



## **D2.2: Societal Readiness Level (SRL) Assessment of GenAI tools integration in secondary education**



Funded by  
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## Vision of the project

GenAI4ED is here to empower students, teachers, parents, and guardians with the knowledge and skills to navigate the world of generative AI in education. We want to foster a digital-literate society that can make smart, informed decisions about the role of AI in education.



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## Project Title

|                              |                                                                                             |
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| <b>Work Package</b>        | WP2                                                                                              |
| <b>Authors</b>             | Eleftheria Tzamali, Emmanouil Spanakis, Vangelis Sakkalis                                        |
| <b>Contributors</b>        | IDTRYMA TECHNOLOGIAS KAI EREVNA (FORTH)                                                          |
| <b>Reviewing partners</b>  | THE CYPRUS INSTITUTE (Cyl)<br>KONNEKTABLE TECHNOLOGIES LIMITED (KT)<br>TRILATERAL RESEARCH (TRI) |
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## Executive Summary

This deliverable presents the methodology, data collection, and analysis conducted under *Task 2.3: Societal Readiness Level (SRL) Assessment* of the GenAI4ED project. The goal of this task is to evaluate the preparedness of (European) societies to adopt and integrate Generative AI (GenAI) in lower and upper secondary education (ISCED levels 2 and 3).

A comprehensive SRL framework was developed based on six key dimensions: Technological Readiness, Institutional Capacity, Socio-Cultural Adaptability, Regulatory and Ethical Alignment, Governance Readiness, and Policy Readiness.

To operationalize the SRL framework, we conducted a structured desk-based scoping review to identify relevant data sources and indicators aligned with the SRL dimensions, and compiled these into a structured Excel dataset using high-quality inputs, including international surveys, institutional and policy reports, and EU-level databases. Relevant tasks such as *Task 1.1: Systematic review of GenAI in education* and *Task 2.1: Systematic review of current policies and guidelines on GenAI in education* informed our indicator selection. In parallel, customized questionnaires were developed and deployed via the EUSurvey platform, gathering early feedback from educators (n=43) and parents (n=30)—primarily in schools in Crete, Greece. Their responses provide additional context on stakeholder attitudes, familiarity with GenAI, and perceived challenges. The construction of the stakeholder questionnaires was guided by the outcomes from *Task 1.3: Co-design of end-users' requirements and system specifications*.

Our findings indicate that while many countries have achieved a strong technological foundation, ethical, governance, and policy readiness remain underdeveloped. This suggests that advanced technological infrastructure alone is not sufficient to ensure broader societal readiness for integrating GenAI in education. We also observed that levels of readiness vary greatly from country to country, and even within the same country across different dimensions (e.g., strong technology capacity but weaker policy or training support).

These insights are consistent with findings from the Greek context, which similarly show that technological access alone does not determine the successful integration of GenAI in education. Other factors, such as pedagogical approaches, policy support, and teacher training, play a more decisive role.

The results of this assessment will support downstream tasks including *Task 3.5: Training Resource Hub* and *Task 5.6: Produce guidelines and policy recommendations for GenAI integration in secondary education*, ultimately informing a more effective and responsible strategy for GenAI integration in secondary education across Europe.

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## Acronyms

|           |                                                                               |
|-----------|-------------------------------------------------------------------------------|
| AI        | Artificial Intelligence                                                       |
| AI4EU     | Artificial Intelligence for Europe                                            |
| AI4STEM   | Artificial Intelligence for Science, Technology, Engineering, and Mathematics |
| AI4T      | Artificial Intelligence for Teachers                                          |
| Cyl       | The Cyprus Institute                                                          |
| D         | Deliverable                                                                   |
| DEC       | Digital Education Council                                                     |
| EA        | Ellinogermaniki Agogi                                                         |
| EC        | European Commission                                                           |
| ERIC      | Education Resources Information Centre                                        |
| EU AI Act | European Union Artificial Intelligence Act                                    |
| GDPR      | General Data Protection Regulation                                            |
| GenAI     | Generative Artificial Intelligence                                            |
| GenAI4ED  | Generative Artificial Intelligence for Education                              |
| GPT       | Generative pre-trained transformer                                            |
| ISCED     | International Standard Classification of Education                            |
| K-12      | Primary and Secondary Education: from kindergarten to 12 <sup>th</sup> grade  |
| OECD      | Organisation for Economic Co-operation and Development                        |
| SRL       | Societal Readiness Level                                                      |
| STEM      | Science, Technology, Engineering, and Mathematics                             |
| T         | Task                                                                          |
| TRI       | Trilateral Research                                                           |
| TRL       | Technology Readiness Level                                                    |
| UK        | United Kingdom                                                                |
| UNESCO    | The United Nations Educational, Scientific and Cultural Organization          |
| UNICEF    | United Nations Children's Fund                                                |
| USA       | United States of America                                                      |
| WE        | Wonderful Education                                                           |
| WP        | Work Package                                                                  |

## 1. Introduction

### 1.1 Objectives and scope of deliverable

The Societal Readiness Level (SRL) framework is designed to evaluate how prepared various stakeholders such as educators, students, parents, institutions, and policymakers are to adopt Generative AI (GenAI) in education. Its purpose is twofold: first, to assess the current level of readiness across relevant dimensions; and second, to identify the key actions -such as policies, training programs, and infrastructure investments- needed to move toward higher levels of readiness.

This deliverable presents the methodological design, implementation process, and final outputs of *Task 2.3: Societal Readiness Level (SRL) Assessment*, as part of the GenAI4ED project. It outlines the development of the assessment framework, the data collection strategy, and the analytical steps taken to evaluate the societal preparedness for integrating GenAI technologies into lower and upper secondary education (ISCED levels 2 and 3).

The overall objective is to provide a comprehensive and data-driven understanding of GenAI readiness across multiple European countries. This foundation will be used to guide evidence-based policy recommendations and support decision-making by educational authorities, national governments, and EU-level policy bodies involved in the integration of GenAI in secondary education. The SRL assessment covers several key dimensions including 1) *Technological Readiness*, 2) *Institutional Capacity*, 3) *Socio-Cultural Adaptability*, 4) *Regulatory Alignment and Ethical Readiness*, 5) *Policy*, and 6) *Governance Readiness*.

By capturing both structural and cultural aspects of readiness, this deliverable aims to inform practical pathways for responsible and inclusive GenAI integration in secondary education systems.

### 1.2 Role of SRL in the GenAI4ED Framework

The objective of *Task 2.3: SRL assessment* within the GenAI4ED project is to identify enablers and barriers that affect the meaningful integration of GenAI technologies in secondary education, across diverse national contexts. To this end, FORTH has designed and applied a comprehensive SRL assessment methodology that complements educators' and students' perceptions examined in *Task 1.1: Systematic review of GenAI in education* and regulatory mappings conducted in *Task 2.1: Systematic review of current policies and guidelines on GenAI in education*. The SRL framework provides a multi-dimensional lens through which to assess the alignment and readiness of existing infrastructures, policies, and stakeholder attitudes.

Furthermore, the outcomes of Task 2.3 directly inform other parts of the project. Specifically, they contribute to *Task 5.6: Produce guidelines and policy recommendations for GenAI integration in secondary education*, by providing evidence-

based input on societal readiness that shapes strategic guidance and policymaking efforts. In parallel, they inform *Task 3.5: Training Resource Hub*, which focuses on identifying gaps in AI literacy and developing targeted educational and support materials for teachers and learners.

### 1.3 Structure of the Document

The remainder of this document is structured as follows:

Section 2 introduces the methodology of the SRL framework, including the desk-based scoping review, the selection of data sources, the data pre-processing steps, and the methodological approach used for the custom questionnaires (design, target groups, and deployment process).

Section 3 presents the data analysis and findings from the desk-based review, such as cross-national comparisons and indicator-level correlations.

Section 4 reports the analysis and findings from the 73 questionnaire responses collected so far (43 from educators and 30 from parents), along with conclusions drawn from these results.

Section 5 concludes the deliverable with a discussion of challenges, limitations, and policy implications.

## 2. Methodology

### 2.1. Methodological Overview

The SRL framework in GenAI4ED is designed to assess the multifaceted preparedness of societies to integrate Generative AI technologies in secondary education. Inspired by models such as Technology Readiness Levels (TRLs), the SRL framework<sup>1</sup> expands the focus beyond technological maturity to include institutional, socio-cultural, ethical, and governance factors.

The SRL assessment was designed as a structured, desk-based research effort combining multiple types of data derived from policy reports, surveys, international datasets, and internal project deliverables. The overarching goal was to develop a multidimensional, evidence-based framework to assess readiness across European countries for the educational deployment of GenAI tools.

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<sup>1</sup> Bernstein, M.J., Nielsen, M.W., Alnor, E. et al. The Societal Readiness Thinking Tool: A Practical Resource for Maturing the Societal Readiness of Research Projects. *Sci Eng Ethics* 28, 6 (2022).  
<https://doi.org/10.1007/s11948-021-00360-3>

In addition to the desk-based review, which relied on existing international sources, we also developed and deployed custom questionnaires to capture data that was not available or up-to-date in public datasets. These questionnaires targeted educators and parents and focused on understanding stakeholder perceptions, GenAI literacy, and practical challenges in integrating GenAI into education. The questionnaires serve to complement the desk-based analysis by filling indicator gaps (e.g., perceptions, training availability) and by providing richer, context-specific insights.

This SRL framework embraces a holistic understanding of readiness, drawing inspiration from broader conceptualizations such as the Digital Education Council's (DEC)<sup>2</sup> AI Readiness Framework (developed for higher education) and the UNESCO Readiness Assessment Methodology<sup>3</sup> (developed for the ethical use of AI in education). While these frameworks propose between five and ten dimensions—including legal, social, educational, and infrastructural readiness—they served as foundational references to tailor a methodology suitable for secondary education and aligned with GenAI-specific challenges and opportunities.

In our case, six key dimensions were selected to reflect the diverse enablers and barriers that affect GenAI integration secondary education systems. The decision was guided by: a) The requirement of the task to adopt a holistic lens on societal readiness; b) The availability of per-dimension readiness data from public reports across European countries; c) The alignment with EU and international frameworks, such as UNESCO<sup>4</sup>, the EU AI Act<sup>5</sup>, and other policy and institutional initiatives.

This tailored six-dimensional structure ensures both conceptual robustness and empirical feasibility for cross-country analysis, enabling a practical yet comprehensive readiness assessment for GenAI in secondary education:

- **Technological Readiness:** Evaluates the availability of digital infrastructure, connectivity, and equipment necessary to deploy AI tools in school environments.
- **Institutional Capacity:** Assesses the readiness of educational institutions to incorporate AI through curricula, teacher training, and student engagement opportunities.
- **Socio-Cultural Adaptability:** Examines how stakeholders perceive, accept, and engage with GenAI tools, including psychological readiness and cultural attitudes toward innovation.
- **Regulatory Alignment and Ethical Readiness:** Reviews the existence of policies, ethical guidelines, and safeguards that ensure responsible and fair use of AI technologies in schools.

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<sup>2</sup> <https://www.digitaleducationcouncil.com/post/ten-dimension-ai-readiness-framework>

<sup>3</sup> <https://www.unesco.org/ethics-ai/en/ram>

<sup>4</sup> <https://www.unesco.org/en/articles/guidance-generative-ai-education-and-research>

<sup>5</sup> <https://www.europarl.europa.eu/topics/en/article/20230601STO93804/eu-ai-act-first-regulation-on-artificial-intelligence>

- **Governance Readiness:** Considers the broader readiness of public institutions to manage and support AI implementation in education, including cross-sectoral coordination and infrastructural capacity.
- **Policy Readiness:** Closely related to governance, this dimension assesses the presence of national or regional policies that promote and guide the integration of GenAI in education, including AI education strategies and dedicated implementation roadmaps.

This conceptual framework aligns closely with the project's overarching objectives to bridge GenAI technologies with human skills and societal needs. By identifying strengths and weaknesses across these dimensions, the SRL framework informs targeted interventions and guides strategic planning for national and EU-level education policies.

## 2.2. Framework Operationalization and Indicator Design

The selected SRL dimensions were operationalized by mapping each to a set of observable indicators. The selection was informed by the established readiness frameworks (e.g., UNESCO Readiness Assessment Methodology<sup>6</sup>) and it was guided by the existing data sources. Examples of indicators per dimension include:

- **Technological readiness:** Availability of digital equipment in schools; Internet connectivity and bandwidth; Capacity to support GenAI-specific tools and applications.
- **Socio-Cultural Adaptability:** Familiarity and usage of GenAI tools; Perceptions and evaluations of GenAI by students and educators; Interest in AI/GenAI; Social support within the school community; Psychological readiness: concerns, fears, and trust related to GenAI.
- **Institutional Capacity:** Inclusion of Informatics and AI in school curricula; Existence of AI literacy programs; Access to teacher and student training on AI/GenAI; Extracurricular workshops or school-led initiatives.
- **Regulatory Alignment & Ethical Readiness:** Existence of national or institutional guidelines for AI use in education; Ethical principles related to fairness, privacy, and transparency in GenAI adoption.
- **Policy Readiness:** National AI strategies related to education; Policies promoting digital and AI-related transformation in schools; Strategic vision around GenAI inclusion in teaching and learning.
- **Governance Readiness:** Government initiatives on AI in public service delivery; Readiness of national data systems, infrastructure, and administration; Alignment with broader digital transformation agendas.

