

Innovation in teacher education

Maria Antonietta A Impedovo

▶ To cite this version:

Maria Antonietta A Impedovo. Innovation in teacher education. TEPE Network Board, 2024. hal-04518986

HAL Id: hal-04518986 https://hal.science/hal-04518986v1

Submitted on 24 Mar 2024

HAL is a multi-disciplinary open access archive for the deposit and dissemination of scientific research documents, whether they are published or not. The documents may come from teaching and research institutions in France or abroad, or from public or private research centers. L'archive ouverte pluridisciplinaire **HAL**, est destinée au dépôt et à la diffusion de documents scientifiques de niveau recherche, publiés ou non, émanant des établissements d'enseignement et de recherche français ou étrangers, des laboratoires publics ou privés.



SITE Inspé Aix-en-Provence



CONFERENCE TEPE 2024

18th Annual Conference of the TEPE Network Innovation in teacher education: sustainable change & evaluating impact at macro, meso and micro level



The event is organised in partnership with Structure Fédérative d'Études et de Recherches en Éducation de Provence (SFERE-Provence, FED 4238).

The four main topics are:

Theme 1

 Innovation in Theory-Practice Connection: Typologies, modalities, and process of innovation and their impacts in connecting theory and practices.

Theme 2

 Digitalization's Impact on Teacher Education: Contribution of new media and digitalisation in innovation and questioning impacts in teacher education.

Theme 3

 Sustainability in Teacher Education Innovation: The role of sustainable development (environment and climate change) to foster innovation in teacher education.

Theme 4

 Teacher Mobility and Innovation: Innovation towards a European teacher and European TE; questioning the innovation in teacher mobility and impacts.

INFOS & REGISTRATION (QR code)

- https://tepe2024.sciencesconf.org

SITE

Aix-Marseille University in Aix-en-Provence, France
 Site Inspé Aix-en-Provence – Campus Aix
 avenue Jules Isaac – 13626 Aix en Provence Cedex 01











BOOK OF ABSTRACT

Innovation in teacher education: Sustainable change evaluating impact at macro, meso and micro level

20-21-22 March 2024

Aix-en-Provence- France

Members of the TEPE Network Board

The TEPE activities are co-ordinated by the TEPE Board, consisting of voluntary academics from various universities throughout Europe. At present the board consists of the following members:

Maria Assuncao Flores Professor University of Minho Portugal

Nina Kilbrink Associate Professor Karlstad University Sweden

Anna Lindqvist Associate Professor Umeå University Sweden

Erika Löfström Professor University of Helsinki Finland

Joanna Madalińska-Michalak Professor University of Warsaw, Poland

Marco Snoek Professor Hogeschool van Amsterdam Netherlands

Vasileios Symeonidis Visiting Professor University of Education Freiburg Germany

Angela Canny Assistant Dean of Education Mary Immaculate College, Ireland

Aimie Brennan Marino Institute of Education Trinity College Dublin Ireland

Kirsi Wallinheimo Doctor University of Helsinki Finland Fjolla Kaçaniku Assistant Professor University of Prishtina Kosovo

Maria Antonietta Impedovo Associate Professor Aix-Marseille University, France

Introduction

The theme of the 2024 TEPE conference provokes us to think about the impact of innovation in and on teacher education by exploring the different possible typologies, outcomes, and processes of innovation at the light, mostly, of digitalisation, internalisation, and sustainable development challenges. Although the request and invocation of innovation in teacher education is widely spread, the impacts of innovation in teacher education are rarely questioned by academic disciplines, policymakers, and even teacher educators and teachers themselves. Indeed, in a continually changing context, teacher education is constantly confronted with social, institutional, and political reforms, such as the massive introduction of educational technology or the implementation of results from international surveys. Several emphasise the need for innovation and creativity in teacher education – particularly in integrating digital tools, promoting creative and inclusive learning spaces and opportunities, and fostering creativity among teachers and students. So, directly or indirectly, the solicitation to challenge, improve, or embrace and deal with innovation is continuous (Säfström, & Biesta, 2023). Focusing on sustainable change and evaluating impacts will help to identify conditions for successful transfer and real anchoring of innovations at macro, meso, and micro levels.

Understanding how innovation is sustained in teacher education provides valuable information about its influence on professional development. This conference seeks to understand and describe the characteristics of innovation that encourage deep learning and engage agentic action (Swennen 2022).

Questioning the sustainable change and impact of innovation in teacher education hopes to show that innovation and the methods to study its impact continue to reveal variety and ingenuity: How to create real innovation? In which conditions is innovation possible in teacher education? The conference will bring definitions and applications of how innovation in teacher education can be assessed. A critical perspective on the innovation process will be used.

The conference aims to create an international forum for international scholars, educators, and policy-makers to share theoretical and practical research on the assessing innovation in teacher education, innovations in school models and governance, teaching content, techniques, methods, and assessment (at all levels); and reform of teacher education and training in the changing contexts, especially the global pandemic and the 4.0 Industrial Revolution.

In doing so, the conference is expected to provide valuable scientific evidence and insights for policymaking and school/university teaching, as well as for teacher education, towards assessing innovation in teacher education, and contribute to the achievement of the Agenda 2030 SDG 4 goal of ensuring inclusive and equitable quality education and promoting lifelong learning opportunities for all.

The conference aims to address several deeper questions such as:

- What is the purpose and value of innovation in teacher education?
- Which are effective ways to introduce and support innovation in teacher education? What are the impacts of innovation in micro, meso and macro levels for teacher education? What kind of assessing for innovation and its impact?
- How is policy promoting and questioning teacher education innovation? How is the governance of teacher education influencing innovations at different levels?
- What is meaningful sustainable innovation for teacher education research and practice? How can we design innovative research and curricula that have an optimal impact on the renovation of the practice of teachers, teacher educators and student teachers?

Keynote

Michael Schratz

Michael Schratz is an Austrian educational researcher, and professor of Education at the University of Innsbruck. Schratz's research interest is in school development, system development and learning, with a special emphasis on qualification and professionalization programmes for school leadership and school improvement. As a policy advisor, system developer and consultant, he is involved with numerous national and international projects and networks engaged in quality development of educational systems and the teacher education reform.

Teacher education on the move: The Professional Journey from Yesterday's Structure to Tomorrow's Digital Realms

Historically, teachers have played the crucial role of custodians, safeguarding societal knowledge within their respective subjects. However, the era of digitalization has ushered in a paradigm shift, enabling global knowledge access at any time and from any location. This transformation places considerable pressure on schools and teacher education, challenging the traditional classroom's exclusivity in knowledge acquisition, as life unfolds increasingly in virtual spaces. This shift raises critical questions about the adequacy of current professionalization curricula and the adaptability of existing education strategies to meet the evolving needs of the next generation. If we envision schools as laboratories shaping tomorrow's society, teachers must showcase their ability to instill excitement in exploring the world and learning through innovative approaches. As architects of the future, teachers must heed the call to let go of outdated methods and actively engaging with emerging educational landscapes. To foster forward-looking teacher education, shared leadership as an overarching attitude must permeate all levels of the system, creating environments conducive to transformative educational experiences. Recognizing these evolving demands, it becomes essential to identify and implement new structures and attitudes within teacher education. This evolution is seen as essential for effectively addressing today's social challenges and preparing educators to navigate the dynamic intersection of traditional and digital realms in education.

Table of contents

$\mathbf{A3}_{-}$	${ m copie_4.pdf}$]
i.pd	lf	•
	Inferential comprehension in pre-readers: children's literature as an ecological support for assessment and training, Lisa Sanchez [et al.]	4
	ADER, Implantation d'un dispositif innovant : mise en œuvre et effets., Marie- Laure Harmand [et al.]	ļ
	Developing future teachers 'Europeanness' thanks to European mobility, Mercedes Baugnies [et al.]	(
	Implementing formative assessment strategies with pre-service teachers: self-, peer- and group-assessment, Davide Parmigiani [et al.]	,
	AI integration in education, thought out in terms of "digital prudences", Laurent Heiser [et al.]	8
	Bridging theory and practice – student teachers' communication of their master's thesis with a popular scientific approach, Jessica Aspfors [et al.]	(
	Eva Freud, a 20th century destiny : Coherence through transnational school-unicollaboration – teach what you preach, Christine Schmider	10
	Distance learning and educational innovation: an evaluation experience in 14 upper secondary schools in Rome, Maria Dentale [et al.]	1
	The impact of digitalization on the school context: the role of self-evaluation in schools, Alfonsina Mastrolia	12
	Teacher-led programs that tackle cyberbullying in schools: a systematic review, Marc Di Furia [et al.]	

on the value of teachers and teacher education for society: principles for policy., Paulien Meijer [et al.]	14
How to have European TE without moving ?, Muriel Epstein	15
Teachers' perceptions on the role of culturally relevant pedagogy in teaching immigrant background students, Rosa Maria Rodríguez Izquierdo	16
Ecological transition and sustainable development : a lever for interdisciplinary and intercultural innovation in the training of future teachers, Nathalie Rezzi [et al.]	17
Teaching at a distance in the Inspe? Between trainers' proposals and institutional obstacles, Philippe Charpentier [et al.]	19
In-service teacher training for teachers: analysis of an innovative institutional system, Fabienne Brière [et al.]	20
Co-evaluating a teaching system as part of collaborative research: an innovative approach to in-service teacher training?, Fabienne Brière [et al.]	21
The Open Classroom initiative: A Case Study on Absenteeism and Parent-Teacher Cooperation in Kindergarten Education in France, Mélanie Abi Younes [et al.]	22
The role of the formulation of hypotheses in inquiry science learning: How do teachers deal with it?, Muriel Elaoumari [et al.]	23
Innovation between the real and the virtual: interdisciplinarity highlighted, Imen Alibi [et al.]	24
The development of the European Teacher: standardize teachers' training at European level and fostering non-university teachers' mobility, Francesco Pio Savino [et al.]	25
Le travail du formateur au sein d'un dispositif innovant de formation continue des enseignants en France, Nicolas Tagnard [et al.]	27
Fostering excellence in Project-Based Learning: The triad of team teaching, peer-to-peer observation, and reflection strategies, Osman Buleshkaj	28
Video self-confrontation as a tool for teacher professional development, Sofie Vervoort [et al.]	29
OSOH, solar astronomy instrument as an innovative tool for teacher education, Brice Le Roux [et al.]	30

	Bridging research and policy in the professional development of early stage researchers in the field of teacher education, Vasileios Symeonidis	32
	The Role of Leadership in School Innovation – A Case Study, Joanna Kosowska-Pikos	33
	Quality perception in AI-assisted text correction, Christina Egger [et al.]	34
	Addressing Societal and Environmental Challenges through Transformative Pedagogy in Higher Education, Hugo Paris [et al.]	35
	Education for sustainable development in a distance learning context: an example of a didactic contextualization involving the integration of various micro levels, Lamprini Chartofylaka [et al.]	36
	Fostering meaningful educational innovation: Practices and Challenges of inclusivity in higher education, Elena Ungureanu [et al.]	37
Au	thor Index	38
sec	$\mathrm{ond}_{ ext{-}}\mathrm{part.pdf}$	41

Inferential comprehension in pre-readers: children's literature as an ecological support for assessment and training

Lisa Sanchez * 1,2, Raphaele Tsao 1, Sandrine Eschenauer 2

The ability to understand narratives has become a major issue in France, since inequalities in comprehension have been growing between students since 2005 (PIRLS, 2022), encouraging the French Ministry of Education to suggest consolidating this skill in teaching practices (MEN, 2022). While it has been recognized that comprehension skills, particularly generating inferences, are developed right from nursery school (Filiatrault-Veilleux et al., 2016), that this production of inferences would have a direct impact on the general comprehension (Oakhill & Cain, 2000), and that it would be predictive of comprehension during reading (Lepola et al., 2016) then, it seems relevant to focus on the skill of inferential production even before learning to read

Because of albums are an ideal ecological support for understanding stories thanks to their traditional narrative structure (Causse et al., 2022) we selected 10 albums from Antoon Krings' "Drôles de Petites Bêtes" based on word count, vocabulary used (Lété et al., 2004), and number of characters participating in the action. An 8-question comprehension test has been created for each story (inspired by Potocki et al., 2014): 4 on emotional inferences (Lynch & van den Broek, 2007) and 4 on pragmatic inferences (CML DSDEN44, 2015). For each question, 4 answers in the form of pictures (from books or royalty-free images) were proposed: 1 expected inferential answer, 1 literal answer, 2 irrelevant answers.

This material was tested with 116 children (aged 5 to 7) to assess the consistency of the questionnaires created and the relevance of the stories selected. In the light of the results obtained on the statistics in progress, we will discuss the contributions of the use of this type of material, created around ecological tools, on inferential comprehension in non-readers. These contributions will enable us to suggest ways of assessing and training this comprehension skill with apprentice readers.

Keywords:	comprehension,	inferences,	preschool	children,	children's	literature

¹ Centre de Recherche en Psychologie de la Connaissance, du Langage et de l'Émotion – Aix Marseille Université – France

² Laboratoire Parole et Langage – Aix Marseille Université, Centre National de la Recherche Scientifique, Centre National de la Recherche Scientifique : UMR7309, Aix Marseille Université : UMR7309, Centre National de la Recherche Scientifique : UMR7309 / UMR6057 / ESA6057 / ERS164/ URA261 – France

^{*}Speaker

ADER, Implantation d'un dispositif innovant : mise en œuvre et effets.

Marie-Laure Harmand * 1,2, Denis Caroti *

¹ Laboratoire d'Economie et de Sociologie du Travail – Aix Marseille Université, Centre National de la Recherche Scientifique, CNRS : UMR7317 – France
² LEST CNRS – AMU – France

Our research delves into an empirical study focused on the theme 1 "Innovation in Theory-Practice Connection." Our investigation concerns Atelier Démocratique pour une Expression Réflexive) pedagogical initiative that encourages debate, discussion, and reflective dialogue among students. Employing a mixed approach that integrates methods from psychology and sociology, our study aims to comprehensively examine the implementation and impact of this innovative educational intervention. The methodology of this dual disciplinary analysis is based on a psychological approach based on several quantitative measures (cognitive and metacognitive skills). At the sociological level, a qualitative method involves semi-structured interviews, documents and classroom observation. First, we analyzed the integration of ADER workshops in various secondary schools. This analysis encompasses a detailed examination of contextual factors, the existing state of affairs, networks, environments, and decision-making processes that allow the introduction of ADER. Emphasis is placed on studying the complexities associated with the introduction of an innovative practice within educational institutions, with a keen focus on the roles played by key stakeholders (teachers, headmasters, students). Subsequently, our research delves into the practical implementation of ADER workshops. The analysis extends to evaluating the workshops' impact on school climate, the well-being of both adults and students, as well as their analytic, cognitive and metacognitive competencies. We inquire into the challenges posed by the implementation of innovative projects, especially those reliant on a limited number of actors, addressing potential limitations in the project's scope. In our findings, fundamental questions emerge about the intricacies of evaluating innovative projects like ADER. The absence of discernible effects leads us to reflect on the role played by conditions for implementation on student's skills. We raise a pivotal question concerning the feasibility of accurately assessing the efficacy of pedagogical interventions solely through quantitative measures, contemplating whether the evaluation of innovative programs requires a more nuanced approach.

Keywords: Mise en oeuvre, dispositifs innovant, évaluation, climat scolaire

^{*}Speaker

Developing future teachers 'Europeanness' thanks to European mobility

Mercedes Baugnies * 1,2, Alice Delserieys *

3

¹ GCAF, Adef, Aix Marseille Université – INSPE Aix-Marseille – France

Students and teachers' mobility is rising across the European Union. For teacher education, the European Commission has started a new program of European Teacher Academy and within this framework the project UNI-T Academy started a year ago with partner universities in France, Germany, Greece, Italy and Belgium. Courses, traineeships and job shadowing are offered to the students of the five European partners of this project. As members of the teaching staff of the teaching department of our French University, we wonder whether the future teachers develop their 'Europeanness' through our project. We interviewed the first French student living in France who went to a one-week Summer course in 2022 in Germany and analyzed his discourse through Schratz's theoretical framework on 'Europeanness'. All indicators of this concept are revealed in our student's discourse. Even if it will be necessary to extend our study, this exploratory study makes us confident about our students' European skills development and the relevance of such a framework to assess the impact of a European Teacher Academy on students-teachers development of 'Europeanness' in education.

Keywords: students and teachers'mobility, teacher education, European Teacher Academy, Europeanness, European skills

² Aix-Marseille Université - Institut national supérieur du professorat et de l'ducation – Aix Marseille Université – France

³ Apprentissage, Didactique, Evaluation, Formation – Aix Marseille Université, Aix Marseille Université
: EA4671 – France

^{*}Speaker

Implementing formative assessment strategies with pre-service teachers: self-, peer- and group-assessment

Davide Parmigiani * ¹, Emiliana Murgia ¹, Elisabetta Nicchia ¹

¹ Università degli studi di Genova = University of Genoa - Italy

One of the key points in training pre-service teachers is to educate them on how to carry out effective and learning-oriented assessment. Formative assessment is particularly valuable because it helps students reflect on their learnings and better understand the process of achieving competencies (Shute, 2008; William, 2011). Universities commonly use standard testing for assessment (Kembo, 2020), even in the teacher education programs. Within a "learning by doing approach", we consider educating pre-service teachers on how to arrange and develop formative assessment strategies. To do so, we consider important to set up a teaching approach that allows pre-service teachers to experience formative assessment strategies on themselves. The faculty of Education at the University of Genova (Italy) offers a five-year course to become both kindergarten and primary school teachers. During the academic year 2022/2023, we conducted an exploratory study on formative assessment. This study aimed to train and motivate preservice teachers in learning and using several strategies of formative assessment. Within a subject named "Curriculum development", 156 pre-service teachers experienced three strategies of formative assessment: self-assessment, peer-assessment, and group-assessment. The study was structured with a three-stage mixed method collecting both quantitative and qualitative data. At the end of each stage, a questionnaire collected the pre-service teachers' opinions, thoughts, and impressions regarding each formative assessment strategy. Qualitative and quantitative data were analysed respectively with NVivo 14 and SPSS29. Findings revealed showed that pre-service teachers appreciated peer- and group-assessment, although these practices require specific and careful organisation and resources to be run.

