Terms of Reference

for External Experts Members of the

EQCB

External Quality Control Board

Supporting the energy transition of the building stock

Co-funded by the European Union
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Summary Card

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<thead>
<tr>
<th>Project title</th>
<th>Supporting the Energy Transition of the Building Stock</th>
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</thead>
<tbody>
<tr>
<td>Project acronym</td>
<td>SHERLOCK</td>
</tr>
<tr>
<td>Project reference no.</td>
<td>101105629-2022</td>
</tr>
<tr>
<td>Call</td>
<td>ERASMUS-EDU-2022-PI-ALL-INNO</td>
</tr>
<tr>
<td>Type of action</td>
<td>ERASMUS Lump Sum Grants</td>
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<tr>
<td>Granting Authority</td>
<td>EACEA, European Education and Culture Executive Agency</td>
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</table>

Coordinating Institution | UNIVERSITÀ DEGLI STUDI DI GENOVA, UniGe |
Project start date       | 1st September 2023                            |
End date                 | 31st August 2026                               |

Work Package ref.       | WP.5 Quality assurance and monitoring            |
WP leading Institution   | NATIONAL UNIVERSITY OF IRELAND MAYNOOTH, NUIM   |
Document status          | Version 1.0, October 2023                       |
Dissemination level      | Public. An open public call to recruit the experts will be published on the website of UniGe’s international cooperation Office https://unige.it/international strategies, in order to ensure publicity and transparency to the recruitment. See also at section 4.4 “Subcontracting” of the DoA - Description of Action, page 66. |
Terms of Reference (ToR) for external evaluator

Subcontracting Institution: UNIVERSITÀ DEGLI STUDI DI GENOVA, UniGe
Framework: Erasmus+ ALL-INNO project SHERLOCK
Duration of assignment: Until 31st August 2026
Expert fee: Defined by the project budget
Documents: CV (Europass format or similar)
Language: All documents should be provided in English.
Expected deadline: Friday 20th October 2023
Procedure: The recruitment application must be sent by email to <intstrat@unige.it>. The email subject has to quote “SHERLOCK EQCB”.

Background information
Funding: Erasmus+ EACEA Key Action: KA2 Alliance for Innovation
Coordinating Institution: University of Genova, UniGe - IT

The ALL-INNO (Alliances for Innovation) projects within the Erasmus+ Programme, Key Action 2, foresee as mandatory the carrying out of quality control and monitoring reviews aimed at checking the implementation of the project activities and the related deliverables, from the chronological - administrative - academic - point of view. Such activities are planned in the framework of a specific work-package (WP).

The set of SHERLOCK quality assurance and monitoring actions envisages:

i. an internal quality control board (IQCB), composed by representatives of the project partnership, mainly appointed on the collection of info - questionnaires - material - data - outputs of the project;

ii. an external board (External Quality Control Board, EQCB) composed by 3 experts external to the partnership - and then having no employment-juridical relationship - to appoint after the KOM to monitor and evaluate SHERLOCK activities on the basis of the info collected by the IQCB; the present ToR are referred to the EQCB;

iii. a second external board (External Advisory Board, EAB) that will provide specific advice / feedback to the scientific contents of the project (e.g., case studies, learning outcomes, topical issues, etc.). The EAB will be nominate by a different set of ToR.
Aims of the project. General and Specific objectives:

The SHERLOCK project aims to boost innovation at EU level by designing and implementing an original and advanced educational framework based on micro-credentials for upskilling the workforce and lifelong learning. It will integrate and combine a multidisciplinary green and digital skills portfolio towards the cooperation and knowledge exchange flow across different teaching and learning excellence in Ukraine by establishing innovative Master Courses (MCs) on Energy Sustainability in Buildings (ESB) in line with the Bologna Process principles.

SHERLOCK aims to create a MOOC-based MicroMaster programme and a VET oriented short training course based on micro-credentials and case study education, targeting students and professionals from both the building energy retrofitting and financial sectors. The project will help overcome the skills mismatch between financial operators and project developers.