<sup>6</sup> <https://www.unesco.org/ethics-ai/en/ram>

### 2.3. Source Selection and Data Collection

Data sources were selected through a structured desk-based scoping review, prioritizing reliability, dimensional coverage, and cross-national comparability. This method involved a systematic examination of publicly available surveys, institutional reports, and policy documents, guided by predefined criteria aligned with the SRL dimensions. The scoping nature of the review allowed us to broadly map the landscape of GenAI readiness across countries, while the structured format ensured consistency in how data sources and indicators were selected and categorized.

The main selection criteria were:

- Alignment with one or more SRL dimensions;
- Availability of country-level data;
- Institutional credibility (e.g., EU agencies, UNESCO, Oxford Insights);
- Relevance to secondary education or digital readiness at large.

A total of six core sources were selected, including:

- 2nd Survey of Schools – ICT in Education<sup>7</sup>  
*DG Communications Networks for the European Commission, 2019*  
This large-scale EU-wide survey collected responses from head teachers, teachers, students, and parents in EU28, Norway, Iceland, and Turkey. It provides detailed information on digital infrastructure, access to technology, patterns of ICT use in schools, and stakeholder attitudes toward the integration of technology in education.
- AI in European Schools<sup>8</sup>  
*Vodafone Foundation, 2024*  
Conducted in seven European countries, this survey targeted teenage students (aged 12–17) to assess their accessibility to AI tools, familiarity and usage patterns, perceived support environment, concerns and fears, and the role they foresee for AI in their future careers.
- Informatics Education at School in Europe<sup>9</sup>  
*Eurydice Report, European Education and Culture Executive Agency, 2021*  
This report analyses how informatics (including AI) is addressed in school curricula across Europe. It evaluates whether informatics is taught as a distinct subject, integrated into other disciplines, or supported through optional modules.

<sup>7</sup> <https://op.europa.eu/en/publication-detail/-/publication/78afb58c-46ef-11e9-a8ed-01aa75ed71a1/language-en>

<sup>8</sup> [https://skillsuploadjr.eu/docs/contents/AI\\_in\\_European\\_schools.pdf](https://skillsuploadjr.eu/docs/contents/AI_in_European_schools.pdf)

<sup>9</sup> <https://eurydice.eacea.ec.europa.eu/publications/informatics-education-school-europe>

The data supports understanding of institutional capacity and curriculum-level AI literacy.

- Government AI Readiness Index<sup>10</sup>

*Oxford Insights, 2024*

This global index evaluates the readiness of 188 governments to implement AI in public services. It is structured around 40 indicators grouped under three main pillars: Government, assessing digital governance capacity and strategic vision; Technology Sector, examining innovation ecosystems and R&D spending; and Data & Infrastructure, measuring the availability and robustness of digital infrastructure needed to support AI implementation. These pillars are relevant for assessing governance readiness in the SRL framework.

- The State of Artificial Intelligence and Education Across Europe<sup>11</sup>

*Council of Europe, 2024*

This study investigates how European member states are addressing AI in education through three perspectives: learning with AI, learning about AI, and preparing for AI. It is based on survey responses from national authorities and highlights how these efforts align with the Council of Europe's values (human rights, democracy, and rule of law).

- Artificial Intelligence Role in K12 Education<sup>12</sup>

*European Schoolnet, 2021*

This report synthesizes the findings from 17 participating countries through questionnaires and expert interviews. It examines policy initiatives, pilot projects, and the use of AI at various levels—learner-centered, teacher-focused, and system-wide. It also identifies challenges, such as data governance and professional development needs, and emphasizes the value of cross-country collaboration.

In addition to the above sources, context-specific data was gathered through custom questionnaires designed in close collaboration with *Task 1.3: Co-design of end-users' requirements and system specifications*. These instruments aimed to capture stakeholder expectations, evaluation criteria for GenAI tools, and perceived pedagogical challenges in real educational settings. The development, deployment, and analytical treatment of these questionnaires form an integral part of the overall methodology and are presented in detail in Section 4.

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<sup>10</sup> <https://oxfordinsights.com/ai-readiness/ai-readiness-index/>

<sup>11</sup> <https://www.coe.int/en/web/education/-/the-state-of-artificial-intelligence-and-education-across-europe-2>

<sup>12</sup> <http://www.eun.org/documents/411753/7316225/Artificial+Intelligence+Role+in+K12+Education+Report/0b9f5e20-62f7-4966-a58e-fdacc9199248>

## 2.4. Questionnaire Design

To complement the structured dataset and capture context-specific insights, we designed two targeted questionnaires addressing key stakeholders in secondary education: teachers and parents. These instruments are intended to:

- Validate and enrich the findings from pre-existing reports and datasets.
- Capture up-to-date, first-hand perspectives from individuals interacting directly with GenAI tools or affected by their use.

The goal was to capture the local pulse and lived experiences of stakeholders within educational communities, and to gather more granular insights across all SRL dimensions, including technological, institutional, socio-cultural, ethical, and curriculum-related readiness. The content of the questionnaires was informed by the indicators defined in Section 2.1 and aligns with the existing dataset structure. This ensures that the qualitative responses can be mapped to the same dimensions and used for comparative and complementary analysis.

Each questionnaire is tailored to its target audience and structured around the six SRL dimensions. Common themes include:

- Familiarity with GenAI tools
- Perceived benefits and concerns
- Institutional support and training
- Awareness of policies and ethical guidance

Question types include Likert scales, multiple-choice, binary yes/no responses, and open-ended comments to allow for nuanced feedback.

## 2.5. Questionnaire Deployment via EU Survey Platform

The questionnaires for parents<sup>13</sup> and educators<sup>14</sup> were deployed using the European Commission's EUSurvey platform to ensure compliance with data protection regulations and facilitate multilingual access. At the time of reporting, the surveys are active and being disseminated through school networks, educators' associations, and stakeholder mailing lists.

To support the research objectives of the GenAI4ED project a questionnaire that was developed to gather insights into the current use, perceptions, and challenges associated with Generative Artificial Intelligence (GenAI) tools in secondary education. As part of the outreach strategy, the questionnaire and its accompanying invitation were communicated to the Directorate of Secondary Education of Heraklion (Διεύθυνση

<sup>13</sup> <https://ec.europa.eu/eusurvey/runner/7af7ef8c-05e4-6ba3-9439-e094c75ae970>

<sup>14</sup> <https://ec.europa.eu/eusurvey/runner/1662f70c-5b00-8431-2faf-97258f7b9ea7>

Δευτεροβάθμιας Εκπαίδευσης Ηρακλείου), a major educational administration in Greece responsible for 101 secondary schools (50 Gymnasias, 38 General Lyceums, and 13 Vocational Lyceums) serving approximately 2,300 educators and 22,500 students. This communication included an official invitation titled "Διαμορφώστε μαζί μας το μέλλον της ΤΝ στην Εκπαίδευση – Η γνώμη σας είναι σημαντική!", encouraging the participation of educators and parents in a brief, confidential survey aimed at capturing current practices, challenges, and perceptions surrounding the use of Generative Artificial Intelligence (GenAI) tools—such as ChatGPT, Canva, and MagicSchool—in secondary education. The communication aimed to inform the members of the Directorate and raise awareness among educational stakeholders about the opportunity to participate voluntarily in the research. The invitation emphasized the importance of shaping the future of AI in education and provided secure online access to the questionnaire via separate links for educators and parents. All responses were anonymous and collected solely for research purposes (all data collection tool was made available online via secure links to the EU Survey platform, tailored separately for educators and parents). This approach enabled the project team to connect with a wide and diverse audience within the secondary education sector of Heraklion, without implying formal distribution or institutional endorsement.

Initial participation has been promising, and the collected data will be integrated to refine SRL profiles and inform cross-dimensional analysis.

## 2.6. Data Pre-processing

In several cases, data was missing for specific countries—either because certain questions were not included in a given survey, relevant data was not made publicly available, or the country did not provide responses for particular indicators. Additionally, some sources such as *The State of Artificial Intelligence and Education Across Europe*<sup>15</sup> only provided aggregated European-level statistics, limiting country-level granularity.

To ensure consistency and comparability, the raw data underwent several pre-processing steps:

- Harmonization of scoring formats, including normalization of Likert-scale values and alignment of metrics across surveys. Where applicable, indicators were redefined to reflect a "positive" interpretation of readiness (e.g., percentage of students not afraid of AI, or expressing comfort/trust in GenAI tools).
- Missing values were annotated and were not imputed or replaced with averages or proxy values.

<sup>15</sup> <https://www.coe.int/en/web/education/-/the-state-of-artificial-intelligence-and-education-across-europe-2>

- Aggregation of indicators was performed at the SRL dimension level to compute per-country average readiness scores.
- Where available, European averages were used directly as reference points.

To better reflect the complexity of societal factors, the Socio-Cultural Readiness dimension was further disaggregated into three subcomponents:

- Interest in AI – capturing enthusiasm and perceived relevance of AI in educational contexts.
- Concerns about AI – encompassing ethical concerns, fears of bias, overreliance, or misuse.
- Familiarity, usage, support, and competence – addressing practical experience with GenAI tools and the perceived readiness of students and educators.

This disaggregation enables a more nuanced understanding of societal perceptions and engagement. It also highlights potential discrepancies—for example, high interest coexisting with low competence, or high usage amid lingering concerns—which can inform targeted interventions and training efforts in the later stages of the project.

The final output is a unified, structured Excel dataset covering a broad set of readiness indicators per SRL dimension across European countries. This dataset forms a country × SRL dimension matrix, where each cell represents the average normalized readiness score (ranging from 0 to 1) for a given country and dimension. Columns represent countries, while rows correspond to individual indicators grouped by SRL dimension (see Appendix).

This structure supports cross-country comparison and a variety of data analyses, including correlation heatmaps, gap detection, and radar-style readiness profiles.

### 3. Analysis of SRL Readiness

#### 3.1. European Mean Computation

As a first step in the SRL analysis, we estimated the European average readiness across key dimensions using the available indicators. To estimate the average SRL readiness across Europe, we used aggregated European-level statistics where available. When such data was not provided, we computed European means by averaging across available country entries per SRL dimension. It is important to note that for many indicators, data were available for only a subset of countries. As a result, these computed means may reflect the conditions of the countries with available data, rather than being

fully representative of Europe as a whole, introducing a degree of bias into these computed means due to uneven data availability.

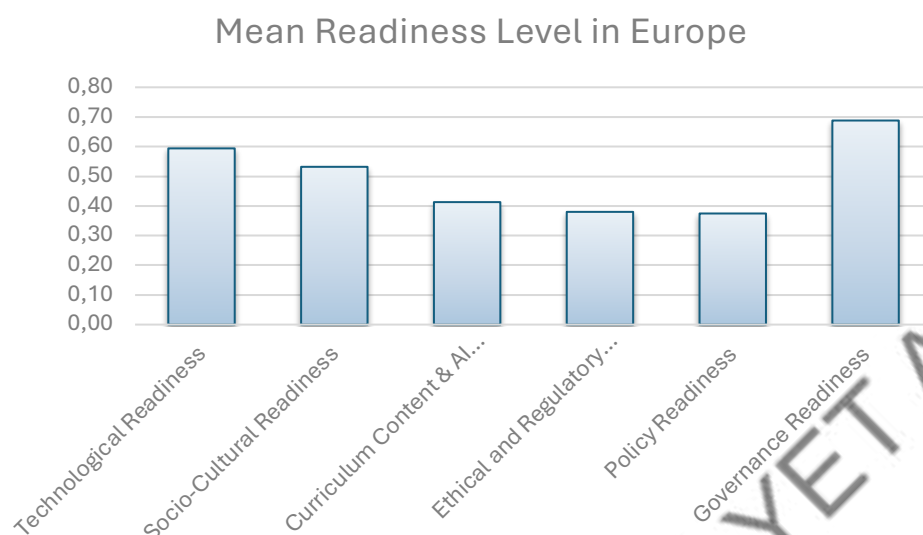


Figure 1 Mean Readiness Level in Europe.