Keywords: Learning assessment, formative assessment, teacher education

^{*}Speaker

AI integration in education, thought out in terms of "digital prudences"

Laurent Heiser * , Jean-François Céci *

1

¹ Université de Adour et des Pays de l'Adour (Pau, France) – Université de Pau et des Pays de l'Adour – France

Our presentation is intended to be both theoretical and practical. We will present the conceptual foundations of our work on digital for education within the framework of a sociocritical approach (Collin, 2016). Then, taking into account the educational environment in which digital technology is embedded, we will discuss the issue of decision-making and the roles played by AI (Lepage, 2023). By analyzing two reference articles (Lepage and Roy, 2023, Selwyn, 2020), as well as a number of international guides, we will highlight the importance of supporting educational players in adopting an ethical approach (transparency, explicability) when integrating AI. To this end, we will propose a virtuous approach to AI by confronting the articles in our corpus with a typology called "forms of digital prudence" (authors, forthcoming), which we will adjust specifically to the use of AI by learners, teachers and educational executives. In this way, we aim to open the way for an enriched dialogue on the role of the six forms of digital prudence in teacher training for AI.

Keywords: agentivity, teacher training, artificial intelligence, forms of digital prudences

^{*}Speaker

Bridging theory and practice – student teachers' communication of their master's thesis with a popular scientific approach

Jessica Aspfors * 1, Gunilla Eklund *

², John Henriksson *

1

Abo Academy University – Finland University of Agder – Norway

In previous studies, there is an ambiguity regarding the role of research in teacher education and teachers' use of research in their profession. Based on this background, an innovation project in Finland was started in 2019. The project focuses on the classic theory-practice challenge and seeks to bridge research and practice with a popular scientific approach. Based on their master's thesis, student teachers create video pitches and didactic materials aiming at communicating their scientific knowledge in a popular scientific way to teachers and school community. In this presentation, the focus will be on mirroring student teachers' plans for creating popular scientific material against the expectations of teachers.

Following research questions are posed:

- 1. How do student teachers and teachers perceive the relevance of the popular scientific material based on student teachers' master theses?
- 2. How do student teachers' plans for their popular scientific material meet the expectations of teachers with regards of applicability of the material?

The data was gathered by an open-ended questionnaire with 35 student teachers, as well as interviews with 10 primary school teachers. The material was analysed by reflexive thematic analysis. The results indicate that student teachers found it quite straightforward to create popular scientific video pitches based on their master's theses, while teachers deemed these relevant to their own practice. However, student teachers encountered challenges in grasping the task of creating didactic materials, specifically struggling with defining the target audience and the concrete applicability of the materials. Teachers in turn found it challenging to discern the concrete utility in their own practice of the didactic materials. Thus, the popular scientific approach in this innovation project provides one possible way to connect theory and practice in teacher education.

Keywords:	Popula:	r science,	master's	theses,	theory	and	practice
------------------	---------	------------	----------	---------	--------	-----	----------

^{*}Speaker

Eva Freud, a 20th century destiny: Coherence through transnational school-uni-collaboration – teach what you preach

Christine Schmider * 1

In my paper, I will present a school collaboration project based on the life of Eva Freud, Sigmund Freuds granddaughter and analyze how its transnational and transdisciplinary setting enhances coherence in teacher education in an innovative way. I will show how different aspects of the project – its' task based and project-oriented approach and its' out of school/uni setting contribute to an intercultural awareness and a coherent professionalization of the students, overcoming the fragmented way in which professional knowledge is often acquired. My research question is: How and through which innovative measures can coherence, ie. a meaningful alignment between central domains of TE (Canrinus, et al. 2015 Hellmann, 2019) be enhanced in foreign language teacher education. Based on a creative reading, writing and theatre workshop on the fascinating and tragic destiny of Eva Freud, former student of a the Lycée XXX in XXX during WWII, the project focused on a creative, learner-centered approach. The participants worked with authentical documents of school archives, the Sigmund Freud Archives at the Library of Congress and the correspondence between Eva Freud and a friend of her, Hélène Doub, who hid in XXX s to escape the nazi deportation. These historical sources shed light on the political and historical situation and the female condition of the 40s in France. They allowed an innovative interdisciplinary learning and teaching approach by conferring a double role of learner and teacher on the teacher education students. In a series of interviews, conducted during the project, I evaluated the learning output for the students and more specifically, the impact on the perceived coherence of their teacher training. The results showed the positive impact through the transdisciplinary approach which helped them to adopt new and productive perspectives on content knowledge and a significant strengthening of the theory-practice link.

K	.eywords:	collaboration,	coherence,	transdiscip	linarity,	Eva 1	Freud
---	-----------	----------------	------------	-------------	-----------	-------	-------

¹ Laboratoire d'Innovation et Numérique pour l'Education – Université Nice Sophia Antipolis (1965 - 2019), Université Côte d'Azur – France

^{*}Speaker

Distance learning and educational innovation: an evaluation experience in 14 upper secondary schools in Rome

Maria Dentale ¹, Viviana Capozza ², Alfonsina Mastrolia * ²

National Research Council of Italy – Italy
 Department of Communication and Social Research, Sapienza University Rome – Italy

In the context of the Covid-19 pandemic, the overall reorganization of the school system has raised a deep discussion on the role of digital technologies. The integration of Information Communication Technologies (ICT) in teaching environments has led to a practical and organizational change engaging teachers in the radical transformation of learning contexts (De Angelis, Santonicola, Montefusco, 2020), towards an increase in the digitization of teaching. The innovation of educational practices and processes does not represent a constant and unequivocal trend in all school contexts, but an opportunity that varies according to social components of a structural nature (e.g., digital infrastructure) and of a symbolic-value nature (e.g., teachers' propensity to innovate educational strategies). Starting from these premises, the research activities carried out by the Sapienza University of Rome and conducted over a three-year period (2020-2023) aimed to reconstruct the social impact of digital teaching in 14 upper secondary schools in Rome by teachers, students and families' point of view. To answers' some of the research questions, teachers of the selected schools where asked to focus on their experiences about the increase of technological skills and the methodological-didactic innovation required for the organization and design of learning environments. In this way it was possible to detect whether the intensive use of ICT within teaching practices has fulfilled a propulsive function for the innovation of educational processes, in terms of adoption and use of innovative pedagogical strategies. In particular, the research made it possible to reconstruct the changes that have occurred with reference to the integration of ICT in the organizational-school setting and the growth of transversal skills in teachers, in the perspective of lifelong learning, focusing on the elements that have led or not to the enhancement of digital technologies in learning environments.

Keywords: social impact, teaching innovation, lifelong learning, ICT

^{*}Speaker

The impact of digitalization on the school context: the role of self-evaluation in schools

Alfonsina Mastrolia * 1

¹ Sapienza – Italy

The experience of digital education has introduced the new digital challenge to the school, urged by the integration of Information Communication Technologies (ICT). Considering the needs of a school renewed by ICT, the aim of the work was to understand what indicators might be useful for self-evaluation in this current transition to e-learning, to describe the changes produced on the learning environment and teaching methods.

Self-evaluation represents a reflective process within each school that allows it to know its starting point and to account for the outcomes achieved (Stame, 1998) in a transparent and constant way according to accountability requirements (Mulgan, 2000). The school self-evaluation tool (Barzanò, Mosca, Scheerens, 2000) that documents this process is the Self-Evaluation Report (RAV) of the INVALSI (National Institute for the Evaluation of the Italian Education System). Self-evaluation enables achieve quality education and school improvement (West e Hopkins, 1997).

The exploratory study of the present work is based on secondary data analysis of two RAV indicators provided by INVALSI during an internship. The descriptive analysis covered the set of indicators relative to digital teacher training (Indicators no. 3.6.a.3/RAV) and the types of activities stipulated between territorial networks (Indicators no. 3.7.b.2/RAV).

Starting from the SER experience, on the methodological level, the research aims to empirically pilot the self-evaluation model built against a set of indicators that investigate, in hypotheses:

- the teaching methodologies used in the classroom by teachers;
- the training activities in which teachers participate.

The intention is to reflect on the definition and redesign of new indicators for evaluating the quality of educational institutions to promote a significant change in teaching methodologies and practices. The self-evaluation model will be submitted during in-depth online interviews to a sample of secondary school teachers in Rome.

				_		_		
Keywords:	Self Eva	luation R	Report.	teaching	innovation.	indicators.	digital l	earning

^{*}Speaker

Teacher-led programs that tackle cyberbullying in schools: a systematic review

Marco Di Furia * 1,2, Guendalina Peconio 1,2, Martina Rossi 1,2, Giusi Antonia Toto 1,2, Francesco Sulla 1,2

 1 Università degli Studi di Foggia - University of Foggia - Italy 2 Learning Science hub - Italy

Cyberbullying is a phenomenon that has fully entered the leading interests of the educational community. Scholars from around the world dealing with educational issues have developed, in recent years, training and intervention programs on an issue that is crucial for ensuring the well-being of students, contributing to making digital spaces safer for all. In this process, the centrality of teachers is crucial: making teachers aware of the phenomenon and the strategies to deal with it is an indispensable protective factor, in addition to laying the groundwork for implementing solid teacher-led programs to combat cyberbullying in schools. This systematic review aims to investigate the latest teacher-led programs for countering cyberbullying, focusing on methods and topics of teacher training with respect to such programs and the advantages and disadvantages that have emerged from their implementation. The proposed review is conducted by means of Web of Science, EBSCO, Scopus and Google Scholar for articles published from 2013 to 2023. The selected articles undergo a screening process, according to PRISMA guidelines. The systematic review aims to identify studies that return a recent and up-to-date overview of teacher-led cyberbullying programs, with specific reference to geographic areas of application. This will provide useful data on the status of teacher education with respect to the topic of cyberbullying and actions taken to promote active teacher involvement in countering it. The focus on modes, topics, advantages and disadvantages of teacher-based programs allows for the creation of a SWOT (Strengths, Weaknesses, Opportunities, and Threats) analysis tool for future teacher-led programs to be implemented in schools. Second, the best practices collected in this review aim to become a valuable reference for learning about strategies and ways of teacher training on the phenomenon of cyberbullying in schools.

K	leyword	s: cy	berbul	lying,	systematic	review,	teacher	training
---	---------	-------	--------	--------	------------	---------	---------	----------

^{*}Speaker

On the value of teachers and teacher education for society: principles for policy.

Paulien Meijer * ¹, Ingrid Paalman *

, Mirko Noordegraaf

¹ Radboud university [Nijmegen] – Netherlands

In this contribution, we present policy principles for an Investment Agenda in teaching and teacher education that should revitalize the globally felt deadlock of policies around teacher shortages (cf. Goodwin, 2020). In earlier research that covered document analyses and explorative conversations, we identified seven vardsticks for changing teaching and teacher education policies. Based on these yardsticks, we developed practical guidelines for policy change, clustered in three main categories: (1) strengthening the teaching profession, (2) strengthening teacher education, including induction and professional development, and (3) strengthening teacher education policymaking. These findings were the starting point for a range of recorded interactive sessions with stakeholders, which included teachers, teacher educators, school leaders, and policy makers. In analyzing these sessions, we found that psychological, societal and cultural investments, in teaching as well as in teacher education, are needed. These add to mere financial investments and go beyond the call for 'better working conditions' and 'more financial leeway' for teachers. It means that the appreciation for the profession needs to be strengthened. Attitudes, mindsets and practices need to be reconsidered. Cooperation between a range of stakeholders needs to be fueled in a rather traditional educational field that is increasingly divided and polarized. Also, we found that the societal impact of education is a collective and therefore a unifying incentive. We conclude that, above all, educational policies should focus on the societal value of teachers and teacher education. In this contribution, we elaborate what it would entail to align educational policy and practice for societal impact. Share ideas with the participants on how to map the findings in participants own countries and their challenges with teacher shortage policies. Goodwin, L.A. (2020). Teaching standards, globalisation, and conceptions of teacher professionalism. European Journal of Teacher Education. https://DOI.org/10.1080/02619768.2020.1833855

Keywords: Teacher education, Societal value, Policy principles

^{*}Speaker

How to have European TE without moving?

Muriel Epstein * 1,2,3

École, mutations, apprentissages – CY Cergy Paris Université : EA4507 – Université de
 Cergy-Pontoise - Site de Gennevilliers - ZAC des Barbanniers - Avenue Marcel Paul - 92230
 Gennevilliers, France

In 2018 the European Union initiated 41 university consortia to explore ways to create diverse models for research and education across Europe. One of these consortia is the Eutopia Alliance. In this consortium, a connected research community "inclusive Education" is experimenting with ways to train teachers in Inclusive Education. This research community is backed by a learning community of student teachers.

To be ecologically sustainable, we need to work remotely as much as possible. However the literature (Kim et al. 2023, Beauné et al. 2019) shows that online-only training does not work to constitute effective groups. Still, it is possible to improve the online platforms' features in order to foster group work (Epstein & Buard 2023) and teachers' professional development (in the definition of Donnay & Charlier 2006).

In 2022/2023 we conducted an experiment with 15 French students in master 2 MEEF based on the platform $GPS\ Educ'$ (Lehner & Nordmann 2021). The students interacted online, asynchronously, in English, with native Dutch-speaking Belgian students, and analyzed cases together.

Between April and July 2023, we recorded four semi-structured interviews of one hour each, with French students. We analyzed these interviews using a grid developed by Van Peteghem and Consuegra (2021) that was made from a meta study of meta studies, and that identifies 10 fundamental criteria for TE for inclusive education.

These interviews show that written exchanges in a foreign language with different theoretical frameworks are efficient for reflexivity and professional development. However, they also show that the lack of common definition (specifically around inclusion) leaves room for stereotypes. This presentation will detail the experiment, the grid of analysis and, through the four student interviews, the limits and options given by our dispositif.

Keywords:	Europe, Professionnal developement, inclusion, Teacher exchanges

² Statistique, Analyse et Modélisation Multidisciplinaire (SAmos-Marin Mersenne) – Université Paris 1 Panthéon-Sorbonne : EA4543 – Centre Pierre Mendès France 90 Rue de Tolbiac - 75634 Paris Cedex 13, France

 ³ Groupe de recherche sur le handicap, l'accessibilité, les pratiques éducatives et scolaires (EA 7287 Grhapes) (Grhapes) – Institut national supérieur de formation et de recherche pour l'éducation des jeunes handicapés et les enseignements adaptés : EA7287 – France

^{*}Speaker

Teachers' perceptions on the role of culturally relevant pedagogy in teaching immigrant background students

Rosa Maria Rodríguez Izquierdo * 1

¹ University Pablo de Olavide – Spain

Culturally relevant pedagogy (CRP) receives limited attention in many Spanish classrooms. CRP is a pedagogical model, of North American origin, that aims to significantly enhance the success of culturally diverse students. However, it is practically unknown in Spain. Hence, the contributions of this work can be considered a true novelty. This article presents a study aimed at investigating the perceptions about the role of culturally relevant pedagogy in teaching immigrant background students. A qualitative design, employing ethnographic observations and semi-structured interviews to ten Spanish teachers is used. This work focuses on understanding the barriers teachers perceived as preventing the implementation of CRP in their classrooms. Employing critical sociocultural theory and drawing on content analysis as a method, three primary barriers were identified: lack of time, lack of culturally relevant materials and lack of knowledge. The individual and contextual issues surrounding these barriers and their implications are discussed for teacher education as well as to assess the translation of this model to our context, in which students of immigrant origin tend to have lower average academic performance than their peers. Finally, some recommendations for improving the learning of immigrant background students are outlined.

Keywords: Immigrant background students, culturally relevant pedagogy, teachers' perception, qualitative research.

^{*}Speaker

Ecological transition and sustainable development: a lever for interdisciplinary and intercultural innovation in the training of future teachers

Nathalie Rezzi * ^{1,2}, Morgane Leray *

- ³, Eric Vottero *
- ⁴, Corinne Jegou *
- ⁵, Solenne Albertini *
 - ⁴, Martine Conio *

6

Committed to quality education (SDG 4, France 2030), teacher training must take into account the ecological transition for sustainable development (TEDS) in order to support the necessary transformations of a School that must adapt to a world in perpetual change (OECD, 2018). The environmental issue is at the crossroads of a number of challenges and a variety of changes, and as such calls for a collaboration of knowledge, a synergy of practices and a cross-disciplinary approach: TEDS is set to be rolled out in teacher training from the start of the 2024 academic year (MESR, 2022), and is therefore an opportunity to innovate and experiment for and with future teachers.

