### CALL FOR EXPERTS (TECHNOLOGICAL EXPERTS ONLY)

#### I. Candidates requirements

#### 1. Context

The TeSLA quality assurance team is looking for technological experts to take part in the regular panels for the evaluation of the 3<sup>rd</sup> pilot of the TeSLA project (<u>www.tesla-project.eu</u>). More information about the project and the pilot phases can be found below.

# 2. Mission

The mission of the experts will consist in evaluating the quality aspects of the execution of the 3<sup>rd</sup> pilot in 7 different universities. During the evaluation, the experts will provide feedback and recommendations for the improvement of the system and its implementation on the market at the final stage of the project. They will also check the assessment methodology and perform site visits in each of the participating universities.

# 3. Technological expert's profile

#### Minimum requirement:

Expert in e-learning, outside of the scope of the university, with knowledge and experience in ICT application (preferably 2-3 years of experience).

#### 4. Number of days

Site visits (3 <sup>rd</sup> pilot) - TRAVEL	2
Training - TRAVEL	1
Working days	4
TOTAL	7 DAYS

#### 5. Fee

#### 200 EUR/day

Transportation and subsistence expenses will be reimbursed upon submission of receipts for face-toface meetings, training and site visits, based on actual costs.

# 6. Period of the mission

3<sup>rd</sup> pilot (7 panels): Sept 2017 – Sept 2018

# 7. Application

Candidates should submit their CV in the format provided to <u>tesla@aqu.cat</u> by **17 November 2017**.

#### II. Project information

### 1. Project description

The aim of the European Union-funded TeSLA project (An Adaptive Trust-based e-assessment System for Learning) is to improve the online assessment process by introducing tools and resources in learning activities that gather data to enable learners' authentication and to ensure authorship in any type of learning activities, final examinations or exercises. By means of this innovative online assessment system, TeSLA opens up new opportunities for educational institutions, guaranteeing equal opportunities and providing an inclusive solution.

TeSLA system will follow the interoperability standards for integration into different learning environments and it will be developed to reduce the current restrictions of time and physical space in teaching and learning, which opens up new opportunities for learners with physical or mental disabilities as well as respecting social and cultural differences.

Given the innovative action of the project, the current gap in e-assessment and the growing number of institutions interested in offering online education, the project is conducting large-scale pilots to evaluate and assure the reliability of the TeSLA system.

# 2. Overall mission of the experts

The mission of the experts consists in evaluating the quality aspects of the execution of 3 successive pilots in 7 different universities. During each evaluation, the experts provide feedback and recommendations for the improvement of the system and its implementation on the market at the final stage of the project. They will also check the assessment methodology and perform interviews in each of the participating universities.

# 2.1 Universities involved:

- Open University of Catalonia (UOC), Spain
- Open University of the Netherlands (OUNL), The Netherlands
- Sofia University (SU), Bulgaria
- The Open University (OU), UK
- Technical University of Sofia (TUS), Bulgaria
- Anadolu University (AU), Turkey
- University of Jyväskylä (JYU), Finland

# 2.2 Fields:

Each of the aforesaid universities selects several courses and assessment activities from the following fields. However, the selection criteria of experts place greater value on the expertise in e-learning and e-assessment:

- Social Science and Law
- Architecture and Engineering
- Arts and Humanities
- Science
- Health Science

# 2.3 Type of assessment:

- Continuous
- Formative
- Summative

### 3. Panels of experts / Pilots' phases

Pilots are being conducted in three phases to test the e-assessment models and technologies developed. The rationale behind the pilots is to increase the number of participants, the integration of technologies and the e-assessments models in each phase taking special care of disabled learners.

These three phases of the pilots are being assessed by two different types of panels (head panel/regular panel). The main difference between these two panels is that the head panel is involved in all the pilots and it works at a decision-making level while the regular panels are participating in the  $2^{nd}$  and the  $3^{rd}$  pilot and their work will be submitted to the head panel for its validation. Each panel (either the head or the regular ones) includes a president who is responsible, among other tasks, for writing the reports.