Among the dimensions, Governance Readiness emerged as the strongest, with an estimated average of close to 70%. This dimension reflects the broader institutional capacity and cross-sectoral coordination of public bodies to manage and support the integration of AI/GenAI in education, including infrastructural support and leadership structures. Technological Readiness also scored relatively high, at around 60%, indicating that many countries have already made progress in ensuring the availability of digital infrastructure, connectivity, and equipment needed to deploy AI tools in school environments. This alignment between technological and governance capacity highlights a promising foundation for GenAI integration.

By contrast, both Policy Readiness and Ethical & Regulatory Readiness show lower levels, with European averages falling below 40%. Policy Readiness measures the presence and scope of AI-related strategies at the national level—this includes general AI strategies, specific policies for integrating AI into educational settings, provisions for teaching and learning about AI, and the existence of dedicated budgets to support these efforts. Ethical and Regulatory Readiness evaluates the existence of school-level or national guidelines for ethical AI use, whether these are embedded in acceptable use policies, and whether they are effectively communicated to the wider educational community.

This gap between governance capacity and policy/ethical readiness suggests a structural disconnect: while institutions may be prepared in terms of administration and infrastructure, strategic direction and value-based frameworks for implementation are still underdeveloped. Addressing this imbalance will be crucial for ensuring that GenAI

integration in education is both effective and aligned with fundamental ethical and societal values.

### 3.2. Country Selection for In-Depth Analysis

From the complete dataset, we identified five countries with relatively complete and rich data coverage, enabling more reliable in-depth analyses such as correlation heatmaps, radar plots, and SRL dimension gap profiling. These countries were not chosen for their representativeness of Europe as a whole, but because they provided consistent entries across the majority of indicators and dimensions. While alternative handling of missing values (e.g., imputation) was considered, such methods would introduce greater bias given the sparse coverage for many other countries.

It is important to highlight that the broader European means used in the SRL analysis are not exclusively based on these five countries. For many indicators, European-level statistics were available directly from the original data sources, helping anchor aggregate values. Nevertheless, we acknowledge that these averages are still biased toward countries with more complete data. As such, our approach aims to balance depth and breadth, offering both detailed insights and a cautious interpretation of continental trends.

The countries selected for in-depth analysis include:

- Germany (DE)
- Greece (EL)
- Spain (ES)
- Portugal (PT)
- Romania (RO)

Country-level data for the Policy, Ethical, and Regulatory Readiness dimension was not available in the selected sources. As a result, the current analysis focuses on the following SRL dimensions: Technological Readiness, Governance Readiness, and AI Literacy. Additionally, Socio-Cultural Readiness was disaggregated into three distinct components to better capture stakeholder perceptions: (i) Familiarity and Support for using GenAI, (ii) Interest in AI, and (iii) Psychological Readiness, which reflects concerns, fears, and trust-related attitudes toward AI/GenAI use in education.

### 3.3. Correlation Heatmap of SRL Dimensions

To gain deeper insight into how different readiness aspects relate to one another, we computed a correlation matrix across SRL dimensions based on per-country averages. This analysis was visualized through a heatmap, which helped reveal underlying patterns and dependencies among the dimensions.

In this analysis, we used Pearson correlation to measure the strength and direction of the linear relationship between two variables — for example, how changes in a country's AI literacy scores relate to changes in its Governance Readiness. Correlation values range from -1 to +1:

- A positive value (e.g., +0.8) means that as one variable increases, the other tends to increase too.
- A negative value (e.g., -0.6) means that as one variable increases, the other tends to decrease.
- A value close to 0 (e.g.,  $\pm 0.1$ ) indicates little or no linear relationship.

Correlations above +0.6 or below -0.6 are typically considered strong, while those between  $\pm 0.3$  and  $\pm 0.6$  are moderate, and those below  $\pm 0.3$  are weak. These relationships are visualized in heatmaps, where colour intensity represents correlation strength. For instance, dark red indicates a strong positive correlation, while dark blue represents a strong negative one. This visual tool helps identify patterns and dependencies across SRL dimensions and countries.

Generally, we observed weak correlations among dimensions, with some negative ones (e.g., governance vs. AI Literacy). This means that readiness in one dimension (e.g., technology) does not predict and coaligned with readiness in another (e.g., governance or curriculum content) across countries. This might reflect different national priorities, fragmentation of strategies where countries may advance technologically without comparable progress in regulation or institutional support, and asynchronous development.

#### Key Findings:

- Strong positive correlation between Curriculum Content/AI Literacy and Interest in AI. This suggests that in countries where AI is more meaningfully embedded in the curriculum, there is also greater engagement and curiosity about AI among stakeholders—likely reflecting the reciprocal relationship between exposure and perceived relevance.
- Some dimensions showed weaker or even negative correlations. For instance, Technological Readiness appeared to correlate negatively with Interest in AI, implying that access to infrastructure alone does not guarantee enthusiasm or demand for AI integration. Similarly, a weak or negative relationship was observed between Governance Readiness and AI Literacy, suggesting that strong institutional capacity does not necessarily translate into widespread educational adoption or awareness at the classroom level.

These results underscore the importance of not treating readiness dimensions in isolation. While strong infrastructure and governance may set the stage for GenAI integration, engagement, curriculum alignment, and ethical grounding are equally essential to drive meaningful adoption.

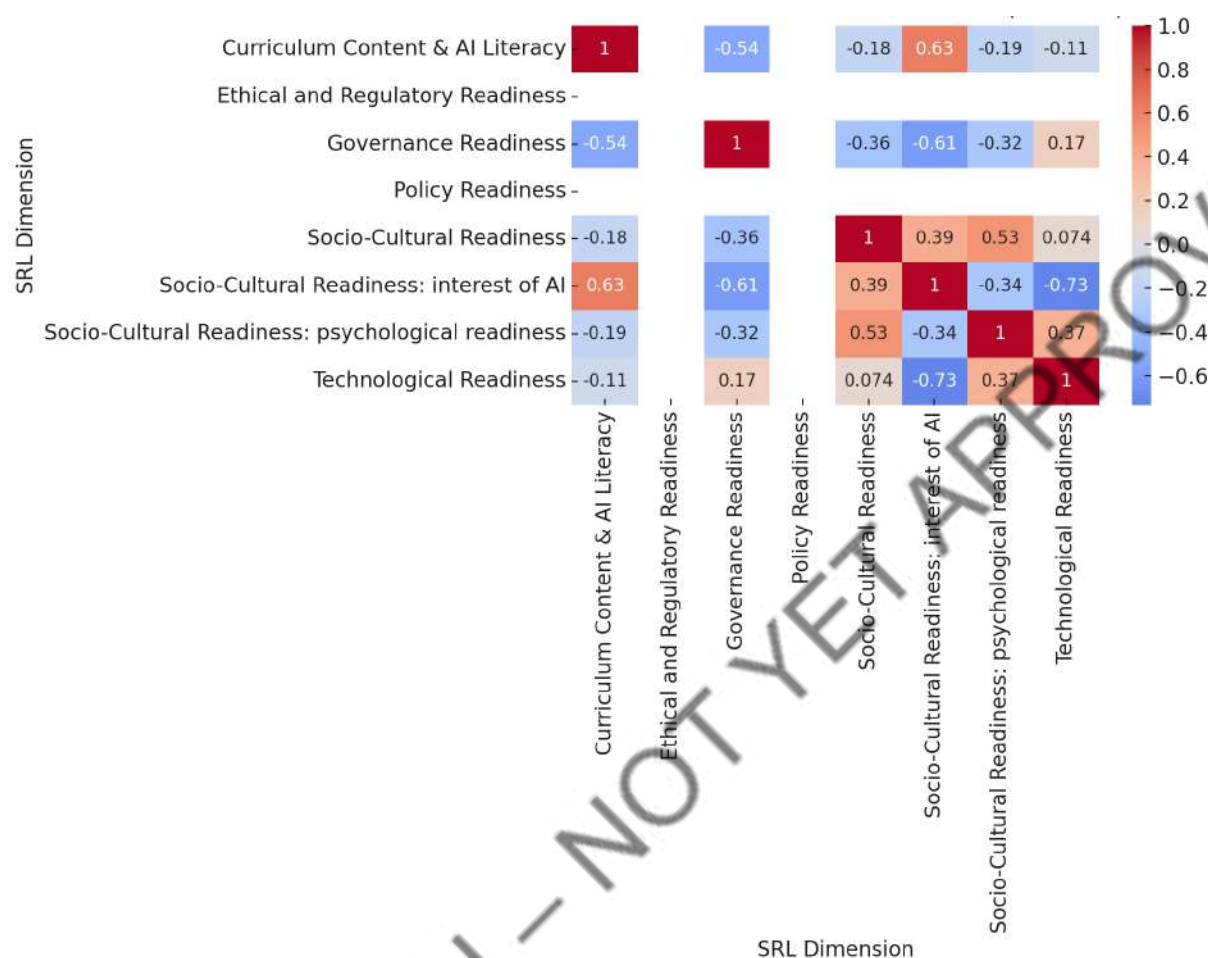


Figure 2 Correlation Matrix of SRL Dimensions. Matrix visualizing correlations between SRL dimensions based on per-country averages, highlighting interdependencies and potential alignment or divergence across readiness areas.

### 3.4. SRL Radar Plots for Selected Countries

A radar plot (also called a spider chart) is a graphical tool used to display multivariate data — that is, information across several different categories or dimensions. In our case, each axis of the radar plot represents one of the SRL dimensions, such as Technological Readiness, AI Literacy, or Socio-Cultural Readiness. All axes begin at the centre of the plot and extend outward like the spokes of a wheel (Figure 3)..

Each country's performance in a given dimension is plotted as a point on the corresponding axis, based on its normalized readiness score (ranging from 0 to 1) — also referred to as the country's SRL score for that particular dimension. These points are then connected to form a closed shape, which gives an intuitive visual representation of the country's readiness profile.

- A larger area covered by the shape indicates higher readiness overall.

- A balanced, circular shape suggests the country is equally strong across all dimensions.
- A skewed or uneven shape highlights specific strengths or weaknesses — for example, a sharp dip on the Governance axis might suggest a policy gap, even if the country is strong in Technology or Literacy.

By comparing the radar plots of different countries side by side, we can quickly see which ones have comprehensive readiness, and which might need more targeted development in specific areas. Radar plots are especially helpful for spotting imbalances and prioritizing interventions.

Thus, to provide a more intuitive representation of each country's readiness, we generated radar plots across the available SRL dimensions. In these plots, each axis represents a different readiness dimension, and the overall shape illustrates the balance and strength of a country's preparedness for integrating AI/GenAI in education.

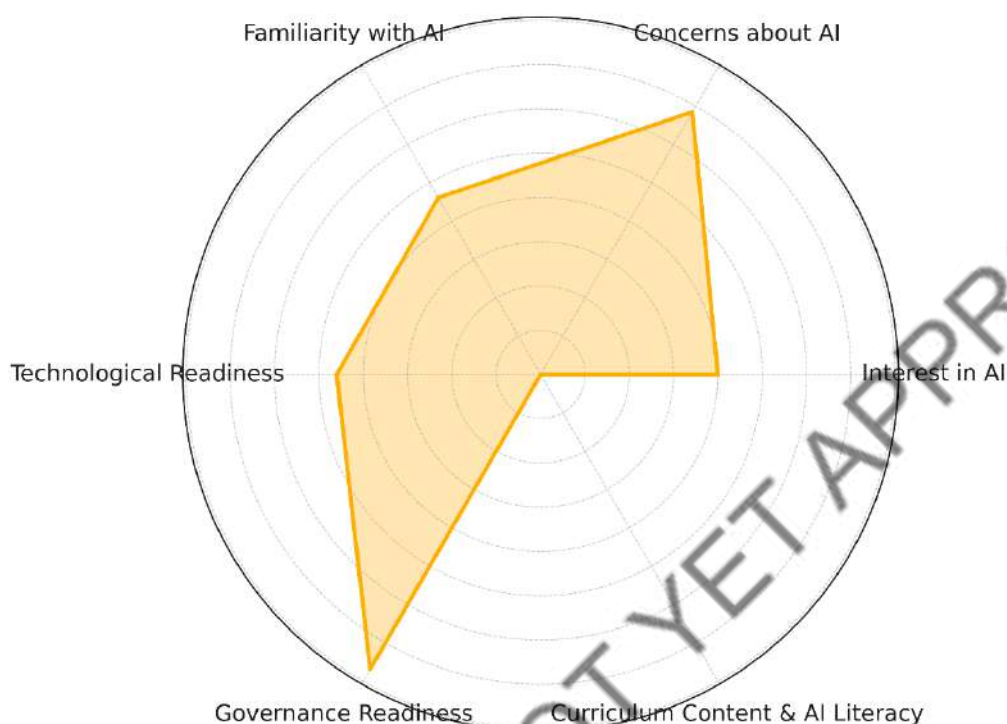
The visualizations reveal significant variation between dimensions, especially in Curriculum Content and AI Literacy. It's important to note that this particular dimension is currently assessed using a binary indicator (Yes = 1, No = 0), which primarily reflects whether Informatics is formally recognized as a distinct subject in secondary school curricula.