This is the ambition of A*MIDEX MEDDU2S, supported by the interdisciplinary and intercategory teams of Inspé AMU: to make students aware of a systemic, holistic and forward-looking approach, using an active, experiential and critical teaching method, the aim of which is to develop in future teachers "complex thinking" (Morin, 1982) with regard to sustainable development and an aptitude for teaching based on scientific, interdisciplinary (so-called " hard sciences" and SHS) and intercultural knowledge.

We will look at the first schemes put in place and analyse them critically, backed up by surveys of students, and then look at the prospects for improvement and expansion (Bachelor's degree in teaching, Starling bilingual PE program, CIVIS/UNI-T European training modules). One

ADEF - GCAF - Aix Marseille Université (Aix-en-Provence) - France INSPÉ - Aix-Marseille - Aix-Marseille Université - AMU - France

³ ADEF – Aix Marseille Université, INSPE Aix-Marseille – France

⁴ INSPÉ - Aix-Marseille – Aix-Marseille Université - AMU – France

⁵ ADEF – Aix Marseille Université, INSPE Aix-Marseille – France

 $^{^{6}}$ INSPÉ - Aix-Marseille — Aix-Marseille Université - AMU — France

^{*}Speaker

of the hypotheses is that the skills-based approach seems to be a decisive element in bringing disciplines, professional cultures and methodologies into dialogue without falling into a compartmentalised and sclerotic approach. This is undoubtedly the main challenge, both intellectual and practical, for trainers and students alike, to articulate pedagogical innovation, training in TEDS, interdisciplinarity and interculturality in an efficient manner, both to reform schools and to transform the world.

Keywords: sustainable development, teacher training, innovation, interdisciplinarity, interculturality, active pedagogy

Teaching at a distance in the Inspe? Between trainers' proposals and institutional obstacles

Philippe Charpentier * 1,2, Georgeta Stoica *

2

While the Covid crisis showed that it was possible, under certain conditions, to teach and learn at a distance under good conditions in higher education (Nambiar, 2020; Opanasenko and Novikova, 2023), it now seems difficult, once the crisis has passed, to get this teaching method accepted in any INSPEs. Although technical facilities, funding and volunteer teachers exist, institutional obstacles are preventing this teaching method from being introduced, even on the margins of the rest of the curriculum. The 'school form' (Vincent, Lahire and Thin, 1994) is resisting, surrounded as it is by doubts about trainers and trainees, about the possibility that they might not be doing what they should be doing, about the seriousness of such a system, and about the difficulty of monitoring each other's bodies for want of being able to monitor their cognitive activity. This situation is all the more paradoxical given that, at the same time, the French Ministry of Education is asking its future teachers to "integrate the elements of digital culture necessary for the exercise of their profession" by making "effective use of technologies for exchange and training" (BOEN, 2013). The aim of this paper is to give an account of the experience of two teacher-researchers, one in Educational and Training Sciences, the other in Anthropology, who wanted to be able to do some of their university teaching at a distance but were prevented from doing so, by mobilising the theoretical framework of the French ergonomic school (Leplat, 1983) based on the distinction it makes between task and activity (Vinatier and Pastré, 2007) and what it calls the reality of activity (Clot, 2008), in this case the effects of these institutional obstacles which prevent the emergence of new forms of schooling in initial teacher training and new learning methods for them.

Keywords: obstacle, distant teaching, distant learning, school form

¹ Institut Coopératif Austral de Recherche en Éducation (ICARE) – Allée des Aigues Marines 97487 Saint-Denis Cedex, Réunion

² Centre Universitaire de Formation et de Recherche de Mayotte – Labotoire Icare (EA7689) – France

^{*}Speaker

In-service teacher training for teachers: analysis of an innovative institutional system

Fabienne Brière ¹, Emilie Mari * ¹, Guillaume Ponthieu *

1

¹ Apprentissage, Didactique, Evaluation, Formation – Aix Marseille Université, Aix Marseille Université
: EA4671 – France

Our paper focuses on "constellations", an institutional in-service training scheme for schoolteachers deployed in France since 2018 (Villani et al., 2018). The aim of this program is to improve students' academic results in mathematics and French, which recent assessments (DEEP, 2023; PISA; TIMMS) have revealed to be fragile. The novelty, changes, values, and processes attesting to the innovative dimensions of this scheme (Cros, 2009) are linked to the ways in which teachers are engaged in their training. These modalities are inspired by collaborative research (Desgagné and Bednarz, 2005), promoting reflexive and collaborative analysis embedded in teachers' actual practices. They therefore contrast with previous top-down training methods, which international surveys have shown to be ineffective in terms of teacher development (Malet et al., 2021). Our aim is to analyze the effective implementation of constellations in the Aix-Marseille Academy, regarding disciplinary contexts (mathematics, French) as well as geographical contexts (urban, rural, priority education). This will enable us to identify specific criteria for the quality and effectiveness of this training (Council of the European Union, 2009). The methodology combines several scales of analysis relating to the management and conduct of training and its impact on classroom teaching practices. The main results point to the context-dependent adjustments the trainers made to the prescribed system. These concern the structure of the constellation process, the negotiation of work objects, and the involvement of teachers in the design/analysis of the situations they experienced. Furthermore, the evaluation of the "constellations" program raises questions about the quality and efficiency of its nationwide deployment regarding its impact on the professional skills of trainers and primary school teachers, and more broadly on the evolution of their professional development.

Keywords: constellations, professional development, inservice training, schoolteachers

^{*}Speaker

Co-evaluating a teaching system as part of collaborative research: an innovative approach to in-service teacher training?

Fabienne Brière * 1,2, Carole Vejux *

, Eleonore Mendiela *

3

ADEF – EA 4671 ADEF - AMU, Aix-Marseille Université, ADEF UR 4671 – France
 Aix-Marseille Université – Aix-Marseille Université, Aix-Marseille Université, Aix Marseille Université – France

³ Aix-Marseille Université – Aix-Marseille Université - AMU – France

Our contribution concerns the joint evaluation by researchers and education professionals of a specific school-based argumentative debate system called 'Ateliers Démocratiques pour une Expression Réflexive' (ADER). Developed under the impetus of Müllner (2021) in the Aix-Marseille 'académie' (Administrative district of reference for the French national education system), this scheme involves getting pupils to discuss universal issues by mobilising the reflective processes involved in problematisation, conceptualisation and argumentation (Tozzi, 2005). The novelty, change, values and processes underlying its implementation make it an innovative school system (Cros, 2009). The teaching methods used break with the traditional school model by allowing pupils to express themselves freely within a framework controlled by the teachers and not linked to the school curriculum.

The evaluation of the ADER scheme is part of a formative intervention (Sannino & Engeström, 2013) involving different types of education professionals (teachers, principal education advisers, headteachers) and researchers from a variety of backgrounds in a vocational high school and secondary school in a priority education network. The methodology used to conduct the research-intervention highlights the transformative agentivity of the teachers by drawing on their concerns and the traces of their actual activity (photos, film recordings, individual interviews, focus groups). It is based on various stages during which teachers from the same school, accompanied by researchers, are collectively involved in: i) analysing the ADER system in terms of students' learning activity and teachers' professional actions; ii) designing assessment tools (choice of indicators to assess pupils' skills; questionnaires for students and teachers).

Our contribution aims to give an account of the process of professional development of those involved in formative intervention. It also examines evaluation methods, the conditions and limits of expansion of an existing system in schools.

Keywords:	professional	development	ϵ , evaluation.	formative	intervention.	reflexivity

^{*}Speaker

The Open Classroom initiative: A Case Study on Absenteeism and Parent-Teacher Cooperation in Kindergarten Education in France

Mélanie Abi Younes * 1, Odile Thuilier *

¹, Caroline Hache *

1

In 1882, Jules Ferry established in France the Law of Compulsory Education. This law insisted on obligatory education regardless of social backgrounds. However, it also consisted of providing free education. Hence, despite the tuition free schooling, absenteeism is an alarming problem in France, especially in the Priority Education Areas (PEA) kindergarten.

Therefore, we conducted an exploratory study at a kindergarten school in a big city of the south of France. To reduce absenteeism, parents and teachers have worked together to identify ways of improving the school-family relationship, and hence pupil attendance. Together they decided to set up the "open classroom" scheme to enable parents to observe their child's day-to-day life in the classroom. Interviews were conducted with parents and teachers following this project.

The results indicate a high level of satisfaction with the project amidst both parents and teachers. Parents were able to identify several elements with which they were unfamiliar. Their discussions focused not only on their child's behavior, but also on the skills he was acquiring during the session. Moreover, conversations were centered on parent-teacher relationship during the class. In the teachers' perspective, organizational aspects prior to the opening of the classroom were discussed, as well as the influence of parents' attendance in the classroom.

In conclusion, we assume that the findings will contribute to the understanding of the various dynamics surrounding school absenteeism, particularly in the priority educational area (REP+). In one hand, our study intends to improve the parents-school relationship. On the other hand, it aims to decrease the rates of absenteeism. However, not all parents took part in the initiative. Some parents, considered to be distant from the school, were unable to be involved in the project.

T/	1	T.7	1	1 , .		1		1	1 . 1		1 1
KAI	mords	KAV	words	absenteeism.	onen	classroom	CO	education	kınd	ergarten	SCHOOL
IXC.y	words.	1 X C. y	words.	abscirccisiii,	Open	CIGOSI OOIII,	co,	caucamon.	minu	CI Sai tCii	BCHOOL

 $^{^{1}}$ Apprentissage, Didactique, Evaluation, Formation – Aix Marseille Université, Aix Marseille Université : EA4671 – France

^{*}Speaker

The role of the formulation of hypotheses in inquiry science learning: How do teachers deal with it?

Muriel Elaoumari * 1, Maria Antonietta Impedovo 2, Corinne Jegou 2

Inquiry-based science teaching, recommended in France in cycle 3 of primary school, develops skills linked to scientific reasoning. One of the stages of this reasoning, the formulation of hypotheses, must be developed among students because it allows the construction of concepts, knowledge and procedures. Indeed, as early as 1910, Dewey declared that the hypothesis is the "central factor" of reflection (cited by Cariou, 2015, p. 18) while Windschitl recalls the power of the "creative process" of formulating a hypothesis (2008 cited by Cariou, 2015, 17). However, this stage is poorly defined. Furthermore, several studies have shown the difficulty for teachers to develop this ability in students (Calmettes, 2009; Venturini & Tiberghein, 2012).

In a previous study, we developed a grid for evaluating the admissibility of the hypotheses on a sample of 91 students (aged 9 to 11 years old). The results made it possible to identify relevance criteria and categorize the hypotheses.

In this follow-up study, we focus on the teachers criteria to identify relevance criteria and categorize the hypotheses. The aim is the validation of the grid based on students formulation and extend the understanding of the hypotheses into the Inquiry-based science teaching. Research question is: What are the criteria that can define a good hypothesis by the teachers in relation to the problem included in an investigation process? To achieve this objective, we propose to compare the grid constructed to teachers of different levels (in training, in service and teacher educators). An interview protocol and data collection will be proposed in order to identify: criteria, relevance and skills that teachers attribute to the hypothesis in inquiry science learning. In particular, the reflection on the link between hypotheses and sustainable development will also be developed.

Keywords: hypothesis, scientific reasoning, Inquiry based science teaching

 $^{^{1}}$ Apprentissage, Didactique, Evaluation, Formation – Aix Marseille Université, Aix Marseille Université : EA4671 – France

 $^{^2}$ Apprentissage, Didactique, Evaluation, Formation – Aix Marseille Université, Aix Marseille Université : EA4671 – France

^{*}Speaker

Innovation between the real and the virtual: interdisciplinarity highlighted

Imen Alibi * 1,2, Maria Antonietta Impedovo *

³, Rached Ben Younes *

1

² ECOTIDI : Education, Cognition, Tice et Didactique – Tunisia

Our contribution reflects the state of the art of the comparison between the real and the virtual in a session whose objectives are linked to the teaching of robotics. A second year science class session at the secondary school was organized for the construction of a smart car.

To initiate the session, the situation was raised by the use of virtual headsets for a co-chosen video sequence (researcher and teacher). Then a questionnaire was presented to the students.

The analyzes carried out and the results revealed raise at least two levels: addressing educational time, school time and the creative process of orchestrating linguistic, psychological and material resources. As well as the different categories resulting from the classification (Edwin A. Fleishman et al.; Alexis Paljic), to the extent that we highlight the analysis of the nature of the information, the tool and the activities "taken into account by the user in the environment whether virtual or real".

Keywords: Innovation, didactics of physical sciences, real and virtual, Robotics.

 $^{^{1}}$ TEMI, LR 21ES27 Laboratoire de recherche Technologie, Energie et Matériaux Innovants, Université de Gafsa, Tunisie – Tunisia

³ Apprentissage, Didactique, Evaluation, Formation – Aix Marseille Université, Aix Marseille Université : EA4671 – France

^{*}Speaker

The development of the European Teacher: standardize teachers' training at European level and fostering non-university teachers' mobility

Francesco Pio Savino * 1, Piergiorgio Guarini *

¹, Stefania Fantinelli ¹

The European Union offers great opportunities for teachers' mobility, which aims to enable teachers to compare themselves with their European (and non-European) counterparts, and allows them to enrich themselves through mobilities, by attending courses and shadowing teaching and research methodologies.

Mobility opportunities are common among university teaching staff: mobility periods are provided by individual universities, and by the European Commission with the Blended Intensive Programs (BIPs).

Non-university teachers, however, do not carry out mobility periods in other European countries. Non-university mobility is provided primarily for students, with teachers just accompanying them.

In this contribution, a proposal for common training for trainee and in-service teachers from European Union countries is presented, so that non-university teachers can have a part of their training standardized at the European level, in order to have a common ground for comparison with their European counterparts and to stimulate participation in mobilities in other European countries.

The psychosocial scientific literature provides foundation for this proposal, confirming that the promotion of continuing education and exposure to new challenges and opportunities can enrich the motivational potential of the profession. Specifically, a training project that is based on job design practices may be able to stimulate psychological states salient to intrinsic motivation, such as: experiencing feedback, experiencing the meaning of work, accountability for outcomes, and variety in tasks. Such psychological states are also effective in fostering high performance quality and greater job satisfaction, and this correlation can be moderated by dispositional factors (e.g., the need for personal and professional growth).

Mobility also represents an alignment with a highly dynamic, competitive and global work environment; approaching in this sense the practices of global talent management, understood as a set of practices aimed at identifying, selecting, developing and retaining in one's organizational context, individuals with high levels of technical and soft skills.

¹ Università degli Studi di Foggia - University of Foggia - Italy

^{*}Speaker

 $\textbf{Keywords:} \ \ \textbf{teachers mobility, teachers training, global talent management}$

Le travail du formateur au sein d'un dispositif innovant de formation continue des enseignants en France

Nicolas Tagnard * 1, Fabienne Brière *

Notre communication s'intéresse à l'évolution du rôle du formateur dans le " dispositif des constellations" (Villani et al., 2018). Ce dispositif, récemment implanté en France, marque une évolution majeure du modèle de formation qui vise à impliquer les enseignants en partant de leurs besoins articulés aux questions d'apprentissage des élèves. Notre contribution vise d'une part à interroger les tensions dont relève cette innovation au regard des politiques internationales de formation et d'autre part à identifier comment l'expérience du formateur impacte son activité dans la conduite de ce dispositif.

Une analyse socio-historique des modèles de formation montre l'existence de tensions spécifiées en fonction de la culture singulière des territoires. Ainsi, chaque modèle tente de concilier les enjeux des réformes scolaires et le besoin d'autonomisation des enseignants dans la construction de leur professionnalité. Aussi, les constellations se veulent un dispositif innovant destiné à dépasser l'inefficacité des modèles de formation descendants (Malet et al., 2021) par la prise en compte des besoins des enseignants, la sollicitation de leur réflexivité indexée à leurs pratiques réelles d'enseignement et la collaboration entre pairs sur un temps long (Desgagné & Bednarz, 2005). A un second niveau, le dispositif méthodologique associe des données filmées des constellations et des entretiens d'auto-confrontation (Clot et al., 2000) afin d'analyser l'activité de deux formatrices dans deux constellations menées en français dans et hors éducation prioritaire. Les principaux résultats montrent que l'agentivité des formatrices s'appuie sur leur expérience " par et dans les situations de travail "(Thievenaz, 2019, p. 54) revisitée au contact de l'appropriation de nouveaux savoirs professionnels leur permettant d'accompagner les enseignants dans la coconception et co-analyse de situations d'enseignement.

L'analyse du travail du formateur référé aux tensions structurant l'évolution des modèles de formation pointe les critères de qualité mais aussi les limites de l'implantation d'un dispositif de formation innovant à grande échelle.

Keywords:	constellations,	expérience,	agentivité,	modèle de formation,	développement	professionnel

 $^{^{1}}$ Apprentissage, Didactique, Evaluation, Formation – Aix Marseille Université, Aix Marseille Université : EA4671 – France

^{*}Speaker

Fostering excellence in Project-Based Learning: The triad of team teaching, peer-to-peer observation, and reflection strategies

Osman Buleshkaj * 1

¹ Kosovo Pedagogical Institute – Kosovo

This qualitative study explores the transformative impact of a holistic approach encompassing team teaching, peer-to-peer observation, and reflection within the context of Project-Based Learning (PBL), specifically focusing on the experiences and perspectives of graduate student teachers. Recognizing the collaborative and dynamic nature of PBL, this research investigates the interplay among these three components and their collective influence on the professional development, student engagement, and project outcomes of graduate student teachers. Through in-depth interviews, classroom observations, and reflective analyses, the study provides comprehensive insights into the intricate relationships among team teaching, peer-to-peer observation, and reflective practices during PBL implementation.