HEAD PANEL	
1	
At least: 1 academic, 1 QA professional, 1 student and 1 technological	
expert (see Section 4 for further details)	
1 <sup>st</sup> , 2 <sup>nd</sup> and 3 <sup>rd</sup> pilot	
• Validation of the features of the selected courses and assessment activities.	
• Preparation of the working plan for the second pilot (medium test- bed pilot).	
<ul> <li>Improvement of the assessment methodology.</li> </ul>	
<ul> <li>Validation and approval of the reports coming from regular panels.</li> </ul>	
<ul> <li>Improvement of the assessment methodology.</li> </ul>	
<ul> <li>Elaboration of the metaevaluation report in each pilot.</li> </ul>	
• Draw the final conclusions of the TeSLA model.	
<ul> <li>Preparation of the working plan for the third pilot (large scale pilot).</li> </ul>	

More details on panels' role are described hereunder:

Name:	REGULAR PANEL
Quantity:	10
Composition:	At least: 1 academic, 1 QA professional, 1 student and 1 technological
	expert (see Section 4 for further details)
Participation:	2 <sup>nd</sup> pilot (3 panels)
	3 <sup>rd</sup> pilot (7 panels)
Tasks:	Validation of the features of the selected courses and assessment
	activities.

• Assessment of the pilot taking into account the developed fit-for- purpose methodology and standards and elaboration of the assessment report.
<ul> <li>Validation of the use and the functionalities of the authentication/authorship technologies.</li> <li>Elaboration of a proposal for improvement of the assessment methodology.</li> </ul>

Pilots are being conducted as follows:

**3.1 Small Educational Pilots (1<sup>st</sup> Semester/Course 2016-2017 - FINISHED):** In this first stage, more than 600 learners from the different universities of the consortium were involved. In this phase, the TeSLA system was under development, therefore not all the technology was tested. The pilot served to test the coordination between all the partners and the defined protocols and data flows between involved WPs and actors (learners, teachers, auditory, ...). The assessment methodology was also tested and improved, using different evaluation types (continuous assessment, formative assessment, peer assessment, etc.) and data collection for their posterior analysis and coordination protocols. A first critical risks guideline was defined.

Experts in the 1<sup>st</sup> pilot worked in the following areas:

- Validation of the features of the selected courses and assessment activities.
- Preparation of the working plan for the second pilot (medium test-bed pilot).
- Improvement of the assessment methodology.

This work was carried out by the head panel. After completing these tasks, the involvement of the head panel continues in the 2<sup>nd</sup> and 3<sup>rd</sup> pilot (see further details about this role above).

- **3.2 Medium Test-bed Pilots (2<sup>nd</sup> Semester/Course 2016-2017 FINISHED):** This second phase was conducted during the second year of the project and the TeSLA system started to provide functionalities in order to be fully functional for the last pilots in this phase. This pilot involved more than 3,500 learners during 4 thematic pilots to test the 4 main authentication/authorship instruments:
- 1) Facial and voice recognition: test learners' authentication using these biometric instruments of the system.
- 2) Keystroke dynamics: test learners' authentication using this biometric instrument of the system.
- 3) Natural language: test the authorship of the deliverables using forensic analysis.
- 4) Plagiarism techniques: test the authorship of the deliverables using plagiarism instruments.

Experts in the 2<sup>nd</sup> pilot worked in the following areas:

- Validation of the features of the selected courses and assessment activities.
- Assessment of the pilot taking into account the developed fit-for-purpose methodology and standards and elaboration of the assessment report.
- Validation of the use and the functionalities of the authentication/authorship technologies.
- Elaboration of a proposal for improvement of the assessment methodology.

In order to properly fulfil and complement all these tasks, the 3 regular panels conducted online interviews with relevant stakeholders.

- **3.3 Large Scale Pilots (1<sup>st</sup> and 2<sup>nd</sup> Semester/Course 2017-2018 ONGOING):** This final phase of the pilots is being conducted during the third year of the project. The goal of this phase is threefold:
- 1) To test the TeSLA system's integration and scalability.
- 2) To test the refinement of the TeSLA modules and the European e-assessment Model performed with the feedback of previous pilot phases in a prelarge scale scenario.
- 3) To test the reliability of authentication and authorship mechanisms.

Two rounds will be performed during this phase. The first one will involve about 6,500-7,000 learners and the second and final round will involve between 10,000 and 14,000 learners.

Experts in the 3<sup>rd</sup> pilot will work in the following areas:

- Validation of the features of the selected courses and assessment activities.
- Assessment of the pilot taking into account the developed fit-for-purpose methodology and standards and elaboration of the assessment report.
- Validation of the use and the functionalities of the authentication/authorship technologies.
- Elaboration of a proposal for improvement of the assessment methodology.

In order to properly fulfil and complement all these tasks, 7 panels will be assigned to one of the 7 aforesaid universities involved in the project (see Section 2.1) and will conduct site visits to the institutions and face-to-face interviews to the relevant stakeholders.