Notable insights include:

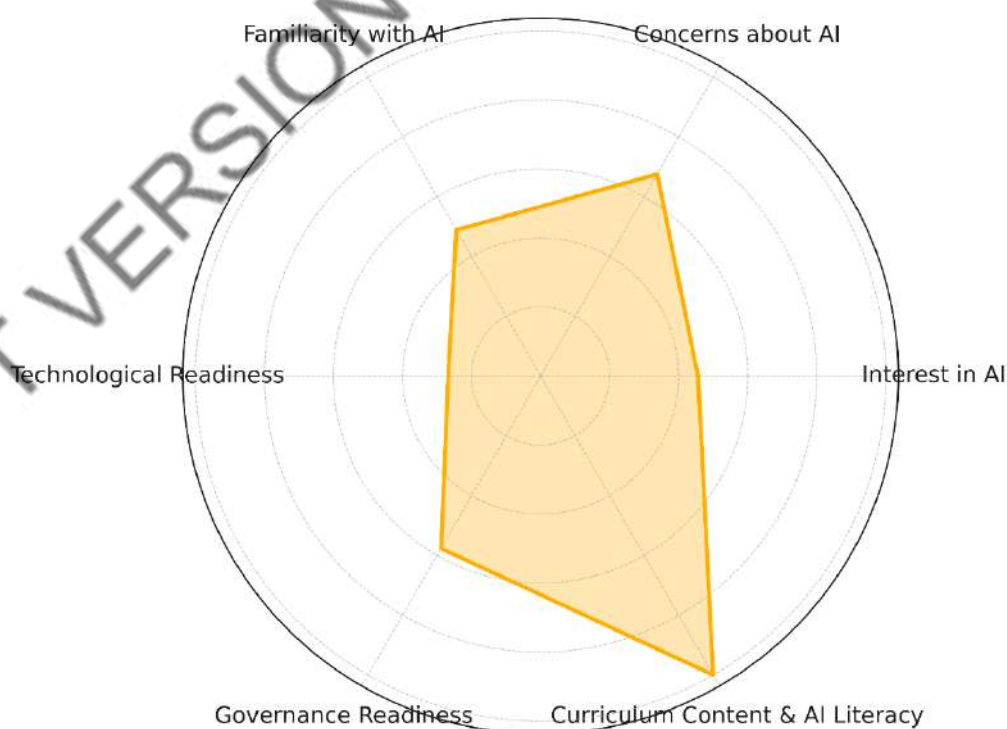
- Romania and Greece show lower overall societal readiness compared to other countries, despite both having Informatics as a distinct school subject.
- Greece records the lowest level of technological readiness, highlighting a gap between curriculum structure and actual infrastructure or access.
- Portugal and Spain exhibit very similar SRL profiles, with relatively balanced performance in governance, technological infrastructure, and socio-cultural engagement.

These radar plots seen below help visualize not only absolute readiness levels but also the internal imbalances between dimensions within each country—insights that are crucial for guiding tailored policy and support strategies.

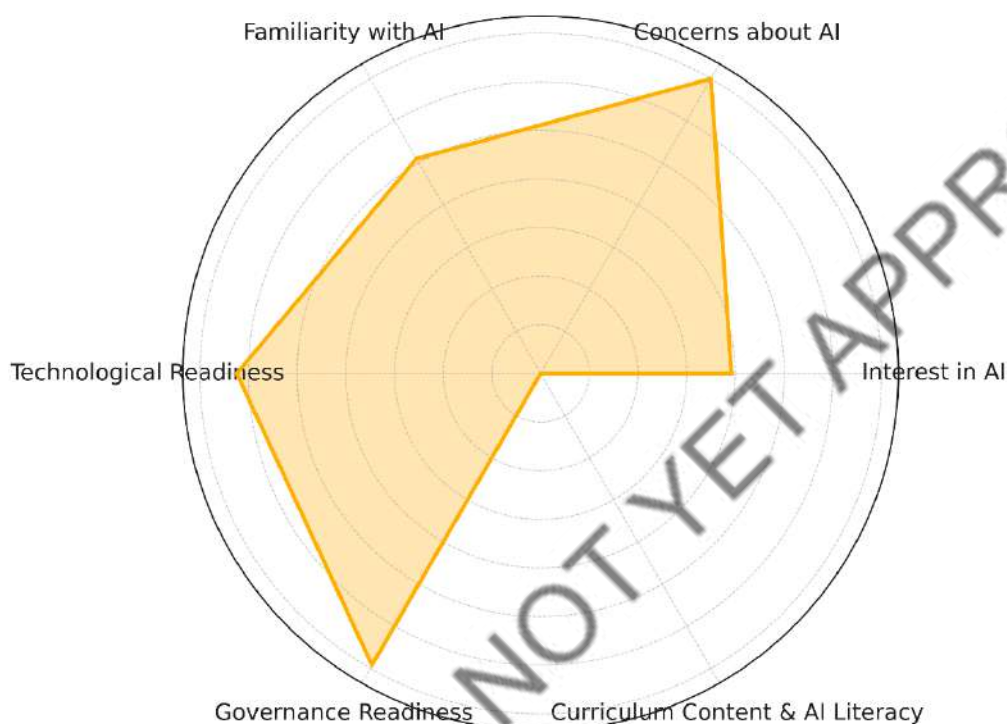
## SRL Readiness Profile: DE Germany



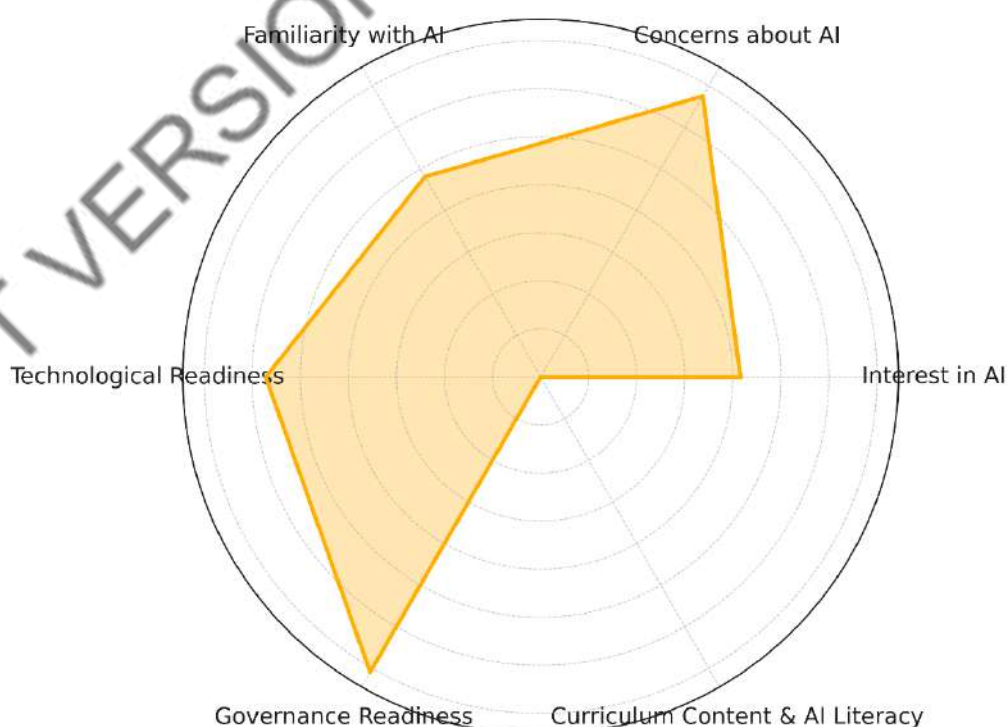
## SRL Readiness Profile: EL Greece



### SRL Readiness Profile: ES Spain



### SRL Readiness Profile: PT Portugal



### SRL Readiness Profile: RO Romania

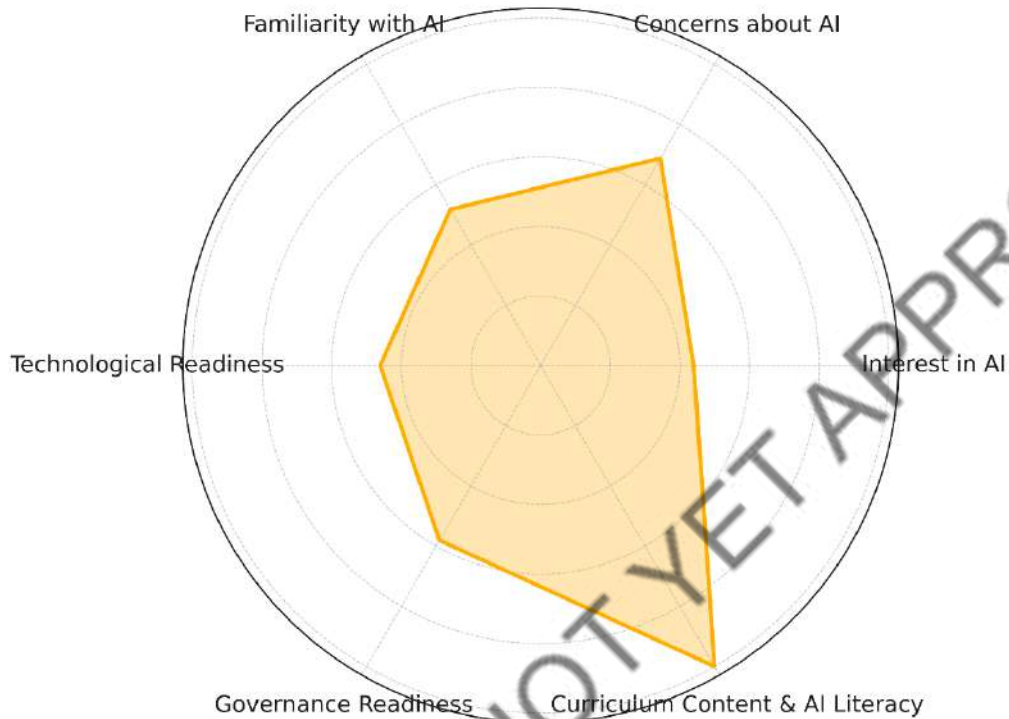


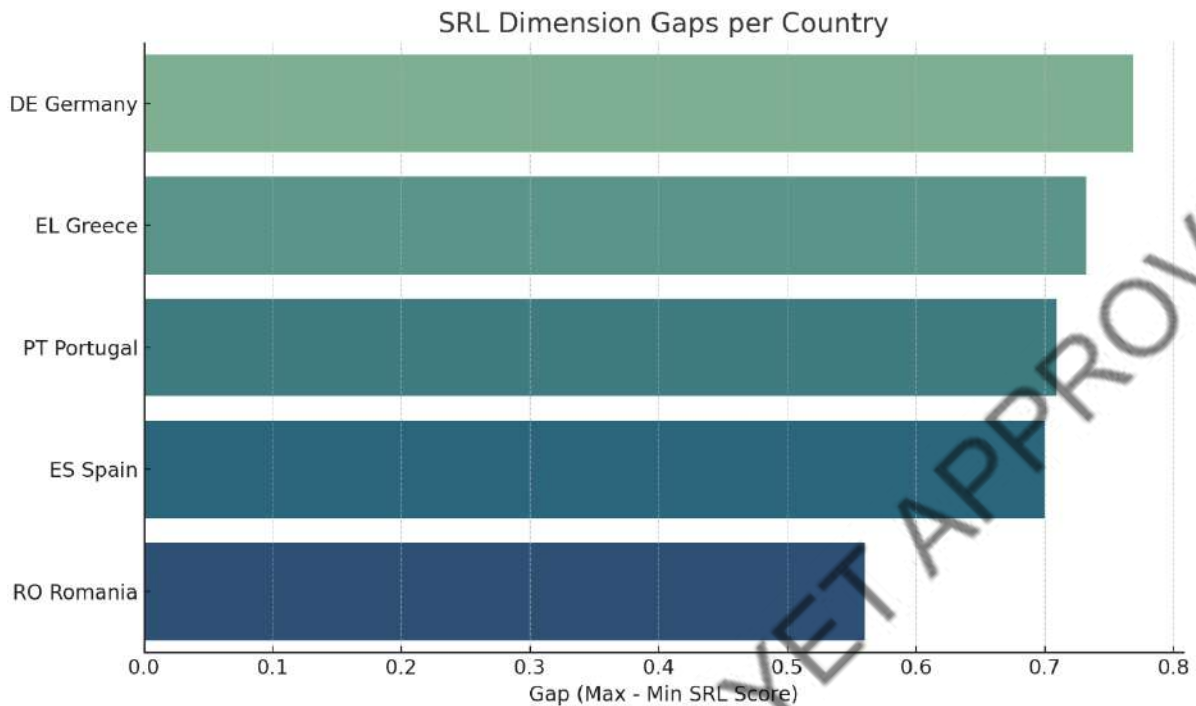
Figure 3 Country-Level SRL Radar Plots. Radar plots illustrating SRL dimensions for Germany, Greece, Spain, Portugal, and Romania, including Governance, Curriculum Content & AI Literacy, Technological Readiness, and components of Socio-Cultural Readiness (interest, concerns, and familiarity with AI/GenAI tools).