Findings reveal that the integration of team teaching fosters a collaborative instructional environment, promoting diverse perspectives and skill sets among graduate student teachers. Peer-to-peer observation enhances this collaboration by providing constructive feedback, facilitating a continuous improvement cycle tailored to the unique needs of novice educators. Reflection emerges as a crucial component, serving as the linchpin that synthesizes experiences and refines instructional strategies, particularly within the context of graduate student teacher development. Educators engaged in this triad reported heightened self-awareness, adaptability, and a deepened commitment to student-centered learning, offering valuable insights into the nuances of PBL within the graduate student teaching experience.

This qualitative study not only highlights the synergies among team teaching, peer-to-peer observation, and reflection but also offers practical guidance for educators and administrators seeking to implement this triad approach effectively, with specific considerations for the developmental stage of graduate student teachers. Recommendations include establishing a supportive culture of reflective practice, implementing structured peer observation protocols, and integrating these components into graduate-level teacher preparation programs. By elucidating the interconnected dynamics of these strategies within the graduate student teacher context, this research aims to empower educators and educational institutions in optimizing the quality and impact of Project-Based Learning experiences.

Keywords:	Graduate student	teachers,	Project,	Based	Learning,	$_{\rm team}$	teaching,	peer,	to,	peer
observation, reflect	ction									

^{*}Speaker

Video self-confrontation as a tool for teacher professional development

Sofie Vervoort * ¹, Caroline Hache * ¹, Eric Tortochot ¹

In the dynamic landscape of French education, Vocational Education and Training (VET) plays a vital role, catering to approximately 630,000 students (MEN, 2023). Despite its significance, VET faces challenges, both in terms of student perceptions and teacher experiences. Teachers in VET experience a form of imposed orientation rather than a chosen one. A sense of disqualification, even a feeling of relegation, is also present among teachers involved in VET teaching (Jellab, 2017a; Jellab, 2017b). This study explores the transformative potential of self-confrontation, rooted in ergonomics and work psychology, as a tool for professional development among VET teachers.

Utilizing the theoretical framework of the Institut français de l'éducation (IFE), we focus on the psychological aspects of work and their enhancement through video self-confrontation (VSC) (IFE, 2023). VSC, a tool rooted in ergonomics and work psychology, enables individuals to reflect on their actions, fostering behavior change by providing objective access to one's thinking (Greggio et al., 2008; Cicurel, 2016). Applied in a vocational high school setting, our longitudinal study employs successive stages of VSC to trigger individual thinking, collective elaboration, and rich institutional discussions, aiming to transform everyday work organization (Kloetzer, 2018).

Data is collected from transcripts of VSC-sessions based on filmed interactions between a teacher and her students. The analysis focuses on elements significant to the teacher, exploring reflexive discourse during the self-confrontation. Results illustrate the benefits and limitations of self-confrontation as a tool for professional development, addressing key questions from the conference. This presentation delves into the purpose and value of innovation in teacher education, offering insights into effective strategies for introducing, maintaining, and sustainably embedding self-confrontation in teacher education. The findings contribute to the broader discussion on enhancing the professional development of VET teachers in the evolving landscape of education.

Keywords:	${\bf Video\ self\ confrontation}$	(VSC),	Vocational Education and	Training (VET),	professional
development					

Apprentissage, Didactique, Evaluation, Formation – Aix Marseille Université, Aix Marseille Université
: EA4671 – France

^{*}Speaker

OSOH, solar astronomy instrument as an innovative tool for teacher education

Brice Le Roux * 1, Rachid Zarouf *

¹, Gilles Barouch *

2

Apprentissage, Didactique, Evaluation, Formation – Aix Marseille Université, Aix Marseille Université
 : EA4671 – France
 2 CEA – CEA – France

OSOH est un télescope solaire pédagogique qui sera installé en 2025 à l'OHP (Observatoire de Haute Provence). Son but : rendre accessible aux enseignants, aux élèves et aux étudiants l'observation du Soleil en temps réel et à distance. Cette "webcam "solaire fonctionnera en continu avec des images accessibles à tous.

L'utilisation de l'astronomie à des buts éducatifs n'est pas nouvelle. Science ludique et fascinante, l'émerveillement qu'elle suscite renforce la motivation et la curiosité des étudiants. Interdisciplinaire, elle fait le lien entre des notions de base de l'enseignement scientifique et technologique. Le Soleil, siège d'une grande variété de phénomènes, est approprié pour aborder plusieurs thèmes fondamentaux.

La sensibilisation aux sciences et au moyen de l'enseigner représente un enjeu particulier. Une étude récente de la Direction de l'Évaluation de la Prospective et de la Performance souligne le manque de familiarité des professeurs des écoles avec la démarche scientifique. OSOH renforcera les démarches déjà mises en œuvre pour donner confiance aux futurs enseignants du premier degré à enseigner la science et la technologie.

La licence MEEF de l'INSPE bénéficiera de cet outil innovant pour susciter l'intérêt pour les matières scientifiques chez les étudiants qui se destinent à devenir enseignant. Au niveau master, les étudiants du Master MEEF pourront utiliser cet équipement dans le cadre du projet qu'ils mènent en deuxième année.

Pour les futurs enseignants du second degré, les activités proposées seront également un tremplin vers la pluridisciplinarité, avec des activités de modélisation mathématiques.

La question se pose alors de la mesure de l'impact d'un tel outil innovant sur la sensibilisation des étudiants, futurs professeurs des écoles, aux sciences et à la démarche scientifique.

Nous proposerons un protocole expérimental basé sur des mesures qualitatives et quantitatives permettant de valider l'apport d'un tel outil dans le cadre de la formation des enseignants.

^{*}Speaker

Keywords: Teacher Education, Science, Physics, Astronomy

Bridging research and policy in the professional development of early stage researchers in the field of teacher education

Vasileios Symeonidis * 1

¹ UNIVERSITY OF EDUCATION FREIBURG – Germany

As a relatively new study area within higher education, teacher education joined the traditional academic and professional areas during the emergence of mass higher education (Zgaga, 2013). Previously, it was mainly located in institutions outside universities which were under direct state control. The gradual 'universitisation' of teacher education was the result of integrating teacher education colleges into universities, raising the qualification standards beyond the undergraduate level, and moving towards research-based teacher education (Alvunger & Wahlström, 2018; Zgaga, 2013, 2017).

Even though research has become an increasingly integral part of teacher education, it has been argued that only a few countries deal proactively with doctoral studies in teacher education or envision teachers' professional career paths to comprise the possibility of third cycle research activities (Iucu & Schratz, 2013). However, the benefits of a research-based approach in teachers' work, the needs of the teacher education discipline itself, and the lifelong learning policy paradigm are strong arguments to proactively develop strategies for doctoral programmes in teacher education. Such programmes have the potential to better link theoretical and practical knowledge in education research across the variety of related disciplines and extend the qualification paths of teachers (Symeonidis & Schratz, 2023).

Against this background, this paper aims to explore the impact of transnational doctoral studies in teacher education, with a focus on promoting 'research-informed policy'. Data are drawn from interviews, surveys and official documents published in the framework of the EU funded 'European Doctorate in Teacher Education' (EDiTE) project. Findings reveal the extent to which such transnational doctoral programmes promote policy relevant research on teacher education, as well as develop policy relevant skills for early stage researchers specialising in the field.

Keywords:	doctoral	education,	early	stage	researcher,	${\bf European}$	teacher,	${\rm teacher}$	education,	trans-
ferable skills										

^{*}Speaker

The Role of Leadership in School Innovation - A Case Study

Joanna Kosowska-Pikos * 1

¹ Cracow Inspectorate of Education – Poland

The Role of Leadership in School Innovation – A Case Study

The aim of this article is to show the challenges of creating a thriving and innovative school environment, its influence on the quality of teaching and learning and its connection to teacher education. The study is to explore how school leadership interacts with innovation. The conclusion concentrates on identified areas of development and possible recommendations. The study was framed by one major research question – What is the role of school leaders in the implementation of innovative approaches? The author has been conducting a small scale research (three state funded schools; September 2023 – June 2024) which findings are to be discussed

and explain how a leader along with the leadership can bring about innovation in a school culture.

Keywords: innovation, leadership, school leadership, school culture

^{*}Speaker

Quality perception in AI-assisted text correction

Christina Egger * 1, Vida Bicman *

2

University of Graz – Austria
 University of Applied Sciences CAMPUS 02 – Austria

The field of teaching is being transformed by generative AI both from the teacher and student perspective. It is imperative for AI-literacy to be taught to students and student teachers in order for them to integrate emerging technologies in classroom practices. The assessment of the quality of AI-assisted text correction is of central importance for future teachers of language. In our experiment we aimed to investigate student teachers' perception of AI-corrected and annotated student texts. In particular we focused on the perception of feedback appropriateness and accuracy.

We aimed to investigate whether the perception of the quality of the correction was affected by student teachers being told that a text was either corrected by an AI-bot or a human teacher. The student teachers were divided into two groups. Both were presented with a corrected and annotated student text. The corrections and comments for both groups were generated by ChatGPT 3.5 and formatted by the researchers. The participants were told to assess the quality of the correction. One group was told that the text correction and comments were generated by AI, the other group was told that the text correction and comments were generated by a human teacher. The researchers collected the student teachers' impressions by means of a questionnaire which included both open and closed questions.

Our experiment showed that at present the students who participated in the experiment were quite skeptical of AI-generated text corrections. Nevertheless, it is an important area for future research as it can be assumed that AI-supported teaching and correcting will become increasingly important in the future.

Keywords: ChatGPT, AI, assisted correction, writing assessment, ELT

^{*}Speaker

Addressing Societal and Environmental Challenges through Transformative Pedagogy in Higher Education

Hugo Paris * 1,2, Caroline Ladage *

³, Nicolas Freud ¹, Fatma Said-Touhami *

1,2

¹ INSA Lyon – Institut National des Sciences Appliquées (INSA) - Lyon – France
 ² Apprentissage, Didactique, Evaluation, Formation – Aix Marseille Université, Aix Marseille Université
 : EA4671 – France

We are presenting a doctoral research with a dual focus: on the one hand, a research into the challenges facing higher education programs in terms of supporting societal and ecological transitions. On the other hand, the professionalization of those involved in higher education in terms of integrating these challenges into their institutions and curricula.

At a time when social and ecological issues are becoming increasingly pressing for society as a whole, higher education institutions are gradually incorporating them as a fully-fledged aspect in the training of their students, beyond specialized courses. It is in this context that the Institut National des Sciences Appliquées de Lyon (INSA Lyon) has initiated a transformation of all its engineering courses to address these issues. How can such a transformation be implemented? How can teachers question and address socio-ecological issues and incorporate them into their curricula?

The research approach is based on an intervention research project involving a series of inquiries carried out in collaboration with stakeholders at INSA Lyon, serving as the research field. The researcher's position is central in a context where he assumes the role of a pedagogical advisor, aiming to improve the understanding of how didactic systems work and to actively participate in their transformation.

This contribution aims to describe how a training module was created, co-developed, and tested with the teams of teachers. The elements analyzed include the teachers' design and problematisation practices, as well as the transpositive processes at work (both disciplinary and with reference to identifiable social practices). The results highlight the content selection criteria used by the participants as well as the collective dynamics of negotiation within the teams of teachers, based on their reciprocal disciplinary and professional cultures.

Keywords:	Higher	education,	Pedagogical	innovation,	Socio,	ecological l	Issues,	Training	for	Engi
neers										

 $^{^3}$ Aix-Marseille Université, ADEF UR 4671 – Aix-Marseille Université, ADEF UR 4671 – France

^{*}Speaker

Education for sustainable development in a distance learning context: an example of a didactic contextualization involving the integration of various micro levels

Lamprini Chartofylaka * 1, Thomas Forissier, Antoine Delcroix

 1 Contextes, Recherches et Ressources en Éducation et Formation (CRREF, UR63) - Universit'e des Antilles <math display="inline">- - Guadeloupe

In this presentation, we discuss insights from a didactic initiative within the (anonyme) project, engaging primary school teachers and students in the French West Indies. The project focuses on sustainable development, utilizing the clash of contexts in two distinct territories to enrich learners' understanding of a specific scientific topic. By integrating teaching within the socio-cultural references of the territories, the goal is to empower individuals to "know oneself better to act better" (xxx, 2015). The pedagogical scenario centers on the Socially Acute Question (xxx, 2006): "How is water made available for all uses?". Sub-questions guide students in collaborative field exploration, sharing findings with peers through synchronous and asynchronous communication methods. Through interviews with participating teachers from Guadeloupe and Saint-Barthelemy, we explore their motivations and practices in incorporating context into sustainable development education, specifically addressing the "water" subject. Thematic analysis reveals the connection of theoretical and practical elements in considering students' external context, enhancing teaching practices related to environmental and ecological issues. The qualitative analysis highlights the didactic contextualization's outcomes, including cultivating environmental awareness, introducing ecological principles through contextual examples, and developing cross-disciplinary skills and knowledge through education for sustainable development.

Keywords: context, teaching, sustainable education, French West Indies

^{*}Speaker

Fostering meaningful educational innovation: Practices and Challenges of inclusivity in higher education

Elena Ungureanu * 1, Camelia Radulescu *

- ¹, Maria Antonietta Impedovo *
- ², Simona Maria Cotorobai ¹, Brice Le Roux *
 - ³, Irini Apostolou *
 - ⁴, Cecilia Simon *
 - ⁵, Tom Ojwang ⁶

¹ University of Bucharest – Romania
 ² Aix-Marseille university – Aix-Marseille University, Aix Marseille University. – France
 ³ Aix-Marseille University – Aix-Marseille Université - AMU – France
 ⁴ National and Kapodistrian University of Athens – Greece
 ⁵ Autonomous University of Madrid – Spain
 ⁶ Eberhard Karls University of Tübingen – Germany

Our symposium proposal is part of two larger Erasmus+ initiatives, eBelong 1 and eBelong 2, and aims to bring together a series of presentations that collectively explore practices and challenges of inclusive cultures in higher education. The session seeks to unite researchers and practitioners to share insights, foster interdisciplinary dialogue, and highlight recent developments, recognizing inclusivity's vital role in educational innovation. The authors come from the following universities: University of Bucharest, Autonomous University of Madrid, Aix-Marseille University, National and Kapodistrian University of Athens and Eberhard Karls University of Tübingen.

Embedded within the broader framework of the Erasmus+ initiatives, our current focus is on exploring the sense of belonging among academic community members within the context of new university alliances. Our goal is to address the social and emotional needs of both students and academics, including faculty and researchers.

This symposium aims to address challenges such as digital adaptation, fostering student engagement, creating inclusive curriculum designs, contributing significantly to the field of academic inclusive policy-making in higher education by presenting new research, facilitating interdisciplinary solutions, showcasing innovative practices. The symposium will feature 3 presentations, each selected for their relevance and contribution to the theme of inclusivity in higher education. We expect this symposium to generate new ideas, influence academic practices, and lead

^{*}Speaker

to advancements in inclusive education strategies, university governance models, diversity and inclusion policies.

Keywords: Higher education, inclusivity, communities of practices

Author Index

Abi Younes, Mélanie, 26 Albertini, Solenne, 21 Alibi, Imen, 28 Apostolou, Irini, 41 Aspfors, Jessica, 13

Barouch, Gilles, 34
Baugnies, Mercedes, 10
Ben Younes, Rached, 28
Bicman, Vida, 38
Brière, Fabienne, 24, 25, 31
Buleshkaj, Osman, 32

Capozza, VIVIANA, 15 CAROTI, Denis, 9 Charpentier, Philippe, 23 Chartofylaka, Lamprini, 40 Conio, Martine, 21 Cotorobai, Simona Maria, 41 Céci, Jean-François, 12

Delcroix, Antoine, 40 DELSERIEYS, Alice, 10 Dentale, Maria, 15 Di Furia, Marco, 17

Egger, Christina, 38 Eklund, Gunilla, 13 ELAOUMARI, Muriel, 27 Epstein, Muriel, 19 Eschenauer, Sandrine, 8

Fantinelli, Stefania, 29 Forissier, Thomas, 40 FREUD, Nicolas, 39

Guarini, Piergiorgio, 29

Hache, Caroline, 26, 33 Harmand, Marie-laure, 9 Heiser, Laurent, 12 Henriksson, John, 13

Impedovo, Maria Antonietta, 27, 28, 41

JEGOU, Corinne, 21, 27

Kosowska-Pikos, Joanna, 37

Ladage, Caroline, 39 Le Roux, Brice, 34, 41 LERAY, Morgane, 21

MARI, Emilie, 24 Mastrolia, Alfonsina, 15, 16 Meijer, Paulien, 18 MENDIELA, Eleonore, 25 Murgia, Emiliana, 11

Nicchia, Elisabetta, 11 Noordegraaf, Mirko, 18

Ojwang, Tom, 41

Paalman, Ingrid, 18 Paris, Hugo, 39 Parmigiani, Davide, 11 Peconio, Guendalina, 17 Ponthieu, Guillaume, 24

Radulescu, Camelia, 41 Rezzi, Nathalie, 21 Rodríguez Izquierdo, Rosa Maria, 20 Rossi, Martina, 17

Said-Touhami, Fatma, 39 Sanchez, Lisa, 8 Savino, Francesco Pio, 29 Schmider, Christine, 14 Simon, Cecilia, 41 STOICA, Georgeta, 23 Sulla, Francesco, 17 Symeonidis, Vasileios, 36

Tagnard, Nicolas, 31 THUILIER, Odile, 26 Tortochot, Eric, 33 Toto, Giusi Antonia, 17 TSAO, Raphaele, 8

Ungureanu, Elena, 41

VEJUX, Carole, 25 VERVOORT, Sofie, 33 Vottero, Eric, 21

Zarouf, Rachid, 34

SECOND PART OF THE BOOK OF ABSTRACTS

TABLE

Symposium

- > Fostering meaningful educational innovation: Practices and Challenges of inclusivity in higher education
- > Affectivity in Teaching
- > For living laboratories in education

Presentation

- > Professional development as a strategy to (re)generate teacher job satisfaction
- ➤ Use of practice videos to develop competence among school-based teacher educators: Perceived usefulness and challenges
- > The impact of (virtual) short-term-mobility on the development of students' intercultural skills
- ➤ The Critical Reading Project as an Example of Effective Improvement Actions Enhancing Practicing Teachers' Skills
- > The Potential of Internationalisation to Rethink Teacher Education
- ➤ Innovation In Teacher Training: Using A Digital Framework For Intercultural Professionalization In Teacher Education
- > Proposals for innovations for teacher education on sustainability from a political perspective
- ➤ Transformative Teacher Development: The Outdoor Education Community of Practice of UNI-T Academy
- > Insights into Teacher Competency Assessment: The Open Badge EDU Framework
- ➤ The reflexive ePortfolio: analysis of learning traces according to v an Manen's theory of reflexivity levels
- > Towards a Continuum of Research Competency in Initial Teacher Education
- ➤ The Pedagogy of Sociology for Professional Practice: Key challenges and opportunities within the current policy context
- > Sustainable development of inclusive communities in schools and teacher education
- ➤ Innovation and Research in Preservice Teacher Education: What do the policy texts in Portugal tell us?

