based on collaborative technology enhanced learning methodologies.

The UNI-TEL project aims at tackling the challenges outlined in section D.1 by implementing a working methodology that allows the consortium to achieve two main specific objectives:

- empowering engineering and STEM departments in Iranian universities in enhancing skills and competences of professors and instructional designers on innovative collaborative ICT-based practices as a means to increase curriculum modernisation and internationalization

- modernisation of engineering and STEM curriculum hrough the development of flexible and accessibl training path boosting new educational approaches based on technology enhanced learning and collaborative methodologies

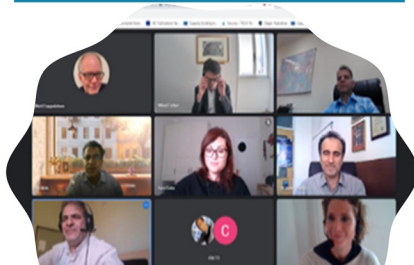

Main Activities

BASELINE RESEARCH

To identify details of the current practices and methodologies of HEIs in Engineering and STEM studies (pedagogical approaches and CT-supported tools and systems). It will be done both at PC and EU levels and it will be focused on the state of the Art of HEIs in Engineering and STEM studies in relation to the pedagogical approaches and ICTsupported tools and systems used.

TRAINING PATH

To empower Engineering and STEM departments at Iranian universities in enhancing skills and competences of professors and instructional designers on innovative collaborative ICT-based practices as a means to increase curriculum modernisation and internationalisation.

CURRICULUM MODERNISATION

To modernise engineering and STEM curriculum through the development of flexible and accessible training path boosting new educational approaches based on technology enhanced learning and collaborative methodologies.

PARTNERS

AbERTA
www.uab.pt
UNIVERSIDADE
Universidade Aberta (UAb)

UNIVERSITY OF TURKU
University of Turku (UTU)

Università degli Studi Guglielmo Marconi - USGM

University of Sistan and Baluchestan
University of Sistan and Baluchestn (USB)

IMAM KHOMEINI INTERNATIONAL UNIVERSITY

Prisma Electronics SA
ELECTRONICS SA (PRISMA)

University of Teheran (UT)

University of Isfahan (UI)

Shiraz University

Namvaran Pazhouhesh va Tose-a
Research, Design and Engineering Oil, Gas, Petrochemical
Namvaran Pazhouhesh va Tose-a (NPT)

Shahid Chamran University of Ahvaz

e-Course

The Aims of the UNITEL e-Course

The overall aim of the UNI-TEL e-course is to empower Engineering and STEM departments at Iranian universities in enhancing skills and competences of professors and instructional designers on innovative collaborative ICT-based practices. These practices are seen as a means to increase curriculum modernisation and internationalisation. The course is motivating the academic staff to acquire key competences and skills crucial for the integration of technology enhanced (TEL) pedagogical approaches in university curricula. It will also promote rational applications of new collaborative teaching and learning ICT-based methodologies. The course is developed together with Iranian and European partners.

General learning objectives of the e-course are:

- To learn the principles of digitalization and enabling technologies that lead to innovative pedagogical practices;
- To learn current trends in pedagogy (industry-relevant, working life oriented pedagogies such as project-based learning and problem-based learning) through the use of pedagogical scripts and instructional scaffolding;
- To learn technologies, protocols and tools for applying ICT in processes and services;
- To be able to implement a project for the digital transformation of a process, area, or department.

The Participants of the e-Course

The target group of the e-course are the university professors/lecturers and instructional designers in the Iranian partner universities: at least 91 professors and instructional designers from the universities will register and follow the e-course (15-16 participants/university). In each partner university 70% of the participants will be professors. By the participants and the projects which the participants are elaborating during the e-course, at least 70 courses are modernised by teaching staff till the end of the UNITEL project. The e-course is a good opportunity to clarify the role and functions of the instructional designers in the Iranian universities.

The Structure of the UNITEL e-Course

The course will include different types of elements (figure 1):
- 36 video/audio lessons (from 20 – 60 minutes) to be attended on the platform in asynchronous modality;
- 3 webinar sessions (at beginning, mid-term and end of the e-course) to be attended synchronously by all participants (for the sake of logistical implementation 2/3 groups can be created);
- Project work
- 2 in presence sessions at institutional level (nationally) at the beginning and end of the e-course. The trained tutors will organise, moderate and facilitate the in-presence sessions in their own institution.

The general structure of the UNITEL e-course is distributed below:

Webinar   Webinar   Webinar

| Face to face session in own university | M1 M2 | M3 M4 | M5 M6 | Face to face session in own university |

ASSIGNMENT: PROJECT WORK/PLAN supported by the course assignments

TOTAL DURATION: 4 MONTHS
M1 – M6: Modules: Coordinated by European partners

36 topics: Video lessons + Powerpoints + Lecture notes