The programme will be codesigned with VET providers and stakeholders through the setup and deployment of the SHERLOCK Knowledge Centres, which will act as a reference point for exchanging ideas and as a lasting alliance between universities, businesses, VET providers and public institutions. SHERLOCK will define the learning objectives, design the programme content & materials, implement and monitor the acquisition of the green and digital skills required in the building energy renovation sector. Finally, it will develop guidelines for educators in HE institutions and VET providers on how to co-design and implement innovative MicroMaster programmes to support lifelong learning and upskilling of the labour market.

Main duties of the EQCB

- To revise the Quality Plan, produced under the coordination of NUIM as competent WP leader;
- To participate to two annual coordination meetings and the final dissemination conference, planned as follows: November 2024 in Bratislava, September 2025 in Sevilla, and June 2026 in Lisbon as Final Dissemination Conference;
- To check the info / data / questionnaires collected by the IQCT; then, to elaborate three evaluation reports, one per each project year;
- To organize an external review of the deliverables, as detailed in the following.

You find now an extract of “Description of Action” DoA, whereas the EQCB tasks are
detailed, as well as the budget tables quoting the fees for the three EQCB participants. The costs of the mobility flows for the aforesaid meetings, together with the annual fees, will be managed and reimbursed by UniGe directly to the three EQCB’s members, by means of to the bank references they indicate.

As regards the appointment of the 3 EQCB members, these are the requirements asked to the applicants:
- a well-experienced teaching position, expert in Bologna Process, quality assurance in Higher Education, accreditation and so on; relevant in STEM disciplines; and/or
- a top-management position experienced in governance of State Agencies / Authorities / Ministries’ bodies, competent on energy saving & efficiency.

WP5 – Extract of the Application
Project management, quality assurance and monitoring and evaluation strategy

<table>
<thead>
<tr>
<th>Description of: i) measures foreseen to ensure that the project implementation is of high quality and completed in time; ii) methods to ensure good quality, monitoring, planning and control; iii) evaluation methods and indicators (quantitative and qualitative) to monitor and verify the outreach and coverage of the activities and results (including unit of measurement, baseline and target values). The indicators proposed to measure progress should be relevant, realistic and measurable.</th>
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External Quality Control Board (EQCB). EQCB will be responsible for performing the preliminary quality controls (see the Quality Assurance and Monitoring section below) done internally by the consortium. The assessment will be mainly carried out based on the check of the indicators for progress as defined in the QCP. EQCB will act both on own actions and based on the QCP. The EQCB will ensure a smooth implementation of the project through the correct quality control and management procedures. EQCB will work in close cooperation with IQCB.

| ..... omissis ..... |

Quality Assurance and Monitoring. All the necessary monitoring tools (e.g., Gantt, document control, peer review, etc.) will be applied to support the development of SHERLOCK. An efficient internal communication platform (i.e., a reserved area of the website, a shared in-cloud folder or similar) will complement them. This platform will offer independent access to important documents, code, meeting agendas, supporting materials, individual to-do lists and other miscellaneous project information. The coaction of the monitoring instruments and the communication platform will create an early warning system to identify quality deviations from the work plan and far before all the evaluation phases. This allows to set up contingency or recovery plans at an early stage. The IQCB is responsible for implementing quality assurance and monitoring procedures according to the QCP. Quality Assurance includes the following tasks: (i) Collecting expected outcomes and deliverables from project activities; (ii) Checking the timetable and resources for each milestone leading to the outcomes; (iii) Creating the indicators for different milestones; (iv) Collecting the information for the final quality report; (v) Collecting the participants’ feedback in piloting the courses, aligned with ESG 2015 and EQAVET; (vi) Producing a final quality report.
Questionnaires and surveys for gathering feedback will be drafted according to the needs of the project. This gives the basis to present a synthesis of results and an analysis based both on feedback of the strengths and weaknesses of the process and associated final materials. From this analysis, improvements to the process or tools can be identified. If the deliverables are compliant with the QCP procedures, they will be submitted to the European Commission. The assessment of the deliverables will be done based on the following criteria: (i) Timeliness of delivery; (ii) Balanced structure, fitting to the content and resources; (iii) Appropriate usage of templates, pictures, graphs, and tables. All project deliverables will be subject to acceptance by the following parties, in the order indicated: (i) TL; (ii) WPL; (iii) PMT; (iv) MB. All deliverables will be internally peer reviewed before their final submission. Depending on the deliverable’s scope and objectives the most appropriate experts coming from the consortium partners will be chosen. The IQCB will propose these experts. If necessary, the support of EAB will be sought. The deliverables’ production process will go through the subsequent phases in an iterative manner where needed: new deliverable document (TL/deliverable responsible) → initial draft (all WP/task partners involved) → consolidation (TL/deliverable responsible) → peer review (selected internal or external peers) → final editing (TL/deliverable responsible) → final approval (MB) → submission to EC (PC). A Quality Control Process Model (QCPM), reported in the QCP, will be developed for the implementation of SHERLOCK project.