Poster

- > Teaching innovation in learning connected environments. Comparative research in four European universities (Italy, Poland, England, Greece)
- > EdViCon project: creating a competence matrix for videoconferencing

Symposium

Symposium

Fostering meaningful educational innovation: Practices and Challenges of inclusivity in higher education

Elena UNGUREANU,
Camelia RADULESCU,
Maria Antonietta IMPEDOVO,
Simona Maria COTOROBAI,
Brice LE ROUX,
Irini APOSTOLOU,
Cecilia SIMON,
Tom OJWANG

Our symposium proposal is part of two larger Erasmus+ initiatives, eBelong 1 and eBelong 2, and aims to bring together a series of presentations that collectively explore practices and challenges of inclusive cultures in higher education. The session seeks to unite researchers and practitioners to share insights, foster interdisciplinary dialogue, and highlight recent developments, recognizing inclusivity's vital role in educational innovation. The authors come from the following universities: University of Bucharest, Autonomous University of Madrid, Aix-Marseille University, National and Kapodistrian University of Athens and Eberhard Karls University of Tübingen. Embedded within the broader framework of the Erasmus+ initiatives, our current focus is on exploring the sense of belonging among academic community members within the context of new university alliances. Our goal is to address the social and emotional needs of both students and academics, including faculty and researchers. This symposium aims to address challenges such as digital adaptation, fostering student engagement, creating inclusive curriculum designs, contributing significantly to the field of academic inclusive policy-making in higher education by presenting new research, facilitating interdisciplinary solutions, showcasing innovative practices. The symposium will feature 3 presentations, each selected for their relevance and contribution to the theme of inclusivity in higher education. We expect this symposium to generate new ideas, influence academic practices, and lead to advancements in inclusive education strategies, university governance models, diversity and inclusion policies.

First paper

1. Sense of Belonging as a Catalyst of Innovation in Higher Education

This paper examines the role of a sense of belonging as a key driver in fostering innovation in higher education, particularly in the context of emergency responses and inclusive practices during the COVID-19 pandemic. Innovation is broadly defined, encompassing technological advancements, pedagogical shifts, and structural changes aimed at enhancing educational outcomes. Inclusivity is central to these innovations, particularly evident in the adaptive strategies adopted during the COVID-19 pandemic (Moreu, Isenberg & Brauer, 2021). The study aims to understand the typologies of support services for university communities, drawing on the concept of Universal Design for Learning (UDL) as a framework for inclusivity (Opitz, Donald & Block, 2006; Clouder et al., 2020; Cumming & Rose, 2022). We seek to explore how these services contribute to creating a sense of belonging and thus, drive innovation in teaching and learning. Adopting a qualitative approach we gathered data from seven European universities, through a questionnaire. The survey, conducted between October and December 2021, focused on identifying key support services provided during the pandemic. This approach aligns with the principles of inclusive examination practices and continuous assessment (Tai et al., 2023; Playfoot, Wilkinson, & Mead, 2023) to gauge their effectiveness in fostering a community and a sense of belonging.

Results indicated that universities offered substantial support in technical assistance and pedagogical training during the pandemic. Notably, services such as mentorship and the creation of practice communities, akin to virtual talking circles (Chacon et al., 2023), were highly valued. Key factors contributing to a sense of belonging included social connections and opportunities for collegial interactions, underlining the importance of relational dimensions in student belonging (Wong, 2023). These findings are discussed within the broader context of inclusive practices in higher education. The study underscores the importance of flexible and accessible digital learning environments, and their role in enhancing student engagement and inclusivity. Additionally, the role of continuous assessment in promoting regular feedback and engagement is examined in relation to fostering a sense of belonging and community among students. This study, rooted in the exploration of a sense of belonging as a catalyst for innovation in higher education, highlights the critical role of inclusivity and adaptability in educational practices. By framing our investigation within the UDL paradigm, we have gained valuable insights into how diverse and inclusive support services can significantly impact the development of a supportive and engaging learning environment. The study highlights how adaptations made during the pandemic can inform ongoing efforts to enhance inclusivity and innovation in teaching and learning, contributing to the development of more resilient and responsive educational systems.

2. Second paper: Redefining Higher Education (HE): Fostering Social and Emotional Engagement in Online Learning Environments

We discuss the need for a new mindset in HE which focuses on social and emotional aspects of the learning experiences universities offer to their students in order to reach academic success, as concluded by several research studies conducted in seven European universities, partners in an Erasmus+ project, carried on between 2021 and 2023, called eBelong: Sense of belonging in online learning environments.

Before looking at the excellence each study programme strives to offer in terms of academic teaching and learning, we believe that we need to consider the learning experiences of the students (their development as an individual, not only as a professional) as part of a community that fosters a sense of belonging (identification of common values, needs, purposes, visions for career/life) (Hoffman, 2003, Peacock & Cowan, 2019)., without forgetting about the academics who contribute to the creation and the maintenance of these communities of learning as facilitators.

We conducted several studies with the purpose of identifying best practices that could improve teaching and learning when using distance or hybrid training, creating the conditions for a social and emotional engagement of students in e-learning environments and creating the tools to develop students' sense of belonging in the context of virtual learning communities (Strayhorn, 2018; Peacock & Cowan, 2019; Zaheer, 2019). A community of practice (CoP) is a set of relationships and ongoing interactions among a group of individuals with common interests. In other words, it is a group of people who meet to discuss a topic of common interest, they learn together and from each other. The focus of this group is shared learning. Additional resources such as research and online tools may enhance that learning and sharing. In connection with the dynamics of the group, there is a solution as effective facilitators/teachers to strengthen the ties between the members of the community and to keep everyone focused on the common goals of the group. They can also promote the mutual trust, respect and support needed to support a CoP. Probst and Borzillo (2008) suggests that weak links between group members may condition the success of a CoP. Although communication will occur electronically in an online CoP, the steps needed to establish goals and activities for the group remain the same. CoP uses various modes of communication: listservs, emails, forums, social groups, conference calls, in-person meetings, and cross-collaboration among the interest areas. A needs mapping was ensured under the form of two surveys, one about modalities to sustain students' wellbeing (Luhmann, 2012) and related innovative pedagogical practices, starting from OECD Guidelines on Measuring Subjective Wellbeing (2013) adapted to COVID19 time and completed with questions about time of isolation, educational attendance and loss of reference persons (Brooks et al., 2020; Hares & Mundy, 2020), and another one survey about dimensions of social risk linked to the interaction with digital environments (Pokhrel & Chhetri, 2021). These include: social exclusion, hyperconnection and loss of social relationships. In addition to the risk dimensions, the research allowed to reflect on the opportunities related to the experience of distance/blended learning, focusing on practices and paths of change able to respond to the social needs and requirements emerged during the pandemic, using rubrics as an evaluation tool (Allen & Tanner, 2006; Andrade, 2007; Panadero & Jonsson, 2013). Evaluation rubrics are to be understood as a specific methodology for competence evaluation (Davidson, 2004). (Mc Tighe & Ferrara, 2021) The rubric consists of a scale of set scores and a list of criteria describing the characteristics of each score on the scale (Mc Tighe & Ferrara, 2021). These were complemented with a recent literature review on online education and evaluations of existing support services. They formed the basis for course curriculum design, digital tools design and training activities proposed and piloted in the other studies run by the partners. We also explored by means of literature review and surveys the way communities of practice contribute and support the sense of belonging. We focused on the sense of belonging as the main feature of a collaborative online community involved in a practical learning and teaching approach in a stressful situation. The social, emotional and affective side of the learning is adding value when addressed with concrete shared solutions. The results of our studies add to the weight of evidence showing that academics play a critical role in students' success and academic support experiences. Our proposed framework redefines teaching practices in the context of online education and the development of new skills, in an effort to generate inclusion. Our approach is to offer recommendations in terms of strategy design and actions that universities need to adopt in order to promote, develop and foster:

Belonging to a community of practice

- Engaging online experiences fostering the sense of belonging
- Inclusion and support for all members of the community (students and academics alike) We believe that this material will manage to facilitate digital readiness, as it draws its roots from various HE contexts in Europe in which new approaches are being implemented, and to influence decision factors to act towards adapting strategies for inclusion and support offered to students and academics alike. It has a high transferability potential as it focuses not on differences among the partner universities with their cultural specifics, but on common needs of target groups (students and academics) facing the challenges of online education.

3. Third Paper: Challenges to Inclusivity

This paper investigates the obstacles to establishing and maintaining an inclusive culture in higher education, aiming to identify ways to shift universities toward a more collaborative and supportive environment. The literature highlights that inclusivity in higher education faces multifaceted challenges across various educational aspects. These challenges include difficulties in online learning environments (Lock & Redmond, 2021; Chacon et al., 2023), support gaps for neurodiverse students in traditional settings (Clouder et al., 2020), and restricted perceptions of student belonging (Gravett and Ajjawi, 2022). Further complexities arise in collaborative governance (Elken, 2023), social biases in internationalization (Van Mol and Perez-Encinas, 2022), the creation of culturally sensitive curricula (Thomas & Quinlan, 2023), ableism in assessments (Nieminen, 2023), and varying staff attitudes towards disabilities (Goodall et al., 2023). These issues highlight the need for balancing diverse community needs with economic, social, and academic priorities (Marginson & Yang, 2023; O'Farrell et al. 2022). This study employs a qualitative methodology, utilizing focus-group interviews with first-year students from various partner universities. Part of a larger mixed-methods research (Creswell & Plano, 2018), it concentrates on challenges faced by these students in experiencing inclusivity. The research questions aim to uncover the specific challenges encountered and students' perceptions of institutional efforts to create an inclusive educational environment: What specific challenges do first-year students face in experiencing inclusivity within their higher education environment? And How do first-year students perceive the efforts and measures taken by their institutions to foster an inclusive and supportive educational culture? As part of our research, we will produce both textual, transcripts of group interviews, in two different research contexts. The data will be analyzed by using a thematic analysis, with the aim to answer our research questions. The themes will represent challenges encountered by the students from the first year in terms of inclusivity.

Symposium

Affectivity in Teaching

Aspasia Dania
Assistant Professor,
Physical Education Teacher Education
School of Physical Education and Sport Science
National & Kapodistrian University of Athens, Greece

email: adania@phed.uoa.g

Designing professional learning environments for supporting collaborative action research and affectivity in teaching. Within teacher education, professional learning spaces are being reconceptualized in relation to their contribution to empower teachers to lead educational change. For this reason, innovative learning environments (ILE) (OECD, 2015) are suggested as spaces that are designed to enhance teacher professional development across micro-level (e.g., grade level and setting), meso-level (e.g., community networks) and macro-level (e.g., educational systems) contexts (Carvalho & Yeoman, 2021). Based on the above, the aim of this study was to explore the relationalities developed within an ILE, that was set up purposefully to empower Physical Education (PE) teachers to work collaboratively in implementing action research projects within their school curriculum. Conducted as part of the Erasmus UNI-T Academy Project, the present study brought together 17 PE teachers and 8 teacher educators from different countries (Greece, France, Italy, Spain) within an ILE that combined an online learning platform, an e-community space and action research projects, conducted and evaluated by each PE teacher separately to promote affectivity in their teaching. During the action research projects, PE teachers were supported by teacher educators in their country and interacted online within the ecommunity space. By deploying a socio-material research approach, we examined the physical (material and digital), conceptual, and social characteristics of the ILE and the way these influenced teacher collaboration and interaction. Results showed that the ILE was used as a space for knowledge transmission, information reception and storage, retrieval of ideas and best practices, as well as for negotiation and dialogue on shared concerns. Overall, both teachers and teacher educators perceived the ILE not only as a context of professional learning but, mainly as a set of conditions and material structures that could enable and/or constrain learning (Hodgson & McConnell, 2019). The above findings are highlighted in the present symposium along with the opportunities inherent in the development of ILEs as socio-material spaces that can promote post-digital professional learning.

Keywords: networked learning, teacher education, innovative pedagogies, teacher change

Online Course: Enhancing Teacher Capacity for Action Research Implementation

María José Álvarez Barrio María del Rio Diéguez Katerina Psegiannaki. mjose.alvarez@uam.es aikaterini.psegiannaki@uam.es

Action research is a qualitative methodology aimed at improving a practice by considering the context and its participants (Kemmis, 1988), which makes it democratic and equitable (Stringer, 1999). It involves cycles of planning, action, observation, and reflection (Hernández-Sampieri, 2018), aimed at adjusting praxis to reality, developing working methods, and generating new theoretical formulations.

We found this approach to be appropriate for developing a program of practices that would facilitate the creation of affectively supportive learning environments, capable of promoting student engagement and motivation, within the project «Affectivity in Teaching: Collective & reflective professional development in Physical Education».

To begin, we designed an online course through the Genially platform, using storytelling and visual thinking techniques, to introduce participating teachers to basic concepts of action research methodology, quality teaching practices, and the concept of affectivity. Thanks to the structured framework of the course, it was possible to have a productive dialogue, which resolved the communication and collaboration difficulties that arose during its preparation and remedied the lack of prior knowledge of the target teachers.

Since action research begins with the analysis of the context, the detection of a problem, and the emergence of questions to guide the action plan (Creswell, 2005), once the course is completed and following its guidelines, participants will be asked to record which areas of difficulty they identify in their own teaching practice. A working meeting will then be convened for a joint analysis. As a result, we hope to be able to reach a consensus on a common problematic nucleus, argue for working strategies, and propose a specific action plan.

Keywords: online education, instructional design, visual thinking, storytelling

Self-confrontation interviewing in collaborative action research: a qualitative approach to identifying traces of teachers' emotional experience

Samantha Costa - Samantha.Costa@ac-aix-marseille.fr - Teacher at Thiers school, Marseille (France)

Olivier Vors - olivier.VORS@univ-amu.fr - Aix-Marseille University, CNRS, ISM, UMR 7287; SFERE-Provence, FED 4238

Maria Impedovo - maria-antonietta.IMPEDOVO@univ-amu.fr - ADEF, Aix-Marseille University

Affective learning can be described as a complex process combining emotions, personal awareness and attitudes to produce hypotheses and understandings of the world. Emotions emerge as affective episodes provoked by a certain stimulus or antecedent (e.g., Pekrun et al., 2018). There is evidence to support the view that teachers' affectivity and emotions can influence student learning, school climate and the overall quality of education. In addition to having a significant influence on the quality of education, a specific learning about emotion in the classroom an impact on the overall well-being and health of teacher and students (Huang et al., 2020).

In the proposed project, the method chosen to access lived affective experiences in PE class is the self-confrontation interview.

This self-confrontation method (Theureau, 2015) uses video to understand the emotional experience of the teacher in the classroom context. The originality of this methodology lies in the use of video to help explain the emotions felt during the lesson. The self-confrontation interview enables us to understand the teachers' activity, and then to offer suggestions for transforming it. It is a semi-directive interview designed to understand the link between emotion, action, perception and mobilised knowledge. These interviews will enable us to understand how the teacher, in the classroom, sets up emotional learning devices, but also he perceives the students' emotions and helps them to identify and regulate them.