### 3.5. SRL Dimension Gap Analysis

To quantify the internal consistency of each country's readiness, we calculated the dimension gap as the difference between the highest and lowest SRL scores per country (Figure 4).

This metric captures alignment/misalignment across readiness dimensions:

- A small gap reflects a balanced and coordinated readiness profile.
- A large gap suggests fragmented or uneven preparedness across dimensions.



*Figure 4 SRL Gap Analysis by Country. Bar plots highlighting differences in readiness levels across SRL dimensions for Germany, Spain, Romania, Greece, and Portugal, helping to visualize strengths and areas requiring improvement.*

#### Results:

- Germany showed the largest gap, indicating major disparities between strong and weak areas.
- Romania had the smallest gap, suggesting a coherent national approach.
- Spain, Portugal, and Greece had intermediate gap values.

## 4. Questionnaire Analysis

### ***Educators' perspective (Based on 43 responses, data export: 1 July 2025)***

The first round of responses (n = 43, 17 males, 26 females) offers valuable insights into how educators perceive and engage with GenAI in education. Of the respondents, 23 hold a master's degree, indicating a relatively experienced and academically qualified sample. The results explained below are also presented in Figures 5-7.

Educators reported a moderate level of familiarity with GenAI tools, generally rating themselves between 3 and 4 on a 5-point scale, and similarly described their frequency of use as falling between "occasional" and "regular."

Perceptions of the effectiveness of GenAI in supporting teaching tended to fall just above 2 (on a 0 to 5 scale), suggesting a cautious but open attitude toward the educational potential of these technologies. When asked about how they feel regarding student use of GenAI, responses clustered between 2 and 3, indicating some level of concern or uncertainty about student autonomy, misuse, or learning outcomes.

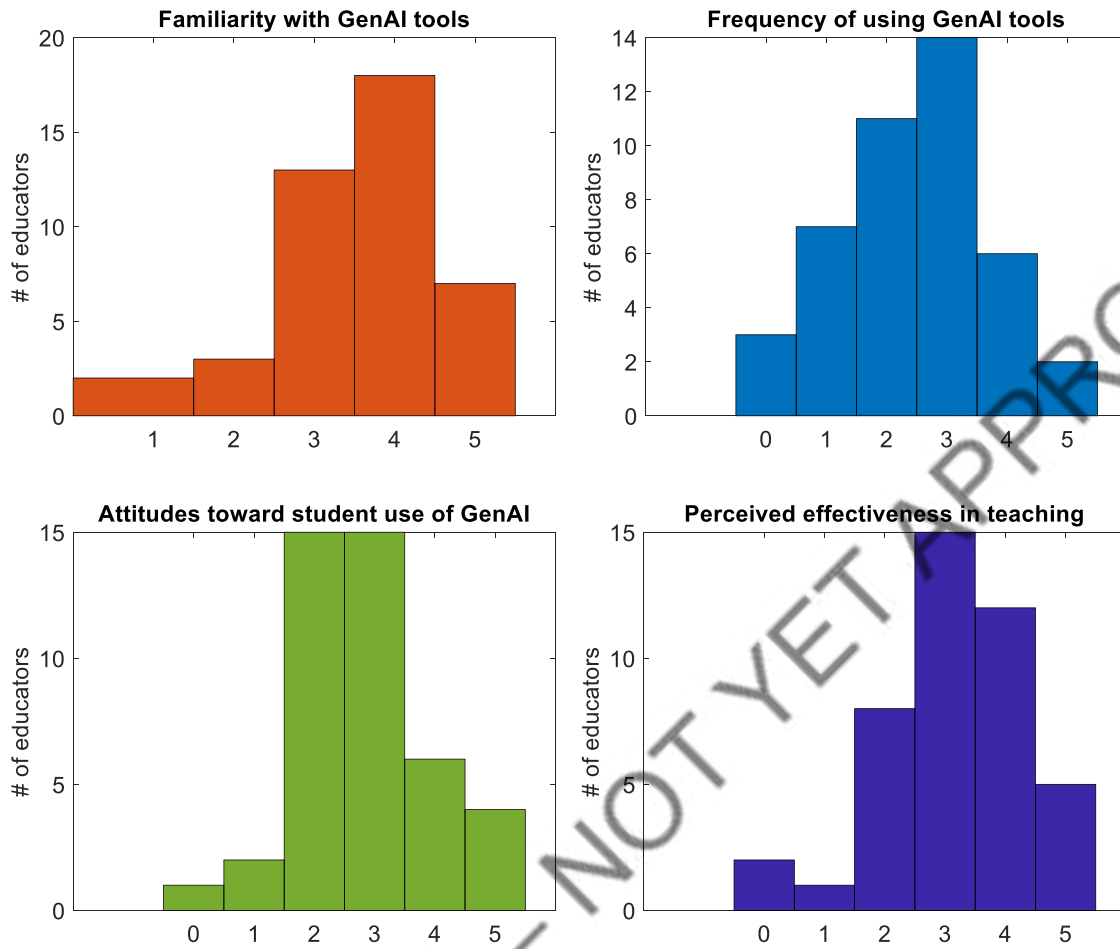


Figure 5 Educators' Familiarity and Use of GenAI. Histograms illustrating educators' self-reported familiarity with GenAI tools, frequency of use for educational purposes, perceived effectiveness in teaching, and attitudes toward student use of GenAI.

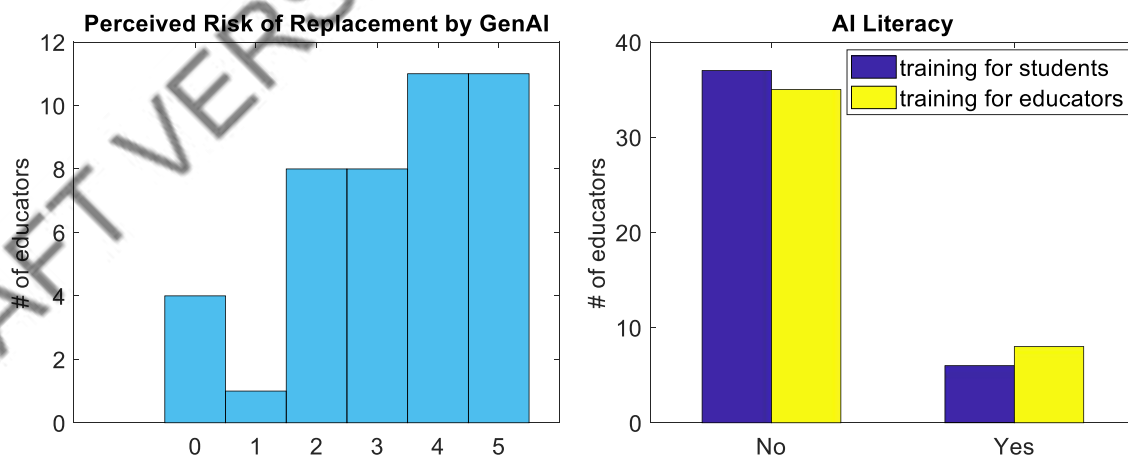
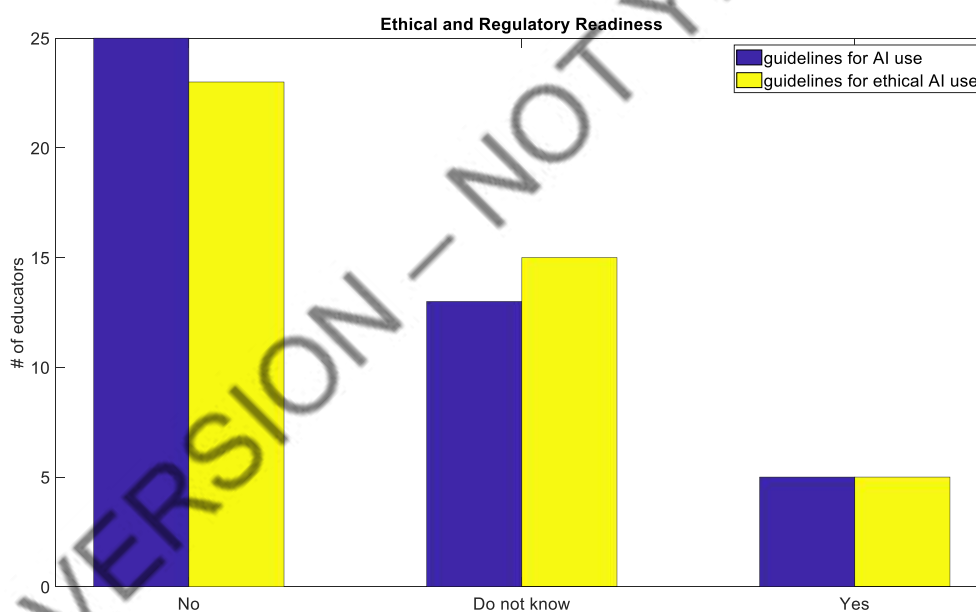
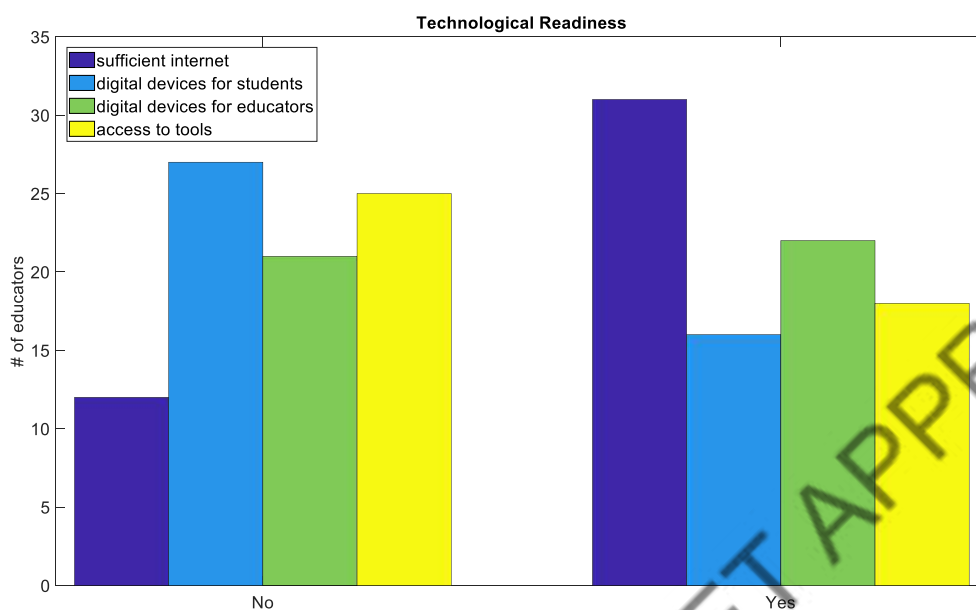


Figure 6 Educators' concerns about being replaced by GenAI tools and availability of AI/GenAI Training Programs in schools.