Evaluation Strategy. To ensure the effective progress towards SHERLOCK’s goals and assess its final success, partners agreed on and defined some indicators at WP level to measure performance and assess the activities to be carried out. The set of indicators and Quality Management Tools (QMTs) are defined as shown in Table 2.

<table>
<thead>
<tr>
<th>WP</th>
<th>Indicators</th>
<th>QMTs</th>
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<tbody>
<tr>
<td>WP1</td>
<td>1 KoM (min. 30 participants), min. 3 international mgt. meetings (at least 20 participant each), min. 4 online meetings (at least 20 participant each), 2 deliverables submitted</td>
<td>Satisfaction surveys for meetings, EACEA feedback, fulfilment of the quantitative KPIs</td>
</tr>
<tr>
<td>WP2</td>
<td>1 KC (min. 100 institutions engaged), 1 report on ER in EU (D2.3)</td>
<td>Satisfaction surveys institutions, EAB feedback, QCPM and Gannt for report</td>
</tr>
<tr>
<td>WP3</td>
<td>Min. 10 case studies, PLOs identifications, 15 micro-credentials definition, number of downloads of material (&gt;1000)</td>
<td>Stakeholders’ and EAB feedback, fulfilment of the quantitative KPIs</td>
</tr>
<tr>
<td>WP4</td>
<td>1 MicroMaster (&gt;300 participants) and 1 short course (&gt;200 participants) and 1 information course piloting (&gt;1000 participants)</td>
<td>Learners’ satisfaction, EAB and EQCB feedback, fulfilment of the quantitative KPIs</td>
</tr>
<tr>
<td>WP5</td>
<td>1 QP (D5.1), 1 QCPM</td>
<td>EQCB and EAB Feedback</td>
</tr>
<tr>
<td>WP6</td>
<td>1 Diss. Plan (D6.1), 1 website (&gt;10k views), 1 social media channel (&gt;200 followers), 4+ newsletters, 1 intermediate event (&gt;100 participants), 1 final conference (&gt;100 participants), overall number of people informed about project activities via social media and newsletters (&gt;10k), professionals involved in multiplier events (&gt;500 in total)</td>
<td>Participants’ satisfaction questionnaires, QCPM (for reports), Gannt, fulfilment of the quantitative KPIs</td>
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Workplan – WP.5
WP5 overview

<table>
<thead>
<tr>
<th>Work Package name:</th>
<th>Quality assurance testing and monitoring</th>
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</thead>
<tbody>
<tr>
<td>Duration:</td>
<td>M1 - M36</td>
</tr>
<tr>
<td>Lead Beneficiary:</td>
<td>NUIM</td>
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**Objectives**

- Ensure quality of learning in the SHERLOCK’s programmes and verify the successfully acquisition of the learning objectives by the students enrolled. This will include informative and summative evaluation from both students and educators. We will be especially interested in evaluations that support the improvement of the programme in the aspect of entrepreneurial skills and mindset.
- Ensure the quality of events and outputs by bringing domain expertise to verify that content is relevant and builds on current knowledge in an entrepreneurial approach. This will include establishing prerequisite knowledge and experience for participants.
- Assure that the learning outcomes feed into the design of learning and educational resources and those outputs achieve the overarching project aims and to secure a sustainable use of the results beyond the project period.

The activities comprehend the set-up of a Quality Plan, the ongoing evaluation and adaptation of the project’s work in events and in the production of learning materials, and the assessment of impact and sustainability. The IQCB will be appointed within this WP and EQCB closely cooperate within this WP.