Keywords: Self-confrontation interview, video, action-research, teachers' voices

Rubrics in Action Research: a mixed method approach to improving quality in teaching

Alfonsina Mastrolia Sapienza University of Rome alfonsina.mastrolia@uniromal.it

Veronica Lo Presti Ph.D. Methodology in Social and Political science Sapienza University of Rome Dept. of Communication and Social Research Via Salaria 113 (Room n. 202, second floor) 00198 Rome

Tel.: 0039-06-49918327

E-mail: veronica.lopresti@uniroma1.it

Rubrics are often used in the school environment to assess students' tasks, but evaluation rubrics have been recently used also in the context of program evaluation and public policy to convert quantitative and qualitative data to assess the quality or value of a given attribute or its level of performance (Davidson, 2005). Rubrics have been usually adopted as an analysis tool or for the self-assessment of the subjects involved in the evaluation process/for a group evaluation (Cortoni & Lo Presti, 2018; Ametrano, Callaway & Stickel, 2001; Furco, 2003; Kecskes, 2008); however, the involvement of stakeholders could be further strengthened if the ideas that arise and change thanks to the comparison and relationship with others were mediated, and subsequently systematized and analyzed by the researcher / evaluator, as it occurs during focus groups (Cataldi, 2009). For this reason, to evaluate the Affectivity Intervention Program, part of the European project entitled "UNI-T Academy (eUropean clvic Teacher Academy), it has been decided to

use a rubric within an online focus group to detect how and why middle school physical education teachers perceived, thanks to the Program, a change with respect to their level of competence in relation to planning of teaching strategies aimed at promoting affective learning (Kasilingam, Tamalingam, & Chinnavan, 2014). For the construction of the rubric, competences related to learning were therefore taken into account, making also reference to action research strategies as the outcome of the training and experimentation that the teachers undertook. Moreover, the use of the focus group is important since it makes it possible to actively involve teachers in shared reflections related to their lived experience, which helps them find new solutions useful for improving their teaching quality and consequently student learning in an action-research perspective (Cain & Harris, 2013; Darling-Hammond & McLaughlin, 1995; Hodgson, 2013).

Keywords: rubrics, focus groups, action-research

Symposium

For living laboratories in education

Theme 1: Innovation in the theory-practice connection: Typologies, modalities and processes of innovation and their impact on the connection between theory and practice.

Table des matières

and processes of innovation and th	-practice connection: Typologies, modalities eir impact on the connection between Erreur! Signet non défini
Symposium title : For living labora	tories in education Erreur ! Signet non défini.
Signet non défini.	er, Christine Chovelon, Christine Faller Erreur
10 minutes	Erreur! Signet non défini
Patenaude	rah Danis, Stéphane Allaire, LouiseErreur! Signet non définiErreur! Signet non définiErreur! Signet non défini
défini. 15 minutes	Erreur ! Signet non défini
	Erreur! Signet non défini Erreur! Signet non défini
Speaker 5 : Brigitte Trousse	Erreur! Signet non défini Erreur! Signet non défini
	Erreur! Signet non défini Erreur! Signet non défini

Abstract

This symposium will explore Living Labs as open innovation ecosystems in line with the principles of ENoLL (www.openlivinglabs.org), with a particular focus on their impact and application in the field of education, and more specifically in the training of teachers and educational managers. This approach aims to recognize all participants (researchers, trainers, learners, business players) as expert participants actively engaged in research and innovation processes. In education, this networking offers opportunities to cultivate systems thinking (Raynault, 2023), and prompts reflection on coaching processes (Vial, Mencacci, 2007) and the transformation of university teaching practices in INSPEs. The aim of this symposium is to enrich the vision of living labs in education, and to share know-how that will benefit project leaders.

French: Pour des laboratoires vivants en éducation

Ce symposium explorera les laboratoires vivants (ou "Living Labs") en tant qu'écosystèmes d'innovation ouverts conformes aux principes de l'ENoLL (www.openlivinglabs.org), avec une mise en avant particulière sur l'impact et leur application dans le domaine de l'éducation et plus particulièrement la formation des enseignants et des cadres éducatifs. Cette approche vise à reconnaître tous les participants (chercheurs, formateurs, apprenants, acteurs de l'entreprise) en tant qu'experts participants engagés activement dans les processus de recherche et d'innovation. En éducation, cette mise en réseau offre des opportunités pour cultiver l la pensée systémique (Raynault, 2023) et suscite une réflexion sur les processus d'accompagnement (Vial, Mencacci, 2007) et sur la transformation des pratiques pédagogiques universitaires dans les INSPE. Les échanges de ce symposium auront pour objectif d'enrichir la vision des living labs en éducation et de partager des savoir-faire bénéfiques aux porteurs de projets.

Laurent HEISER, Maître de conférences en SEF, UniCA
Christine CHOVELON, Maître de conférences en SEF, UniCA
Christine FALLER, Docteure en histoire, PRAG, UniCA
Brigitte TROUSSE, chercheure Centre Inria d'UniCA et membre du ENoLL council

Speakers 1 (intro): Laurent Heiser, Christine Chovelon, Christine Faller 10 minutes

This paper offers an in-depth analysis of the growing influence of Open Labs on the landscape of innovation and university education. First, we present a state of the art based on a search of double-blind evaluated scientific articles in the ERIC database, highlighting the various components of Labs, the values they promote and the pedagogies they claim to embody. In the second section, we carry out an in-depth theoretical reflection that anchors our understanding of the implications of the open laboratory on models of accompaniment, highlighting the importance of rethinking training strategies in the field of professional development and educational support aimed at fostering an enabling environment for innovation and experiential learning.

Cette communication offre une analyse approfondie de l'influence croissante des Laboratoires Ouverts (Labs) sur le paysage de l'innovation et de la formation universitaire. Dans un premier temps, nous présentons un état de l'art basé sur une recherche d'articles scientifiques evalués en double aveugle, dans la base de données ERIC, mettant en évidence les diverses composantes des Labs, les valeurs qu'ils promeuvent et les pédagogies dont ils se réclament. Dans le deuxième volet, nous menons une réflexion théorique approfondie qui ancre notre compréhension des implications de l'ouverture du laboratoire ouvert sur les modèles d'accompagnement, soulignant l'importance de repenser les stratégies de formation dans le domaine du développement professionnel et du soutien éducatif visant à favoriser un environnement capacitant à l'innovation et à l'apprentissage expérientiel.

Speakers 2 : Audrey Raynault, Sarah Danis, Stéphane Allaire, Louise Patenaude 15 minutes

MIXITÉ 2.0:

Un laboratoire vivant concernant les usages du numérique à des fins de communication et de collaboration entre les parents et l'école

A "laboratoire vivant" for the use of digital in parent-school communication and collaboration.

The literature on the use of digital tools to facilitate school-family communication and collaboration points out that institutional platforms in Quebec schools enable information sharing,

but do less to promote interaction between students, their parents, teachers and other school stakeholders (Asdih, 2012; Aguilar and Francis, 2014; Saracosti et al., 2019). However, recent data tells us that schools would use non-institutional digital platforms to exchange about young people's learning path with their parents (Bachman et al., 2021). This raises issues of data protection and the multiplication of platforms. This research project, which takes the form of a hybrid living laboratory, is interested in studying the sustainable integration of a digital communication tool that facilitates interactions between students, their parents, teachers and caregivers. Sustainable digital integration promotes a systemic (Fiévez, 2016) and sociocritical (Collin, 2023) posture concerned with forms of digital prudence at all levels (Céci and Heiser, 2023). This communication presents preliminary results from a MIXITÉ 2.0 collaborative research project encouraging the active participation of members from a school community (5 schools) on the subject of affordances (Allaire, 2006; Moreno and Mayer, 2007) to support multidirectional interactions between students and those who support them.

Les écrits sur l'usage d'outils numérique facilitant la communication et la collaboration écolefamille signalent que les plateformes institutionnelles des milieux scolaires au Québec permettent le partage d'informations, mais peu favorisent les interactions entre les élèves, leurs parents, leurs enseignant-e-s et les autres personnes intervenantes de l'école (Asdih, 2012; Aguilar et Francis, 2014; Saracosti et coll., 2019). Cependant, des données récentes nous indiquent que les écoles utiliseraient des plateformes numériques non institutionnelles pour échanger sur le cheminement des apprentissages des jeunes avec leurs parents (Bachman et coll., 2021). Des enjeux concernant la protection des données et la multiplication des plateformes sont alors soulevés. Ce projet de recherche prenant la forme d'un laboratoire vivant hybride s'intéresse à l'étude de l'intégration durable d'un outil numérique de communication facilitant les interactions concernant cedit cheminement entre les élèves, leurs parents, leurs enseignant-e-s et leurs intervenant-e-s. L'intégration durable du numérique promouvoit une posture systémique (Fiévez, 2016) et sociocritique (Collin, 2023) se souciant des formes de prudences numériques à tous les niveaux (Céci et Heiser, 2023). Cette communication présente des résultats préliminaires d'une recherche collaborative MIXITÉ 2.0 encourageant la participation active des personnes d'une communauté scolaire (5 écoles) au sujet des affordances (Allaire, 2006; Moreno et Mayer, 2007) essentielles soutenant les interactions pluridirectionnelles entre les élèves et les personnes qui les accompagnent.

Speaker 3 : Pauline Escande Gauquié et Audrey Bonjour 15 minutes

Communication de Pauline Escande Gauquié, Délégation de recherche au CLEMI, CELSA Avec la participation au projet Pauline Escande Gauquié, IMSIC, AMU

CLEMI, a key player in innovation and teacher training. The example of the FRAMER project, media and sustainability at school

As part of the FRAMER project, the aim of which is to draw up an inventory of relations between the French and the sea, based on a series of maps relating to the global issue of people's relationships with the coast, we will be presenting one of the areas we have been working on, that of "schoolchildren and the sea". Teachers are in direct daily contact with schoolchildren. CLEMI (Centre pour l'Éducation aux médias et à l'information, a service of the Réseau Canopé de l'Éducation National), as the operator of teacher training and educational staff of the French Ministry of Education and Youth, is a key partner in this ambition. It acts as an intermediary between the worlds of schools, the media and research. Its missions position it as a veritable educational hub (Heiser et al., 2022), i.e. a device combining a "set of networked digital tools and structures offering an interface forming a virtual crossroads with the aim of encouraging and possibly organizing the potential for dialogue and encounters between people" (Gobert, 2009, p. 5). The FRAMER project aims to lay the foundations of a living lab as an open innovation ecosystem for educational and cultural mediation on the ecological issues of the sea and coasts. It questions how teachers can train students and instill in them, over and above knowledge, an awareness of these contemporary issues. To this end, a qualitative survey lasting several months will be carried out among schoolchildren (middle-school students) via CLEMI coordinators in the regions, and teachers in a number of public establishments. CLEMI coordinators are key relays, present throughout the country to set up training plans, mobilize teams of teachers, and support training in the various academies. This academic network is of the utmost importance, but remains too little used and too little known. We present the first results of the survey, which should provide data to reinforce existing actions and training plans in each academy that is carrying out information education projects. In addition, the aim of these surveys is to provide food for thought for CLEMI Sup, which is an offshoot of CLEMI, linking teachers, EMI trainers, teacherresearchers, the media world and associations through the organization of shared scientific events and a new journal, in a collaborative approach between the various players involved in EMI. In this respect, CLEMI Sup resembles a living laboratory (Livings Labs), as its aim is to federate and animate a network in France and internationally in a forward-looking and innovative approach. The creation of resources and applications in conjunction with ed-techs, teachers and teacher-researchers is also one of the project's aims, with a focus on the themes of media skills assessment, digital citizenship and the information literacy of pupils and students (Escande Gauquié, 2022; Escande Gauquié, Naivin, 2019).

Le CLEMI, un acteur clé pour l'innovation et la formation des enseignants. L'exemple du projet FRAMER, médias et durabilité à l'école

Dans le cadre du projet FRAMER qui a pour objectif d'établir un état des lieux des relations entre les Français et la mer, autour d'une série de cartographies se rattachant à la problématique globale des rapports des populations au littoral, nous présenterons un des axes travaillés celui "des scolaires et la mer". Le corps enseignant est en contact quotidien et direct avec les publics scolaires. Le CLEMI (Centre pour l'Éducation aux médias et à l'information, service du Réseau Canopé de l'Éducation National), en tant qu'opérateur de la formation des enseignants et des personnels éducatifs du ministère de l'Éducation nationale et de la Jeunesse, devient dans cette ambition un partenaire clé. Il est en effet l'intermédiaire entre le monde de l'école, celui des médias et le milieu de la recherche. Ses missions le positionne en véritable hub éducatif (Heiser et al., 2022), c'est à dire un dispositif combinant un « ensemble d'outils et de structures numériques connectés en réseau proposant une interface formant un carrefour virtuel dans le but de favoriser et éventuellement organiser des potentialités de dialogues et de rencontres entre

personnes » (Gobert, 2009, p. 5). Le projet FRAMER a pour ambition de poser les premières briques d'un living lab en tant qu'écosystème d'innovation ouvert autour de médiations pédagogiques et culturelles sur les problématiques écologiques de la mer et des littoraux. Il questionne comment le corps enseignant peut former des élèves et leur inculquer, au-delà d'un savoir, une sensibilisation autour de ces enjeux contemporains. Pour se faire, une enquête qualitative de plusieurs mois sera menée auprès des publics scolaires (collégiens) par l'intermédiaire des coordinateurs et coordinatrices relais du CLEMI auprès des régions, et des enseignants et enseignantes dans quelques établissements publics. Les coordinateurs du CLEMI sont des relais clés présents sur tout le territoire pour monter des plans de formation, mobiliser des équipes d'enseignants, pour soutenir la formation dans les différentes académies. Ce réseau académique est de la première importance mais il reste trop peu exploité et connu. Nous présentons les premiers résultats de l'enquête qui devrait permettre de fournir des données afin de renforcer les actions existantes et les plans de formation dans chaque académie qui portent des projets d'éducation à l'information. Par ailleurs, l'objectif de ces enquêtes est de nourrir les réflexions au sein du CLEMI Sup qui est une émanation du CLEMI qui assure la liaison entre les enseignants, les formateurs en EMI, les enseignants-chercheurs, les mondes des médias et associatif à travers l'organisation d'événements scientifiques partagés et une nouvelle revue, dans une logique collaborative entre les différents acteurs engagés en EMI. Le CLEMI Sup s'apparente en cela à un laboratoire vivant (Livings Labs) car l'objectif est de fédérer et animer un réseau en France et à l'international dans une démarche prospective et innovante. La création de ressources et d'applications en lien avec les ed-techs, les enseignants et les enseignants-chercheurs est aussi une des visées du projet avec un focus sur les thèmes de l'évaluation des compétences médiatiques, de la citoyenneté numérique et la culture informationnelle des élèves et étudiants (Escande Gauquié, 2022; Escande Gauquié, Naivin, 2019).

Courte bibliographie

Durampart, M., Reboul, P. Bonjour A., Gobert, T., Bonfils, P., Ben Amor, S. (2023)., Continuité pédagogique : la question des ressources numériques éducatives à domicile (dans un ancrage territorial et délimité). Chapitre d'ouvrage sur la continuité pédagogique en temps de confinement Covid, l'Harmattan.

Escande-Gauquié, P. « La chronique numérique, objet de fiction hybride ». Actes du XXII SFSIC, 2022. (hal-04127444).

Escande-Gauquié, P., Naivin B. (2019). Comprendre la culture numérique. Dunod, « Hors collection ».

Gobert, T. (2009). De l'espace mémoire à l'espace et la mémoire, évolution des formes de présence médiées par les outils numériques, Ludovia : Espaces et mémoires, Ax-les-Thermes, 24-28 août 2009, http://culture.numerique.free.fr/index.php/espace-de-publication/115

Heiser, L., Bonjour, A., Faller, C., Mouren, D. (2022). Le dispositif CurriQvidéo : un outil permettant de penser un hub éducatif tourné vers les compétences du 21e siècle dans la formation des professeurs des écoles. L'exemple de la valorisation du patrimoine naturel et culturel en enseignement moral et civique. Médiations et médiatisations (11), Presses de l'Université TELUQ, Canada.

Speaker 4: Thierry Gobert

15 minutes

Communication de Thierry Gobert, laboratoire CRESEM, associé IMSIC

The purpose of this paper is to approach living labs by mobilizing an insight through social hubs. While living labs are understood as "living laboratories [...], open environments for full-scale innovation [...] involving users throughout the creative processes (Janin & all., 2013: 5), hubs would be physical or/and dematerialized places of convergence and influence, constituting a "digital or/and physical info-communication device that offers actors the opportunity to meet, pool resources, share practices and activities while managing the identities associated with these activities" (Gobert, 2020: 9). A priori, the distinction would therefore be based on an appetite for innovation, strongly rooted in the performative aim of living labs and likely to serve as a differentiator with hubs.

Is this so? If places of learning have become educational hubs (Gobert, 2022: 15), they are not without the capacity to support innovation. By bringing together socioconstructivist and experiential impulses, they propose an analysis of the sociality of collective action underlying the dynamics of a living lab. This is why we propose first of all to better define the characteristics of these spaces, before evoking sustainable innovation as an identity anchor for the trainer and the group. This anchoring is supported by illusions of self-institutionalization, which will be based on a study carried out in a bioengineering curriculum, in which half the learners will officially become transmitters of knowledge, skills and "ecoresponsible" practices in parks and nature reserves or design offices.

Anchored in information and communication sciences in an educational field (Papi, 2013: 184), this paper highlights the value of summoning human and social sciences to scientific populations perceiving sustainability understood as a vector for pedagogical innovation.

Cette communication a pour objet d'aborder les living labs en mobilisant une aperception par les hubs sociaux. Alors que les living labs sont compris comme des « laboratoires vivants [...], des environnements ouverts d'innovation en grandeur réelle [...] impliquant les utilisateurs tout au long des processus de création (Janin & all., 2013 : 5), les hubs seraient des lieux de convergence et de rayonnement physiques ou/et dématérialisés, constituant un « dispositif infocommunicationnel numérique ou/et physique qui propose aux acteurs de se rencontrer, de regrouper des moyens, de mutualiser des pratiques et des activités tout en gérant les identités associées à ces activités » (Gobert, 2020 : 9). A priori, la distinction porterait donc sur l'appétence pour l'innovation, fortement ancrée dans la visée performative des living labs et susceptible de servir de différenciateur avec les hubs.