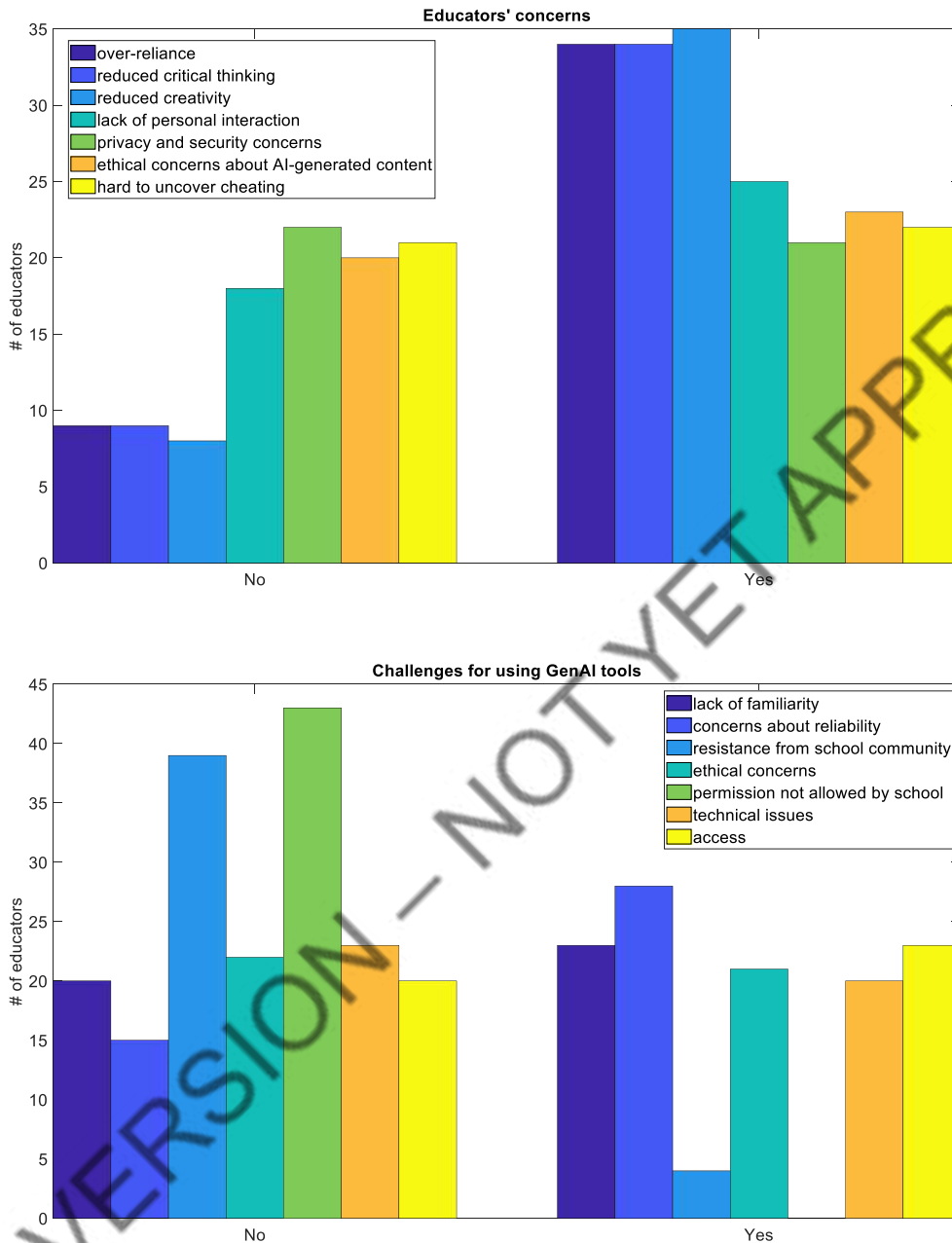


Figure 7 Educators' Perspectives on Readiness, Concerns, and Challenges. Histograms illustrating key aspects of educators' views on GenAI in education, including Ethical and Regulatory Readiness, Technological Readiness, concerns about GenAI use, and practical challenges to implementation.

A key part of the survey focused on educators' concerns. While there is a notable concern about GenAI partially replacing certain aspects of the educator's role, this is not their primary fear. Educators are more strongly concerned about the potential misuse of GenAI in the classroom. Their top concerns include:

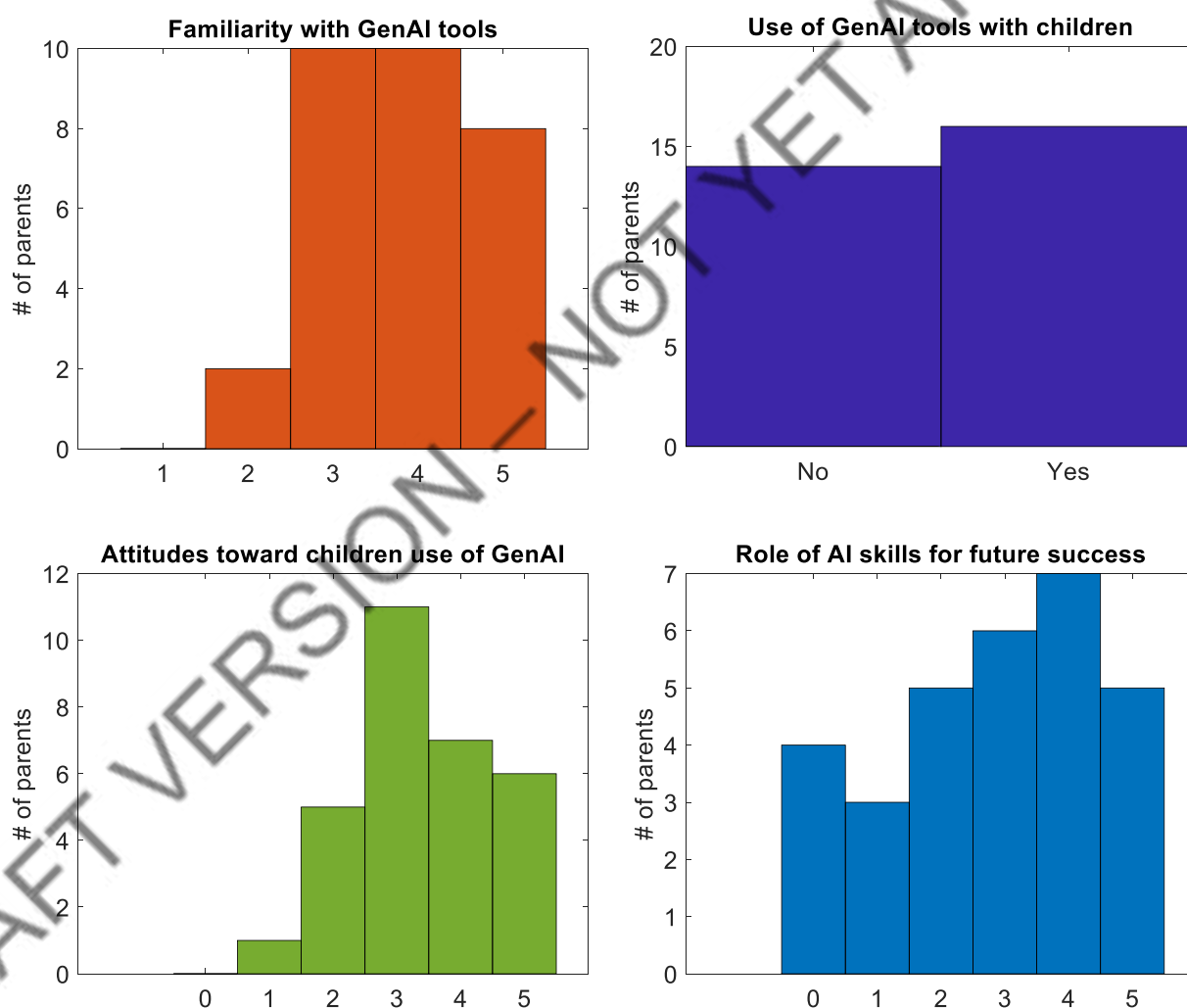
- Reduced student creativity and critical thinking
- Over-reliance on GenAI tools
- To a lesser extent, loss of personal interaction and relational dynamics in teaching

Finally, the results underscore a broader lack of systemic support:

- Most educators report that training programs on AI and GenAI for both students and teachers are not currently available.
- Similarly, ethical and regulatory guidelines for GenAI use in education are either absent or unknown to the majority.

These findings emphasize the importance of not only improving technological and institutional readiness but also addressing pedagogical and ethical concerns, which are critical for meaningful and trusted adoption of GenAI in schools.

**Parents' perspective (Based on 30 responses, data export: 1 July 2025)**



*Figure 8 Parents' Familiarity, Use, and Perceptions of GenAI. Histograms illustrating parents' self-reported familiarity with GenAI tools, use for educational purposes, attitudes toward their children's use of GenAI, and views on the importance of AI competencies for their children's future.*

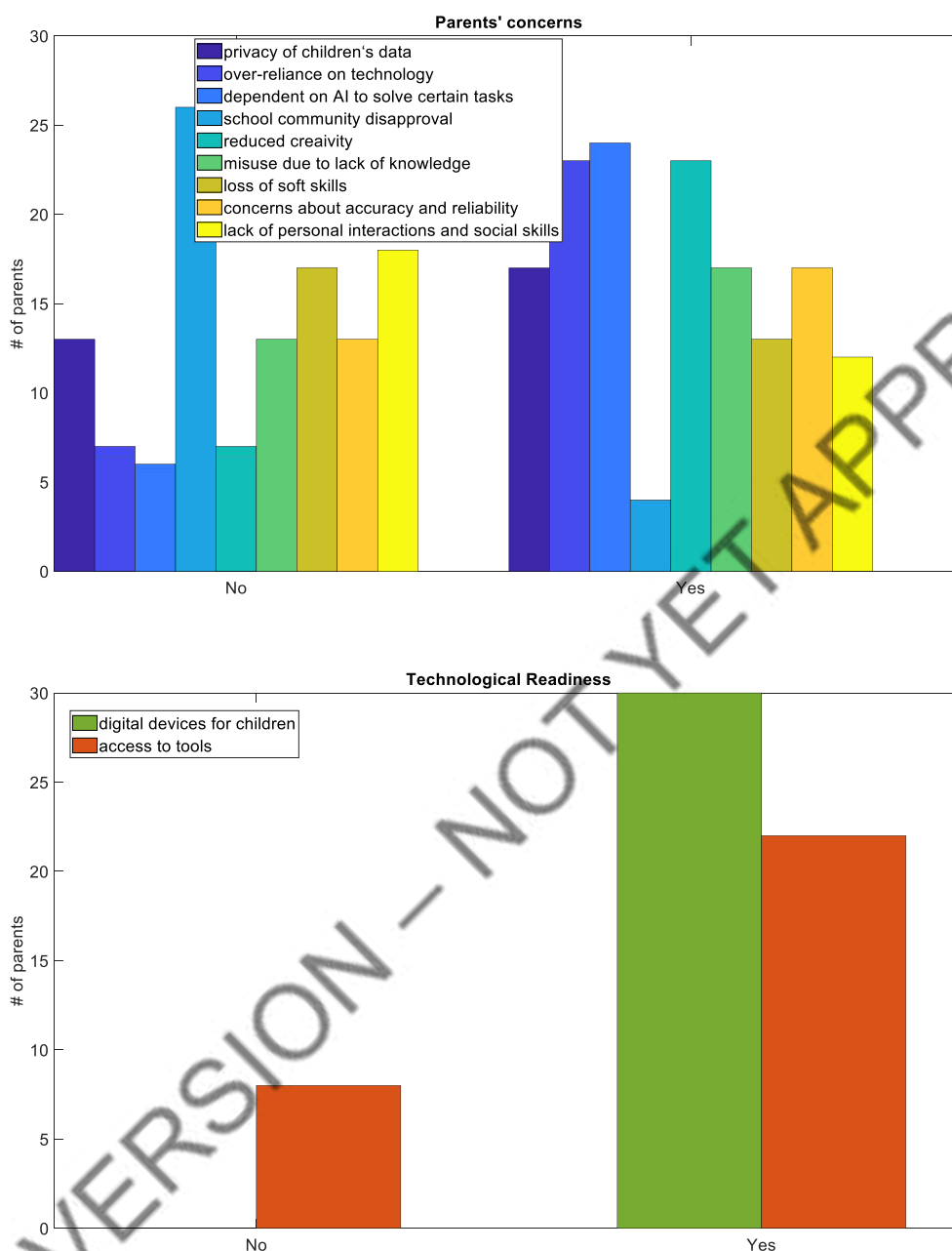


Figure 9 Parents' Concerns and Technological Readiness at Home. Histograms showing parents' concerns about GenAI use in education and their reported technological readiness, including access to digital devices, internet, and AI tools at home.

The responses from parents (Figures 8-9) provide an important perspective on household-level readiness and attitudes toward GenAI in education. In terms of familiarity with GenAI tools, most parents rated themselves between 3 and 5 on a 5-point scale, indicating a generally high level of awareness.

When asked whether they actively use GenAI tools with their children for learning purposes, responses were nearly evenly split: 16 answered yes and 14 no. This suggests a mixed but growing engagement with AI technologies in the home learning environment.

Parental attitudes toward their children's use of GenAI tools were generally positive, with most responses clustering around 3, 4, and 5 on a scale from 0 to 5. Similarly, when asked about whether AI competencies are important for future academic or career success, responses were more evenly spread, though slightly more parents leaned toward the mid-to-high range (3 and 4)—indicating cautious optimism or uncertainty.

Regarding concerns, parents expressed reservations in several key areas:

- Over-reliance on AI and the potential loss of creativity or autonomy in problem-solving
- Dependence on AI to complete certain tasks, particularly when used without supervision
- Slightly more parents voiced concern about the risk of misuse due to lack of understanding, alongside fears related to the accuracy and reliability of AI-generated outputs

From a technological readiness perspective, the results were much more consistent:

- All respondents reported that they provide digital devices to their children.
- A significant majority (22 out of 30) also confirmed that their children have access to AI or GenAI tools at home.