**Subcontracting**

**Details on subcontracted project tasks (as opposed to direct implementation by the Beneficiaries/Affiliated Entities).**

**Note:** Subcontracting concerns the outsourcing of a part of the project to a party outside the consortium. It is not simply about purchasing goods or services. We normally expect that the participants to have sufficient operational capacity to implement the project activities themselves. Subcontracting should therefore be exceptional. Include only subcontracts that comply with the rules (i.e. best value for money and no conflict of interest; no subcontracting of project coordination tasks).

<table>
<thead>
<tr>
<th>Subcontract no.</th>
<th>Subcontract name</th>
<th>Description (incl. task number and BEN to which it is linked)</th>
<th>Estimated Costs (€)</th>
<th>Justification (why is subcontracting necessary?)</th>
<th>Best-Value-for-Money (how do you intend to ensure it?)</th>
</tr>
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| S1.1            | EQCB             | External Control Quality Board contributing to T5.2 and T5.3 | 20,100              | External validation of project implementation    | Open public call to recruit high level experts at market rates. Cost Estimation:  
- Participation in three meetings: 1.020 €/ca./mobility = 3,060 €.  
- Daily person cost of 300/€ca. for 15.5-19 working days: 5,680ca. per three experts = 17,040 €. |

**Objectives of external evaluation**

The primary task of the external evaluators is to supervise the implementation of project activities and to provide the assessment of various project aspects such as relevance (Is
the project still relevant in terms of its goals and achievements?), efficiency (Are the activities within the work-packages done on time and within planned budget?), effectiveness (How well are the project specific objectives met?), impact (at the different levels) and sustainability (What would stay after the project is finished?).

**General responsibilities of an external evaluator**

**Expected outputs**

- Evaluate the quality of project activities and outputs
- Present preliminary conclusions based on desk research
- Write monitoring report based on the initial evaluation
- Submit 3 annual reports by September 2026 (1 report every project year)
- Assess effectiveness and efficiency of the budget spending
- To carry out an external review of the following deliverables:
  - D1.2, Ethics and gender balance plan and Data Management Plan
  - D2.1, Engagement strategy plan & stakeholder identification and mapping
  - D3.2, Educational needs in the building energy renovation sector
  - D3.3, SHERLOCK’s programmes: learning objectives, structure and contents
  - D5.1, Quality Plan
  - D5.2, Final Report
  - D6.1, Communication, Dissemination, Sustainability and Exploitation and Replication Plan
  - D6.2 Multidisciplinary teaching and training methods based on micro-credentials - Guidelines for Educators
- Evaluate the project as a whole.

Therefore, the main responsibilities of the EQCB will be related to check the preliminary control made by the IQCB and the documentation assessment of the quality of the project results. The assessment will be mainly carried out, in addition to the report of the IQCB, on the basis of the check of the indicators for progress and relative sources of info listed in the LFM. The EQCB will act both on the basis of own actions and on the basis of the Quality Plan. Main principles of the EQCB, to be confirmed by the QP, will be related to the setting out the quality and management matters for the project, ensuring that the quality requirements are achieved appropriately and that the measures taken for protecting the smooth progression of the project are effectively dealt with, both at internal and external level. The QP will be integrated by the EQCB roadmap.

In order to achieve envisaged outputs, an external evaluator can schedule independent
monitoring visits. However, it is highly suggested to attend at least one project management meeting.

**Expertise needed:**
- At least 5 years of experience in conducting data analysis (desk research, quantitative and qualitative data analysis)
- Knowledge and understanding of project monitoring and evaluation
- Experience in working with the European Commission, implementing ERASMUS+ projects, and/or other international organisations.

**Additional criteria**
- Language: Good communication skills in English (written and oral) and experience in reporting and publications.
- Readiness to work in cooperation with experts coming from other Member States and chosen as an additional external expert.

**Contacts:** Mr. Angelo MUSAIO, University of Genoa, IT, intstrat@unige.it

**Call published on:** https://unige.it/internationalstrategies

Applications for participation, written in English language and accompanied by a professional CV and a copy of an identification document, must be sent only by email to UniGe International Cooperation Office at the email address intstrat@unige.it indicating “SHERLOCK EQCB” in the subject of the email.

The application must be received within 5 (five) working days from the date of publication on the website https://unige.it/internationalstrategies.