Est-ce si certain ? Si les lieux d'apprentissage sont devenus des hubs éducatifs (Gobert, 2022 : 15), ils ne sont pas exempts de capacités à soutenir l'innovation. En rapprochant velléités socioconstructivistes et expérientielles, ils proposent une analyse de la socialité de l'agir collectif sous-jacent aux dynamiques d'un living lab. C'est pourquoi nous proposons dans un premier temps de mieux cerner les caractéristiques de ces espaces avant d'évoquer l'innovation durable comme un ancrage identitaire du formateur et du groupe. Cet ancrage est porté par des illusions d'institutionnalisation de soi qui seront assises sur une étude réalisée en cursus de génie biologique dont la moitié des apprenants deviendront officiellement des passeurs de savoirs, de compétences et de pratiques « écoresponsables » dans des parcs et réserves naturelles ou des bureaux d'étude.

Ancrée en sciences de l'information et de la communication sur un terrain éducatif (Papi, 2013 : 184), cette communication souligne l'intérêt de convoquer les sciences humaines et sociales auprès de populations scientifiques percevant la durabilité comprise comme un vecteur d'innovation pédagogique.

Courte bibliographie

Papi C. (2013), « De la pertinence de l'étude des TICE par les SHS », Communication et organisation, n° 43, DOI : 10.4000/communicationorganisation.4209

Janin C., Pecqueur B., Besson R. (2013), Les Living Labs : Définitions, enjeux, comparaisons et premiers retours d'expériences. PACTE. halshs-01726215

Gobert T. (Dir. 2020), « Hubs sociaux et espaces de partage, d'échange, de participation, de contributions », Interfaces numériques, vol. 8, n° 2/2020, t. 2. https://www.unilim.fr/interfaces-numeriques/4350

Gobert T. (Dir. 2022), « Les lieux d'apprentissage sont-ils devenus des hubs éducatifs ? », Médiation & médiatisations, Teluq, Québec, n°11, novembre 2022, https://doi.org/10.52358/mm.vi11

Speaker 5: Brigitte Trousse

15 minutes

Open Innovation 2.0, Living Labs and « Labs » in Education

Abstract

Living Labs, as promoted by ENoLL (European Network of Living Labs), represent an open innovation 2.0 tools that gained more and more popularity within various sectors—ranging from Sustainable Development, Agriculture, and Agri-food to Education, among others. The ENoLL General Assembly in Manchester (2015) established a unified vision: « Empowering everyone to innovate ». The pivotal question remains: how does one achieve this vision? Living Labs, in their quest to "democratize innovation" (inspired by Von Hippel), find themselves amidst an evolving landscape of labs—embracing fablabs, citizen labs, city labs, creative labs, idea labs, edulabs, learning labs, open labs, hubs ... These diverse entities signify emerging movements, networks, and organizations within the sphere of innovation.

Initially, this talk introduces the concept of open innovation 2.0 and give various definitions of Living Labs. Each implementation embodies common principles. We articulate this concept through three dimensions and identify key performance indicators (KPIs) linked to macro, mezzo, and micro levels, crucial for assessing the maturity of a Living Lab.

Subsequently, we focus on the fundamental characteristics of a living lab process, as manifested within a specific LL project. To exemplify this, we offer a practical illustration.

Then, we examine the application of the Living Lab concept in Education. This discussion encompasses some examples of Living Labs and other « labs »such as fablabs, hubs, and learning labs. We highlight specific attributes unique to a Living Lab in Education and propose multi-level recommendations for effecting sustainable shifts in practices.

Innovation ouverte 2.0, Laboratoire vivants et « Labs » en Education

Résumé

Les Living Labs, promus par ENoLL (Réseau européen des Living Labs), représentent des outils d'innovation ouverte 2.0 qui gagnent de plus en plus en popularité dans divers secteurs, allant du Développement Durable à l'Agriculture et l'Agroalimentaire, en passant par l'éducation, entre autres. L'Assemblée générale d'ENoLL à Manchester (2015) a établi une vision unifiée : « Donner à chacun la capacité d'innover ». La question clé demeure : comment atteindre cette vision ? Les Living Labs, dans leur quête pour « démocratiser l'innovation » (inspirés de Von Hippel), se retrouvent au milieu d'un paysage évolutif de laboratoires incluant les fablabs, les citoyen labs, les city labs, les creative labs, les idea labs, les edulabs, les learning labs, les open labs, les hubs ... Ces entités diverses représentent des mouvements émergents, des réseaux et des organisations dans le domaine de l'innovation.

Dans un premier temps, nous introduisons le concept d'innovation ouverte 2.0 et présentons différentes définitions des Living Labs . Néanmoins chaque mise en œuvre d'un LL incarne des principes communs. Nous présentons ce concept de Living Lab à travers trois dimensions et identifions des indicateurs clés de performance (KPI) liés aux niveaux macro, méso et micro, cruciaux pour évaluer la maturité d'un Living Lab.

Ensuite, nous décrivons les caractéristiques principales d'un process en mode Living Lab, telles qu'elles se manifestent dans un projet spécifique. Pour illustrer cela, nous décrivons un exemple concret mené avec des citoyens.

Puis, nous examinons l'application du concept de Living Lab en Education. Cette discussion englobe quelques exemples de Living Labs et de « labs » tels que les fablabs, les hubs et les learning labs. Nous mettons en lumière des attributs spécifiques propres à un Living Lab dans le domaine de l'Education et proposons des recommandations à plusieurs niveaux pour effectuer des changements durables dans les pratiques.

Discussant: Jean-François Céci

20 minutes

Symposium

"Care or courage? Effective strategies for sustainable innovations within teacher education?"

Proposed format: 90 minutes Round Table (Posing an open question, after a short introduction, aiming to create an open academic dialogue stimulating exchange of thoughts and experiences and to draw conclusions in terms of possible recommendations and further questions. The discussion is facilitated by two facilitators/convenors. Possible structure is a small round table with an audience or multiple parallel round tables. This depends on the lay out of the room and the number of participants).

Facilitators/convenors:

Marco Snoek, Amsterdam University of Applied Sciences, m.snoek@hva.nl
Ingrid Paalman-Dijkenga, VIAA University of Applied Sciences, i.paalman@viaa.nl
Martin Vos, Fontys University of Applied Sciences, m.vos@fontys.nl
André Koffeman, Amsterdam University of Applied Sciences, a.h.koffeman@hva.nl

Abstract

Changes within society, schools and the education system call for teacher education institutions to keep updating and innovating their curricula. However, changing curricula in such a way that the changes are sustained over time and widened to other contexts and programmes is often problematic and hardly monitored. As a result many innovations stay limited to a small number of supporters or erode over time.

Therefore it is not only important to discuss and study necessary changes in the content of curricula, but also to discuss the processes and strategies which are used and to study their effectiveness for sustainable change within (initial) teacher education programmes.

Inspired by a Dutch 4-year research study on innovations within teacher education curricula (https://velon.nl/onderzoek-naar-vernieuwend-opleiden/), we wish to explore key questions regarding the possible processes and strategies of innovation within teacher education by using a round table approach.

The round table includes a short introduction on the issue of effective innovation strategies for teacher education and a short overview of key questions that came up in the Dutch study on innovations in teacher education. These key questions provide the structure of a round table discussion where participants are invited to share their thoughts and experiences, looking for common elements and experiences and exploring the role of national policy contexts in stimulating or hindering innovations in teacher education programmes. Aim of the discussion is to identify recommendations for teacher education institutes and policy makers, and questions that need further exploration.

When participants agree, the discussions will be recorded and treated as a focus group discussion, so they can be used as data. The discussion will be concluded by exploring the possibilities for a Horizon application on innovation strategies for teacher education.

Presentation

Professional development as a strategy to (re)generate teacher job satisfaction.

Dr André Koffeman

Amsterdam University of Applied Sciences

a.h.koffeman@hva.nl

What is the purpose and value of innovation in teacher education? When we think about this question, we tend to focus on teaching quality, and subsequently on the added value for learners. In this paper we focus on another purpose: on what it can bring the teacher. Growing work pressure, unrealistically high expectations, decreasing social status of the profession, and the increasing complexity of the profession can cause teachers to leave the profession prematurely. However, opportunities for development and professional growth might revive their energy and inspiration. In Amsterdam, the project Kleurrijk Beroep ("Colourful Profession") was initiated. In this collaboration between the Municipality, local school councils and teacher training institutes, various courses were developed, specifically aimed at teacher retention. The premise of the project is that if teachers experience the opportunity to develop their profession, it leads to more job satisfaction, and as a result to retention. This research project seeks to closer investigate the 'should I stay or should I go' balance, by looking at the factors that influence this balance. To this end, three instruments were used. To investigate the impact of the various courses, teachers (n=51) who participated were surveyed in a retrospective pretest/posttest. To further research the presumed connection between professional development and work satisfaction, open questions were added to the questionnaire to elicit statements that could shed light on the mechanisms. To also investigate the long-term effect of the courses and the mechanisms which they were based on, a focus group was organized a year after the project. The results are promising: the evidence suggests that if certain conditions are met, indeed there is a positive (but somewhat complex) correlation between professional development and job satisfaction. These findings can be used to further inform strategies to develop teacher professional learning that leads to retention.

Use of practice videos to develop competence among school-based teacher educators: Perceived usefulness and challenges

Prof. Eli Lejonberg, University of Oslo

This study describes the purpose and value of innovation in teacher education by investigating the use of technology to enhance reflection on school-based teacher educator practices. The use of technology to film, share and analyse practice videos in line with General Data Protection Regulation was adopted in the mandatory work for school-based teacher educators undertaking mentor education. The study uses The Technology Acceptance Model (TAM) as the point of departure (Marangunić & Granić, 2015). Variables such as users' perceived ease of use and usefulness of technology were established as essential antecedents of actors' intentions to use technology and their usage behaviour. The current technology based design consists of several integrated elements such as peer collaboration, theory use and paper writing. Data were gathered from 56 teachers in mentor education (96% response rate). The informants responded to a qualitative, open-ended survey. The data were the object of a thematic analysis inspired by TAM, focusing on how perceptions related to experiences, job relevance, output quality and result demonstrability have the potential to constrain and enhance the perceived usefulness of technology. The theory of practice architectures (TPA) was used to illuminate how the innovation of technology and design for the use of practice videos can be understood as arrangements for practice and thus provide frames for school-based teacher educators' professional development (Mahon, Kemmis, Francisco, & Lloyd, 2017). The presented findings show how technologybased designs provide discursive, material and social arrangements for professional development. Perceived job relevance and peer collaboration are highlighted as drivers of perceived technology usefulness. In light of the results, effective ways to support innovation in teacher education are discussed. The contribution illuminate potential challenges, such as aspects related to theory use and volunteerism. Implications for technology and design for the use of practice videos in education are highlighted.

The impact of (virtual) short-term-mobility on the development of students' intercultural skills

Nina DASOUQI, Germany

As the diversity of the student body increases, institutions in teacher education focus on internationalisation as an important strategy for preparing students to a global working environment (Robson, 2011). Ludwigsburg University of Education (LUE) launched a project called "INVITE - International Networking for Improved Teacher Education" fostering intercultural and digital skills among students and teaching staff. It supports the implementation of "Internationalisation at Home" (I@H) at LUE (Nilsson, 2003). In this article, we will put the focus on the development of intercultual skills through short-term (virtual) mobility (Iucu et al., 2022). In order to answer the research question to what extent short-term mobility contributes to intercultural learning, we conduct qualitative interviews with students participating in (virtual) short-term-mobility before and after their (virtual) stay abroad. This methodology builds upon previous research on short-term mobility (Pilonieta et al., 2017) so that findings can be contextualised. Participating students emphasize that this experience helps them reflect on their own perspective. These formats give students the possibility to discover additional educational systems. Online material makes group work easier, especially over different time zones. Our study is a long-term study designed to assess (virtual) short-term mobility progammes, so limitations can occur regarding the comparison of different student cohorts over time. But this gives us a long-term trend on successful measures that could be implemented in a teacher training curriculum catered to the needs of a European Teacher Education in line with the European Language Policy (European Commission, 2022). Working with international students, opens up new perspectives for them and helps seeing themselves as European teachers rather than only as part of their national teacher education. Students improved their language, reflection and intercultural skills. If this kind of format is accompanied by didactics highlighting the improvement of intercultural skills, it is even more beneficial.

Keywords: Internationalisation@Home, intercultural skills, short-term-mobility

The Critical Reading Project as an Example of Effective Improvement Actions Enhancing Practicing Teachers' Skills

Kinga BIAŁEK, Poland

k.bialek@szkolaedukacji.pl

The article explores the "Critical Reading" project as a paradigmatic teacher training initiative in the literacy education domain. This project embodies an innovative approach that harmonizes Paulo Freire's critical pedagogy, the structured principles of classical critical literacy, and the tenets of constructivism. The introduction of a new paradigm in educational curriculum design poses a formidable challenge for educators. The efficacy of this shift hinges upon the readiness of teachers entrusted with implementing these changes in their classrooms. Consequently, the project was meticulously devised with a dual focus: serving as both a training program for tool utilization and an initiative to elevate the quality of engaged teachers' work. The intricacies inherent in education resist simplistic research perspectives. While scientific rigor demands precise and all-encompassing solutions, the diverse nature of educational material often eludes such straightforward resolution. To navigate this challenge, a research-implementation strategy based on the lesson study method has been adopted. This strategy aims to empower educators by using a lesson study as a catalyst for professional growth. Ultimately, it aspires to cultivate a cohort of educators proficient in nurturing critical thinking, fostering social awareness, and facilitating transformative learning experiences among students. Within this framework, educators will encounter a tangible manifestation of this approach through the "Critical Reading" project. The presentation of this project seeks to demonstrate the practical application of the research-implementation procedure. Serving as a case study, it illustrates the way of implementing the innovation in literacy teaching using the lesson study method within an educational setting.

Research Questions:

- 1. What challenges do educators face when implementing a paradigm shift in educational curriculum design, and how does the project address these challenges?
- 2. In what ways does lesson study serve as an effective vehicle for professional development and the integration of critical pedagogy in literacy education practices?

Keywords: critical literacy, lesson study, innovation in education

The Potential of Internationalisation to Rethink Teacher Education

Manuela HACKEL, Germany

mhackel@uni-potsdam.de

In teacher education, we are currently faced with the task of covering an increasing number of new areas of competences and topics without losing sight of the "traditional" mission. But how is this possible without overburdening the existing system? The answer cannot lie in adding moremore content and requirements in already full curricula, more extracurricular qualification programmes often overburdening students, lecturers and teachers. Rather, what is needed is a new, integrated way of thinking about teacher education that does credit to the complexity of its mission. This article argues that the field of internationalisation has the potential to link current and traditional areas of competences and topics and to establish a contemporary teacher education that is able to cope with changing requirements.

Specifically, it will be shown how three pillars that are essential for teacher education today can work together under the umbrella of a consistently understood internationalisation of teacher education:

- theory-practice transfer,
- imparting key competences in the areas of language-sensitive teaching, digitalisation as well as media education, and dealing with (cultural) heterogeneity and diversity,
- implementing global topics such as sustainability in accordance with the 17 UN goals.

After an explanation of the basic concepts, concrete international practical examples are presented and reflected upon: a project week on sustainability topics, a service-learning offer in the area of language education and promotion and a mentoring programme. These examples will be used to illustrate how the new requirements can be fruitfully implemented into the traditional structures and programmes of teacher training through a wide variety of creative approaches. Furthermore, the additional opportunities and potentials that lie in innovative projects of this kind will be demonstrated.

The experiences gained from these projects will serve as an occasion to discuss the conditions for a successful, resource-friendly and sustainable implementation of these or similar measures. In addition to the question of necessary educational and higher education policy settings, the importance of cooperation between universities and schools will also be emphasised. All considerations in this article also take into account the current discourse on the internationalisation of teacher training and the current situation at German universities

Keywords: internationalization of teacher education ; theory-practice transfer ; sustainable development goals

Innovation In Teacher Training: Using A Digital Framework For Intercultural Professionalization In Teacher Education

Peter Grüttner (peter.gruettner@zlb.uni-halle.de)

Elena Reichelt (olena.reichelt@zlb.uni-halle.de)

Norman Sträßer (norman.straesser@zlb.uni-halle.de)

at the Center For Teacher Education of Martin-Luther-University Halle-Wittenberg

Intercultural professionalization is a key element in teacher education at Martin-Luther-University Halle-Wittenberg (MLU). One path to increase future teachers' cultural competence is international mobility for field experiences, teaching practice and study abroad stays. Recent studies highlight the importance of mentoring and assistance for teacher education students during the various stages of international mobility. The LAIK-certification course at MLU was developed by the DAAD pilot project as a teacher education training program that combines digitalization, teacher students' mobility and a training for intercultural awareness. It is designed to provide guidance, mentoring and support to students going abroad. The individual parts of LAIK (German: Lehramt interkulturell, English: Cross-cultural Teacher Education) aim at preparation, documentation, self-assessment and self-reflection.