These findings point to a generally tech-enabled and AI-aware parent community, with interest and support balanced by concerns around control, misuse, and developmental impacts. They also highlight the importance of involving families in the broader readiness strategy, particularly through awareness-building and digital literacy initiatives.

#### 4.1. Alignment of Educators' and Parents' Perspectives

Comparing the findings from both stakeholder groups reveals several points of alignment and divergence, offering a well-rounded view of socio-cultural readiness for GenAI in education:

##### ***Familiarity and Usage***

Both educators and parents report moderate to high familiarity with GenAI tools.

Usage patterns differ slightly: while educators report occasional to regular use in classroom settings, about half of parents actively use GenAI tools with their children at home for learning purposes.

### **Attitudes Toward Student Use**

Both groups show cautious optimism about students using GenAI:

- Educators mostly rated their comfort level between 2 and 3.
- Parents leaned slightly more positive, with responses clustering around 3 to 5.

This suggests that while parents may be more open to GenAI use, educators are still assessing its classroom value and implications.

### **Concerns**

There is strong alignment in concerns, with both groups highlighting:

- Over-reliance on AI
- Reduced creativity and critical thinking
- Dependence without understanding

Parents additionally raised concerns about accuracy and reliability, while educators were particularly concerned about classroom misuse and loss of human interaction.

### **Readiness and Infrastructure**

Parents report broad technological readiness at home: all provide digital devices and most allow access to GenAI tools.

Educators, however, report gaps in institutional support, with most indicating a lack of training programs and absence of ethical/regulatory guidelines at school level.

Overall, the early findings from both surveys highlight a society that is increasingly familiar with GenAI, with positive attitudes tempered by legitimate concerns. Both educators and parents recognize the potential benefits of GenAI in education, yet express clear reservations about its impact on student development, and emphasize the need for structured guidance, training, and ethical oversight.

Technological infrastructure—particularly at home—is not the primary barrier. Instead, the key challenges lie in pedagogical integration, policy support, and capacity-building within schools. Addressing these gaps will be essential to advancing societal readiness and enabling the meaningful, responsible adoption of GenAI in secondary education.

## **5. Conclusions and Policy Implications**

### **5.1. Conclusions**

The SRL assessment developed under Task 2.3 provides a comprehensive foundation for evaluating how prepared European societies are to integrate Generative AI technologies into secondary education. Through a multidimensional framework—spanning technological, institutional, socio-cultural, ethical, governance, and policy

dimensions—we conducted cross-national comparisons, performed indicator correlation analysis, and examined internal disparities within countries.

Key insights include:

- Ethical and Policy Readiness emerged as the weakest dimensions across countries.
- Technological Readiness was often strong, yet it does not strongly correlate with other dimensions, revealing a disconnect between infrastructure and broader institutional readiness.
- Significant variability across countries was observed. For example, Germany showed high technological capacity but imbalanced readiness overall, whereas Romania presented a more consistent, well-aligned profile.

In parallel, we launched custom questionnaires targeting key stakeholders. As of the reporting period, we have collected 43 responses from educators and 30 responses from parents. These were primarily gathered from schools in Greece (Crete) and provided localized insight into societal attitudes. Early findings suggest:

- High familiarity and interest in GenAI tools among both groups.
- Recognition of GenAI's potential to enhance teaching and learning.
- Clear concerns over student development, trustworthiness of AI outputs, and over-reliance on technology.

Importantly, respondents emphasized that technological infrastructure is not the main barrier. Instead, the pressing needs are:

- Pedagogical integration of GenAI,
- Clear national and institutional policies, and
- Targeted training and capacity-building within schools.

These findings confirm that SRL requires a holistic lens, one that recognizes the interdependence between digital capacity and the societal structures that enable meaningful and responsible AI adoption.

However, while this assessment offers valuable insights, it also comes with certain limitations. In particular, several countries had incomplete data coverage, and some key

sources (such as the 2019 ICT in Education survey<sup>16</sup>) may not fully reflect current developments in GenAI adoption. These gaps underscore the importance of continued data collection and monitoring. Ongoing efforts within the project, including the deployment of questionnaires, are expected to enrich and update the SRL dataset, supporting more robust and timely analyses in the future.

## 5.2. Policy Recommendations

Key policy recommendations include:

- Prioritize national strategies that reinforce underdeveloped dimensions such as ethical and policy readiness.
- Invest in capacity-building, focusing on teacher training, curriculum development, and awareness programs.
- Align pedagogical practice with digital transformation, ensuring GenAI is meaningfully embedded into classroom workflows.
- Support multi-stakeholder collaboration, involving educators, students, and families in decision-making and implementation.
- Leverage cross-national insights, learning from countries with well-balanced readiness profiles.
- Maintain ongoing assessment mechanisms to adapt policy and practice in line with evolving technologies and societal attitudes.

These recommendations will directly inform future project activities in *Task 3.5: Training Resource Hub* and *Task 5.6: Produce guidelines and policy recommendations for GenAI integration in secondary education*, contributing to training resources, implementation guidelines, and policy frameworks for GenAI adoption in secondary education.

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<sup>16</sup> <https://op.europa.eu/en/publication-detail/-/publication/78afb58c-46ef-11e9-a8ed-01aa75ed71a1/language-en>

## 6. APPENDICES

- A. Data Availability by Country and Dimension (excel file)

DRAFT VERSION – NOT YET APPROVED

| Refined Question                                                  | mean | AT Austria | BE Belgium | BG Bulgaria | CZ Czech R | CY Cyprus | DE Germany | DK Denmark | EE Estonia | EL Greece | ES Spain | FI Finland | FR France | HR Croatia | HU Hungary | IE Ireland | IS Iceland | IT Italy | LT Lithuania |
|-------------------------------------------------------------------|------|------------|------------|-------------|------------|-----------|------------|------------|------------|-----------|----------|------------|-----------|------------|------------|------------|------------|----------|--------------|
| Percentage of Digitally equipped teachers                         | 0.52 | 0.72       | 0.70       | 0.31        | 0.47       | 0.00      | 0.41       | 0.90       | 0.90       | 0.10      | 0.80     | 0.80       | 0.52      | 0.30       | 0.20       |            | 0.98       | 0.46     | 0.40         |
| Percentage of Digitally equipped students                         | 0.72 | 0.86       | 0.70       | 0.38        | 0.80       | 0.55      | 0.49       | 0.88       | 0.99       | 0.20      | 0.78     | 0.97       | 0.97      | 0.48       | 0.34       |            | 0.99       | 0.87     | 0.52         |
| Do students use the internet                                      | 0.68 | 0.54       | 0.60       | 0.70        | 0.57       | 0.58      |            | 0.99       | 0.79       |           | 0.66     | 0.72       | 0.72      | 0.67       | 0.73       |            | 0.88       | 0.69     | 0.78         |
| Do students use the internet                                      | 0.73 | 0.79       | 0.73       | 0.77        | 0.80       | 0.71      |            | 0.97       | 0.83       |           | 0.73     | 0.84       | 0.84      | 0.74       | 0.82       |            | 1.00       | 0.70     | 0.84         |
| Do students use a digital device                                  | 0.52 | 0.43       | 0.51       | 0.58        | 0.44       | 0.48      |            | 0.91       | 0.36       |           | 0.49     | 0.44       |           | 0.47       | 0.75       |            | 0.67       |          | 0.49         |
| Do students use a digital device                                  | 0.59 | 0.65       | 0.62       | 0.54        | 0.54       | 0.37      |            | 0.95       | 0.46       |           | 0.58     | 0.69       |           | 0.45       | 0.51       |            | 1.00       | 0.59     | 0.52         |
| Percentage of Teachers' use                                       | 0.58 | 0.42       | 0.67       | 0.40        | 0.64       | 0.76      |            | 885.00     | 0.48       |           | 0.56     | 0.61       |           | 0.62       | 0.38       |            | 0.62       | 0.59     | 0.81         |
| Percentage of Teachers' use                                       | 0.65 | 0.67       | 0.71       | 0.53        | 0.56       |           |            | 0.64       | 0.64       |           | 0.58     | 0.67       |           | 0.64       | 0.42       |            | 0.61       | 0.68     | 0.84         |
| Do students have access to digital devices                        | 0.36 |            |            |             |            |           | 0.44       |            |            | 0.29      | 0.36     |            |           |            |            |            |            |          |              |
| Are AI/GenAI applications commonly used in your country?          | 0.59 |            |            |             |            |           | 0.50       |            |            | 0.48      | 0.70     |            |           |            |            |            |            |          |              |
| Are students familiar with the use of AI/GenAI?                   | 0.11 |            |            |             |            |           | 0.07       |            |            | 0.10      | 0.13     |            |           |            |            |            |            |          |              |
| Do you feel supported by your school to use AI/GenAI?             | 0.50 |            |            |             |            |           | 0.43       |            |            | 0.42      | 0.46     |            |           |            |            |            |            |          |              |
| Do you feel supported by your school to use AI/GenAI?             | 0.60 |            |            |             |            |           | 0.51       |            |            | 0.59      | 0.53     |            |           |            |            |            |            |          |              |
| Do you feel supported by your school to use AI/GenAI?             | 0.63 |            |            |             |            |           | 0.53       |            |            | 0.61      | 0.69     |            |           |            |            |            |            |          |              |
| Do you think AI competence is important for students?             | 0.74 |            |            |             |            |           | 0.69       |            |            | 0.73      | 0.74     |            |           |            |            |            |            |          |              |
| Do you think access to AI applications is important for students? | 0.66 |            |            |             |            |           | 0.59       |            |            | 0.57      | 0.63     |            |           |            |            |            |            |          |              |
| Do you believe AI should be used in schools?                      | 0.40 |            |            |             |            |           | 0.41       |            |            | 0.40      | 0.39     |            |           |            |            |            |            |          |              |
| Would you like to learn about AI/GenAI?                           | 0.52 |            |            |             |            |           | 0.51       |            |            | 0.48      | 0.56     |            |           |            |            |            |            |          |              |
| Would you like to learn about AI/GenAI?                           | 0.45 |            |            |             |            |           | 0.38       |            |            | 0.53      | 0.42     |            |           |            |            |            |            |          |              |
| Would you like to learn about AI/GenAI?                           | 0.42 |            |            |             |            |           | 0.44       |            |            | 0.40      | 0.26     |            |           |            |            |            |            |          |              |
| Would you like to learn about AI/GenAI?                           | 0.37 |            |            |             |            |           | 0.30       |            |            | 0.44      | 0.35     |            |           |            |            |            |            |          |              |
| Would you like to learn how to use AI/GenAI?                      | 0.36 |            |            |             |            |           | 0.37       |            |            | 0.43      | 0.37     |            |           |            |            |            |            |          |              |
| Student's concern about AI: Lack of knowledge                     | 0.56 |            |            |             |            |           | 0.64       |            |            | 0.53      | 0.57     |            |           |            |            |            |            |          |              |
| Student's concern about AI: Lack of skills                        | 0.66 |            |            |             |            |           | 0.56       |            |            | 0.70      | 0.69     |            |           |            |            |            |            |          |              |
| Student's concern about AI: Lack of resources                     | 0.74 |            |            |             |            |           | 0.76       |            |            | 0.70      | 0.76     |            |           |            |            |            |            |          |              |
| Student's concern about AI: Lack of interest                      | 0.79 |            |            |             |            |           | 0.78       |            |            | 0.77      | 0.78     |            |           |            |            |            |            |          |              |
| Is Informatics a distinct discipline in your curriculum?          | 0.23 | 0.00       | 0.00       | 1.00        | 0.00       | 0.00      | 0.00       | 0.00       | 0.00       | 1.00      | 0.00     | 0.00       | 0.00      | 0.00       | 1.00       | 0.00       | 0.00       | 0.00     | 0.00         |
| How is learning about AI added to the curriculum?                 | 0.60 |            |            |             |            |           |            |            |            |           |          |            |           |            |            |            |            |          |              |
| The use of AI is allowed at school                                | 0.38 |            |            |             |            |           |            |            |            |           |          |            |           |            |            |            |            |          |              |
| Does your ministry/country have a policy on AI/GenAI?             | 0.84 |            |            |             |            |           |            |            |            |           |          |            |           |            |            |            |            |          |              |
| Does your ministry/country have a policy on AI/GenAI?             | 0.17 |            |            |             |            |           |            |            |            |           |          |            |           |            |            |            |            |          |              |
| Does your ministry/country have a policy on AI/GenAI?             | 0.35 |            |            |             |            |           |            |            |            |           |          |            |           |            |            |            |            |          |              |
| Is there a specific budget allocated for AI/GenAI education?      | 0.14 |            |            |             |            |           |            |            |            |           |          |            |           |            |            |            |            |          |              |
| How ready are you to implement AI/GenAI in your school?           | 0.76 | 0.78       | 0.81       | 0.65        | 0.76       | 0.69      | 0.79       | 0.84       | 0.87       | 0.51      | 0.75     | 0.85       | 0.85      | 0.41       | 0.74       | 0.75       | 0.82       | 0.79     | 0.78         |
| How ready are you to implement AI/GenAI in your school?           | 0.50 | 0.57       | 0.56       | 0.38        | 0.50       | 0.36      | 0.65       | 0.57       | 0.49       | 0.47      | 0.51     | 0.61       | 0.64      | 0.40       | 0.42       | 0.58       | 0.47       | 0.53     | 0.43         |
| How ready are you to implement AI/GenAI in your school?           | 0.80 | 0.84       | 0.81       | 0.79        | 0.85       | 0.80      | 0.87       | 0.83       | 0.82       | 0.76      | 0.82     | 0.84       | 0.89      | 0.74       | 0.75       | 0.86       | 0.80       | 0.82     | 0.83         |

|       | IT   | Malta | NL   | Netherl | NO   | Norw | PL   | Poland | PT   | Portug | RO   | Romani | SE   | Sweden | SI   | Sloveni | SK   | Slovak | TR   | Turkey | UK   | United Kingdom                                                                            | Source                                                                                      | countries                    |               |
|-------|------|-------|------|---------|------|------|------|--------|------|--------|------|--------|------|--------|------|---------|------|--------|------|--------|------|-------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------|------------------------------|---------------|
| Italy | 0.60 | 0.54  | 0.66 | 0.77    | 0.80 | 0.98 | 0.40 | 0.70   | 0.18 | 0.98   |      |        | 0.31 | 1.00   | 0.98 |         |      |        |      |        |      |                                                                                           | <a href="https://data.europa.eu/euodp/data/">https://data.europa.eu/euodp/data/</a>         | 31 countries (EU28, Iceland) | study: 2017-1 |
|       | 0.60 | 0.66  | 0.77 | 0.98    | 0.80 | 0.98 | 0.50 | 0.78   | 0.31 | 1.00   |      |        | 0.31 | 1.00   | 0.98 |         |      |        |      |        |      |                                                                                           | <a href="https://data.europa.eu/euodp/data/">https://data.europa.eu/euodp/data/</a>         | 31 countries (EU28, Iceland) | study: 2017-1 |
|       | 0.80 | 0.74  |      |         |      |      |      | 0.67   | 0.56 | 0.90   |      |        | 0.56 | 0.90   | 0.90 |         | 0.66 |        |      |        |      |                                                                                           | <a href="https://data.europa.eu/euodp/data/">https://data.europa.eu/euodp/data/</a>         | 31 countries (EU28, Iceland) | study: 2017-1 |
|       | 0.89 | 0.51  |      |         |      |      |      | 0.67   | 0.71 | 0.97   |      |        | 0.71 | 0.97   | 0.78 | 0.78    | 0.82 |        |      |        |      |                                                                                           | <a href="https://data.europa.eu/euodp/data/">https://data.europa.eu/euodp/data/</a>         | 31 countries (EU28, Iceland) | study: 2017-1 |
|       | 0.40 | 0.74  |      |         |      |      |      | 0.36   | 0.37 |        |      |        | 0.37 |        | 0.32 |         |      |        |      |        |      |                                                                                           | <a href="https://data.europa.eu/euodp/data/">https://data.europa.eu/euodp/data/</a>         | 31 countries (EU28, Iceland) | study: 2017-1 |
|       | 0.51 | 0.63  |      |         |      |      |      | 0.43   | 0.49 | 0.96   |      |        | 0.49 | 0.96   | 0.52 | 0.52    | 0.60 |        |      |        |      |                                                                                           | <a href="https://data.europa.eu/euodp/data/">https://data.europa.eu/euodp/data/</a>         | 31 countries (EU28, Iceland) | study: 2017-1 |
|       | 0.64 | 0.84  |      |         |      |      |      | 0.69   | 0.48 | 0.71   |      |        | 0.71 | 0.71   | 0.56 |         | 0.56 |        |      |        |      |                                                                                           | <a href="https://data.europa.eu/euodp/data/">https://data.europa.eu/euodp/data/</a>         | 31 countries (EU28, Iceland) | study: 2017-1 |
|       | 0.63 | 0.79  |      |         |      |      |      | 0.53   | 0.48 |        |      |        | 0.48 | 0.67   | 0.67 | 0.68    |      |        |      |        |      |                                                                                           | <a href="https://data.europa.eu/euodp/data/">https://data.europa.eu/euodp/data/</a>         | 31 countries (EU28, Iceland) | study: 2017-1 |
|       |      |       |      |         |      |      |      | 0.31   | 0.43 |        |      |        | 0.43 |        |      |         | 0.34 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.58   | 0.60 |        |      |        | 0.60 |        |      |         | 0.62 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.05   | 0.11 |        |      |        | 0.11 |        |      |         | 0.11 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.41   | 0.47 |        |      |        | 0.47 |        |      |         | 0.68 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.56   | 0.62 |        |      |        | 0.62 |        |      |         | 0.78 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.61   | 0.70 |        |      |        | 0.70 |        |      |         | 0.78 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.74   | 0.70 |        |      |        | 0.70 |        |      |         | 0.85 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.66   | 0.67 |        |      |        | 0.67 |        |      |         | 0.81 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.34   | 0.36 |        |      |        | 0.36 |        |      |         | 0.52 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.56   | 0.53 |        |      |        | 0.53 |        |      |         | 0.52 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.47   | 0.48 |        |      |        | 0.48 |        |      |         | 0.49 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.36   | 0.48 |        |      |        | 0.48 |        |      |         | 0.48 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.34   | 0.38 |        |      |        | 0.38 |        |      |         | 0.41 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.35   | 0.33 |        |      |        | 0.33 |        |      |         | 0.31 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.50   | 0.46 |        |      |        | 0.46 |        |      |         | 0.62 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.62   | 0.70 |        |      |        | 0.70 |        |      |         | 0.75 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.74   | 0.74 |        |      |        | 0.74 |        |      |         | 0.69 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      | 0.84   | 0.85 |        |      |        | 0.85 |        |      |         | 0.74 |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
| 1.00  | 0.00 | 0.00  | 0.00 | 0.00    | 0.00 | 0.00 | 1.00 | 0.00   | 0.00 | 0.00   | 1.00 | 1.00   | 0.00 | 0.00   | 0.00 | 0.00    | 1.00 | 0.00   | 0.00 | 0.00   | 0.00 | 0.00                                                                                      | <a href="https://eurydice.eacea.ec.europa.eu/">https://eurydice.eacea.ec.europa.eu/</a>     | 37 European countries        |               |
|       |      |       |      |         |      |      |      |        |      |        |      |        |      |        |      |         |      |        |      |        |      |                                                                                           | THE STATE OF ARTIFICIAL INTELLIGENCE                                                        | 28 member states             |               |
|       |      |       |      |         |      |      |      |        |      |        |      |        |      |        |      |         |      |        |      |        |      |                                                                                           | <a href="https://skillsupladir.eu/docs/conten">https://skillsupladir.eu/docs/conten</a>     | 7 countries (Germany, UK)    |               |
|       |      |       |      |         |      |      |      |        |      |        |      |        |      |        |      |         |      |        |      |        |      |                                                                                           | <a href="https://rm.coe.int/the-state-of-artifi">https://rm.coe.int/the-state-of-artifi</a> | 28 member states             |               |
|       |      |       |      |         |      |      |      |        |      |        |      |        |      |        |      |         |      |        |      |        |      |                                                                                           | THE STATE OF ARTIFICIAL INTELLIGENCE                                                        | 28 member states             |               |
|       |      |       |      |         |      |      |      |        |      |        |      |        |      |        |      |         |      |        |      |        |      |                                                                                           | THE STATE OF ARTIFICIAL INTELLIGENCE                                                        | 28 member states             |               |
|       |      |       |      |         |      |      |      |        |      |        |      |        |      |        |      |         |      |        |      |        |      |                                                                                           | <a href="https://oxfordinsights.com/ai-reading">https://oxfordinsights.com/ai-reading</a>   | 188 countries globally       |               |
|       |      |       |      |         |      |      |      |        |      |        |      |        |      |        |      |         |      |        |      |        |      |                                                                                           | <a href="https://oxfordinsights.com/ai-reading">https://oxfordinsights.com/ai-reading</a>   | 188 countries globally       |               |
| 0.74  | 0.76 | 0.85  | 0.86 | 0.77    | 0.79 | 0.79 | 0.81 | 0.81   | 0.81 | 0.81   | 0.69 | 0.69   | 0.81 | 0.77   | 0.77 | 0.77    | 0.69 | 0.71   | 0.71 | 0.71   | 0.71 | 0.84                                                                                      | <a href="https://oxfordinsights.com/ai-reading">https://oxfordinsights.com/ai-reading</a>   | 188 countries globally       |               |
| 0.36  | 0.40 | 0.60  | 0.56 | 0.45    | 0.52 | 0.40 | 0.56 | 0.45   | 0.52 | 0.40   | 0.40 | 0.40   | 0.63 | 0.43   | 0.43 | 0.41    | 0.45 | 0.45   | 0.45 | 0.45   | 0.67 | <a href="https://oxfordinsights.com/ai-reading">https://oxfordinsights.com/ai-reading</a> | 188 countries globally                                                                      |                              |               |
| 0.75  | 0.75 | 0.87  | 0.86 | 0.81    | 0.81 | 0.81 | 0.81 | 0.81   | 0.81 | 0.81   | 0.81 | 0.81   | 0.82 | 0.82   | 0.77 | 0.81    | 0.81 | 0.66   | 0.66 | 0.66   | 0.86 | <a href="https://oxfordinsights.com/ai-reading">https://oxfordinsights.com/ai-reading</a> | 188 countries globally                                                                      |                              |               |

## B. Questionnaire Templates (English version)

# Generative AI in the Classroom - Teachers' Views

Fields marked with \* are mandatory.

## Generative AI in the Classroom



Education is evolving, and so are the tools we use. Generative Artificial Intelligence (GenAI) is becoming part of classrooms, and your insights are crucial in shaping its role, assessing the level of readiness, and identifying the necessary steps (policies, programs, infrastructure) to achieve a higher level of preparedness. This questionnaire explores your experiences, concerns, and perspectives—whether you are actively using GenAI or just exploring its possibilities. Your input will help ensure GenAI enhances, rather than replaces, meaningful teaching. Take a few moments to share your thoughts and help shape the future of education!

GenAI4ED: <https://genai4ed.eu/>

## Purpose of the Study

Dear Teacher,

This questionnaire is part of the European project GenAI4ED, which aims to develop a digital platform to evaluate various AI-based educational tools and offer suitable options for educators and students. The platform will be tested in selected schools through pilot experiments where students and educators will assess these tools. The evaluation will explore how these tools impact students' learning experiences and

complement teachers' skills and working conditions.

### What Participation Involves

If you agree to participate, you will be asked to complete a questionnaire about your experiences and opinions regarding AI-based educational tools. The questionnaire will take approximately 10 minutes to complete. All responses will be used solely for research purposes and will not require prior knowledge of AI or GenAI tools.

### Privacy Policy

The information to be collected through this questionnaire is anonymous, meaning it does not correspond to an identified or identifiable natural person.

When completing the questionnaire (especially for open-ended questions), please avoid mentioning any personal information, either your own or that of others. According to the definition of the General Data Protection Regulation (GDPR), "personal data" refers to any information relating to an identified or identifiable natural person ("data subject"); an identifiable natural person is one who can be identified, directly or indirectly, in particular by reference to an identifier such as a name, an identification number, location data, an online identifier, or to one or more factors specific to the physical, physiological, genetic, mental, economic, cultural, or social identity of that natural person.

The results from the analysis of the responses may be used in scientific publications to inform the public and the scientific community.

### Voluntary Participation

Participation in this study is entirely voluntary. You are free to withdraw at any time without providing a reason and without any negative consequences. If you decide to withdraw, any data you have provided will be removed from the study.

### Contact

For more information about this research, you may contact the scientific coordinator of the project, Vangelis Sakkalis, Computational Biomedicine Laboratory, Institute of Computer Science, Foundation for Research and Technology – Hellas (FORTH). email: sakkalis@ics.forth.gr.

• By selecting "I agree," you declare that:

You have read and understood the terms of participation in the study.

- ☒ I agree to participate in the study.  
☐ I do not agree.

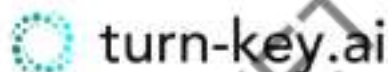
### General Information

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Gender:

- ☐ Male

## Project Partners



Funded by  
the European Union