In the center of *LAIK* is the newly developed, open-source-based e-portfolio platform which facilitates different facets of social learning and the flexible use of various media. It gives students the opportunity to receive guidance and feedback through all phases of mobility by our team, mentors, didactic researchers and other teacher trainers. Also, it allows for exchange with other outgoing students (peers) by jointly working on shared portfolio content (give feedback, co-work on tasks). The portfolio itself stimulates self-reflection and combines pedagogical, didactical and intercultural perspectives. Different templates allow for tailoring portfolios to the needs of the teacher students and their various forms of mobility. Additionally, portfolios can be exported/saved outside of the platform. Using LAIK students can include more digital elements. The LAIK framework is open. For their achievements and personal development each *LAIK*-alumni receives a certificate. Once the framework is expanded, more courses and trainings can be included and listed on the certificate at the end. The first internal research (content analysis of students' portfolios) indicates the professional development (core areas: teaching practice, subject knowledge, general pedagogy) and personality growth (beneficial advancement for the Big Five personality traits) through LAIK.

Keywords: Intercultural professionalization, Digital guidance and support, Online-portfolios, International mobility

For example the 2023 BintHo-study by the DAAD, see https://static.daad.de/media/daad_de/pdfs_nicht_barrierefrei/der-daad/analysen-studien/2023 arbeitspapier bintho lehramt fin.pdf

Proposals for innovations for teacher education on sustainability from a political perspective

Alain Legardez, Inspe Université d'Aix-Marseille, Unités de recherche ADEF et SFERE-Provence, RéUniFEDD. <u>alain.legardez@univ-amu.fr</u>

Didier Mulnet, Inspe Université de Clermont Auvergne, Laboratoire ACTE, RéUniFEDD. didier.mulnet@uca.fr

With the objective of innovations in teacher training systems, we propose a theoretical positioning capable of supporting a research-action-training system in education for sustainable development and the Sustainable Development Goals, adapted to the socially acute questions (SAQ) related to transitions and sustainability in the Anthropocene.

We will specify these objectives and positions as well as the methods used in our FECODD (Formation, Education, Compétences, Objectifs Développement Durable) program of the RéUniFEDD (Réseau universitaire pour la formation et l'éducation à un développement durable)¹. We are part of a transformative-critical perspective of political education (in the sense of the management of the city) for strong sustainability and education (with the aim not only of adaptation, but above all of transformation) and a sober and just transition.

And we will present two examples of systems that cross several prisms: the transdisciplinary "education to", the "SD meta-skills" approach, the transitions, the Anthropocene, etc. and which aim to support trainers and teachers in the construction of their didactic and pedagogical strategies:

- "Scenario sheet on the example of environmental protection (SDGs 13, 14 and 15) » which has given rise to experiments in teacher training;
- Tool for collaborative work on the "Sustainable Development Pedagogical Goals (SDGs)", with the exemple of the SDG 15 "Life on land", with a view to proposing curricula adapted to training contexts.

The FECODD program is currently being developed in the French-speaking world in the form of partnerships with universities and associative networks. This collaborative process of research-action-training is presented and discussed in the series of meetings and colloquiums "Training for the world of tomorrow", organized by RéUniFEDD.

Keywords: sustainability, teacher training, sustainable development goals, research-action-training

¹ https://reunifedd

Transformative Teacher Development: The Outdoor Education Community of Practice of UNI-T Academy

Émiliane RUBAT DU MÉRAC

emiliane.rubatdumerac@uniroma1.it

Luisa Vianello

luisa.vianello@uniroma1.it

Sapienza University, Italy

Our presentation delves into the Outdoor Education Community of Practice (CoP), emphasizing sustainability and innovation within the UNI-T "European Civic Teacher Academy" project.

A data collection through pre-session questionnaires tailored subsequent training to address specific needs identified by European teachers. The three-part CoP workshop series unfolds in the following sequence: an online session for preparation and needs assessment, a transformative face-to-face 3-day workshop in Rome, and a purposefully designed third online meeting. During the first session, teachers collaboratively addressed challenges derived from pre-session questionnaires, focusing on inadequate space and collaborative transdisciplinary pathway building.

The Rome workshop immersed teachers in outdoor education strategies, fostering transformative changes in their perspectives and practices. The subsequent online meeting reinforces continuity, community building, and professional empowerment, all aligned with the initiative's objectives. It strengthens networks among education professionals, facilitating resource sharing and collaborative problem-solving.

Throughout this CoP initiative, a repository of professional situations, solutions, and theoretical resources is systematically cataloged online, offering valuable insights for teachers facing specific challenges in outdoor education.

Data from questionnaires and reports from participants and session moderators will be used to highlight the characteristics of the learning experience, its effectiveness, and encountered difficulties.

This comprehensive overview of the Outdoor Education CoP training underscores its data-driven, experiential, and community-centric approach to transformative teacher development.

Acknowledging the specific objectives of each workshop session, this work contributes to the ongoing discourse on fostering innovation and sustainability in teacher education.

Insights into Teacher Competency Assessment: The Open Badge EDU Framework

Emiliane Rubat du Mérac

emiliane.rubatdumerac@uniroma1.it

Maria Chiara Gallotta

Astrid Favella.

Sapienza University, Italy

The Open Badge EDU (OBE) project may present a significant advancement in teacher education, reshaping assessment paradigms and establishing a dynamic link between theory and practice for future educators. OBE serves as a digital attestation, encapsulating knowledge, skills, and a holistic understanding of "knowing how to do" and "knowing how to be," enriched with metadata for authentication and detailing accomplishments. Derived from literature, badges prove instrumental in assessing and accrediting prior learning and diverse competencies, fostering continuous professional development. Their open and shareable nature contributes to community knowledge-sharing dynamics, empowering students to showcase experiences digitally. The project adopts a forward-thinking approach, integrating formal, informal, and professional learning to enhance the quality of future educators. Acknowledging the pivotal role of arts, craftsmanship, and embodiment, the project defines fifteen competence profiles, encouraging diverse interpretations of reality and perspective shifts. Central to the OBE project is the tripartite assessment process, compelling students to demonstrate technical skills, apply them authentically, and develop pedagogical-didactic projects. The three assessment stages - technical examination, written unit, and practical implementation - serve as developmental milestones, fostering competence and self-awareness. Our presentation focuses on a specific aspect: the introduction of a comprehensive model featuring three distinct tests (technical, design, and practical) for the EDU badge. Emphasizing the evaluation and self-assessment of transversal skills, particularly in the practical test, an observation grid with a five-step scale assesses planning, organization, time management, communication, and interactions. Twenty-four indicators provide a nuanced evaluation, complemented by five additional indicators in the written test. Through this process, the project advocates for a redefinition of assessment paradigms.

The reflexive ePortfolio: analysis of learning traces according to v an Manen's theory of reflexivity levels

Darine BOUTELDJA ADEF, Aix-Marseille Université Darine.BOUTELDJA@etu.univ-amu.fr

Nicolas SEMBEL ADEF, Aix-Marseille Université

Ismail BADACHE LIS, Aix-Marseille Université

At the National Higher Institute of Professorship and Education of Aix Marseille University, a pilot component in digital technology of a Frensh university of excellence, since the 201 9 20 20 academic year, students of Master 2 MEEF Professions of T eaching, E ducation and T raining and future professional intellectuals carry out their teaching and education project during the S3 and S4 semesters respectively using a digital refle x ive device, the ePortfolio: "efoliAM" set up to promote a refle x ive posture and develop collaborative learning, essential factors for the professional development of future teachers. The ePortfolio makes it possible for student s to script the deposit, manage and share different types of traces of a given activity, the transition to reflexivity depends on the skill in scripting one's professional development by selecting the data coming from one's activity (Sembel, 2020). Although the students positively evaluated the fact that the use of the "efoliAM" ePortfolio contributes to strengthening their autonomy and their critical thinking, criteria synonymous with reflexivity (Bouteldja et al., 2022), we wonder about the refle x ive posture adopted by these students in the ePortfolios. We conducted a qualitative analysis of the comments (N=131) from the semester S3 of the 2020 2021 promotion based on the theory of levels of reflexivity developed by M. van Manen (van Manen, 1977). Here are these levels of reflexivity: 1. Description, 2. Structuration, 3. Theorization, 4. Problematization. The results obtained allowed us to conclude on the following facts: • More than half of the comments fall between reflexivity levels 1 and 2. • Only 19% of comments are reflexivity level • Despite an equal distribution of comments between the two sexes, more than two thirds of. Despite an equal distribution of comments between the two sexes, more than two thirds of comments from women are between levels 1 and 2 while more than two thirds of comments comments from women are between levels 1 and 2 while more than two thirds of comments from men are between levels of reflexivity 3 and 4.from men are between levels of reflexivity 3 and 4.

Keyword: reflexivity, ePortfolio, learning traces, digital education

Towards a Continuum of Research Competency in Initial Teacher Education

Amie Brennan (Irland)

Aimie.Brennan@mie.ie

Member of the TEPE Network Board Dean of Education: Policy, Practice and Society Marino Institute of Education

This paper presents a framework that plots a range of research competencies on a continuum of teacher research preparation, from; research literacy, research engagement, applied research, and research dissemination. The framework presented in this paper, bridges ITE policy and standards with scholarship on undergraduate research (Healy and Jenkins 2009; Griffiths, 2004), final year projects (Mateo et al, 2010) and European quality assurance frameworks in Higher Education (OECD 2018) to ensure that there is appropriate impact on teacher professional learning post-ITE. The framework presented in this paper, draws on a qualitative review of research-based accreditation standards for ITE internationally to identify variations in research-based teacher education (TC, 2020; DfE 2019) in Ireland, UK, Scandinavia. This is particularly relevant when addressing the question of How is policy promoting and questioning teacher education innovation? It also draws on two empirical research studies - one on student teacher research competency (with 80 students) and one on student teachers' engagement in research dissemination (with 30 students) (Brennan, 2019). The combination of findings has informed the development of a holistic model of research competence that will be presented. Furthermore, there are significant challenges associated with providing adequate research preparation within ITE, these challenges will be identified and the paper will argue for a consistent approach to research competence that is required to support student, and teacher's professional learning. This paper seeks to present a consistent and sustainable approach to research preparation in ITE; and a model that will support a research active profession.

The Pedagogy of Sociology for Professional Practice: Key challenges and opportunities within the current policy context

Angela Canny angela.canny@mic.ul.ie

Aimie Brennan Aimie.Brennan@mie.ie

Member of the TEPE Network Board
Dean of Education: Policy, Practice and Society
Marino Institute of Education

This paper builds upon recent research (Brennan & Canny, 2022; Brennan & Canny, 2023), providing continuity and depth to the exploration of the historical position of foundation disciplines and student-teachers' engagement with Sociology of Education in Initial Teacher Education (ITE) programmes in Ireland and abroad.

Specifically, this paper investigates three key themes—current policy landscape, student-teachers' perspectives, and transdisciplinary integration—providing a structured and comprehensive exploration of the marginalisation of foundation disciplines within ITE (TC 2020). The critical reflection on transdisciplinary integration, emphasising the need for meaningful integration of knowledge and cautioning against tokenistic linkages, contributes to the broader discourse on how theory and practice can be effectively integrated in ITE programmes. In an effort to increase the paper's utility for practitioners, we also provide some explicit examples of how teacher educators can practically implement such integration.

Drawing on interviews with recently qualified ITE graduates, we explore the degree to which practising teachers bring their sociological education in ITE into their own practice; and how they think about and embed sociological issues such as equity, inclusion, diversity and inequality into their day-to-day practice as teachers. Based on empirical data, we also question ITE programme design and the sustainability of the integration between theory and practice in ITE programmes. Consequently, This research fits within Agenda 2030 SDG 4 goal of ensuring inclusive and equitable quality education and promoting lifelong learning opportunities for all.

Sustainable development of inclusive communities in schools and teacher education

Marco Snoek, Amsterdam University of Applied Sciences, m.snoek@hva.nl

André Koffeman, Amsterdam University op Applied Sciences, A.H.Koffeman@hva.nl

Schools and teacher education institutions can be considered as communities in which different actors contribute. For communities to thrive, it is important that all actors feel recognized, valued and connected. An important condition is that all actors are given a voice.

For schools and teacher education institutions to be considered as inclusive communities, all actors must have a voice: pupils/students, teachers, school leaders, local authorities, parents, other actors in the vicinity of the school, ..., regardless of background, position or status. This requires that schools and teacher education institutions create room for students' voice, create partnerships with parents and the wider local community, and create a culture of shared leadership.

Inclusiveness – not only in terms of teaching and learning pupils, but also in terms of school organisation, structure and culture – is one of the key areas that challenges teacher education and schools to innovate by taking deliberate steps towards sustainable improvement.

To support schools in this, a toolbox is being developed, based on theories for sustainable change. This toolbox will contain several elements:

- A conceptual framework to support the development of a shared language
- Inspirational vignettes of inclusive communities in school contexts in different countries
- A tool for self-assessment of the inclusiveness of the community
- Suggestions for steps for improvement

Each of these elements are supported by guidelines.

Although the main focus of the toolbox is on schools, the toolbox might also be relevant for teacher education institutions in two ways: as a tool for student teachers (focusing on inclusive communities in school) and as a tool for teacher educators (focusing on inclusive communities within the teacher education institute)

The toolbox is being developed as part of an ERASMUS+project by representatives from 7 countries(Canada, Estonia, Finland, Liechtenstein, the Netherlands, Romania, Switzerland).

In the presentation we will present the underlying concepts and ideas, the outline of the tool. Additionally we aim to discuss the possibilities to use the toolbox within the context of teacher education.

Innovation and Research in Preservice Teacher Education: What do the policy texts in Portugal tell us?

Maria Assunção Flores

University of Minho, Portugal

Innovation and research have been identified as two key features in preservice teacher education development. However, different trends and understandings have been discussed in existing literature. Innovation can be seen at both institutional and practice levels but it is also important to consider its role with regard to policy development. Similarly, research has been identified as a key component in preservice teacher education curriculum. Such a view is based on the idea of the teacher as a professional who reflects and makes informed decisions about his/her practice. In this paper, the development of policies in preservice teacher education in Portugal will be analysed focusing in particular on the issues of innovation and research. Such an analysis includes the policy texts issued after the implementation of the Bologna process, in 2007, in 2014 and, more recently, in 2023. While there is a need for a high qualification to become a teacher in Portugal (Master level), a move towards a more technicist perspective has been prevalent focusing on the what and how to teach. However, as preservice teacher education is situated at the second cycle level (Master degree), the research component was tacitly assumed by institutions and encouraged by external assessments. The research dimension was explicitly identified as a compulsory component of the preservice teacher education curriculum in the Decree-Law published in 2007, but it was abolished in the legislative texts published in 2014 and in 2023. Some innovative features, particularly the inquiry-based approach during practicum, have been advocated and implemented, but there is room for improvement. These and other aspects will be discussed further in the paper.

Keywords: Preservice teacher education; policy; innovation; legislative text

POSTER

EdViCon project: creating a competence matrix for videoconferencing

Samantha Mercier

mercier.samantha@outlook.fr

Valeria Campillo

Maria Impedovo

Aix Marseille University

This study examines the professional development of teachers in the context of videoconferencing in higher education. Through a collaborative approach, we developed a skills matrix aimed at assessing the technical and pedagogical competencies required for effective use of videoconferencing in higher education. In partnership with several international institutions as part of the Erasmus+ EdViCon program, our research focuses on creating a self-assessment tool that enables teachers to become aware of their skills and training needs. We employed a mixedmethods methodology, including a literature review to select frameworks and theories upon which to base the design of the matrix, a questionnaire-based data collection from teacher-researchers to highlight the essential technopedagogical skills necessary for teaching via video conferencing developed by teachers, and finally, validation through semi-structured interviews with teachers, as well as technical and pedagogical experts. This study is part of an iterative co-construction process aimed at refining the matrix to make it relevant and usable for all. This research contributes to filling a gap in the literature by providing concrete recommendations for designing training programs tailored to the needs of teachers in videoconferencing. By providing a selfassessment tool and identifying essential skills for videoconferencing teaching, this study aims to improve the quality of distance education and support the professional development of teachers in a technologically advanced context.

Keyword: Erasmus+ EdViCon, self-assessment tool, mixed-methods methodology

Teaching innovation in learning connected environments. Comparative research in four European universities (Italy, Poland, England, Greece)

Maria DENTALE

PhD in Metodologia delle Scienze Sociali Dipartimento di Comunicazione e Ricerca Sociale (Coris) Università di Roma "Sapienza"

maria.dentale@uniroma1.it

The digitization of educational processes, imparted by the Covid-19 pandemic, has raised a issues and critical nodes about which the higher education system has been debating all along.

Raising standards of teacher quality directed to innovate teaching methods and techniques. In fact, the use of student-centered pedagogical practices is in line with the requirement to provide training in soft skills, which are considered indispensable to entering fully into the knowledge society. Secondly, the adaptation of the university environment to the thrusts - endogenous and exogenous - resulting from the introduction of ICT into university relationship systems.

Within this premise are the goals of the ADVICE (Erasmus+)/Advancing digital competence in Higher Education project, which involved a network of four European universities: University of Rome Sapienza; Collegium Civitas Polnska; University of Northampton; Agricultural University of Athens. The project raised reflection around methodological innovation implemented in the learning connected environments, typical of blended learning.

Considering the specificities of the governance of the four university contexts, the research included a qualitative analysis of strategies and practices related to educational innovation policies started in the 2021-2022 biennium. Specifically, the research units of the four partner universities involved: a) innovative teaching managers of the University and 2) Higher Education Teachers, expert in the field of digital communication, digital innovation, evaluation of digital policy. The semi-structured interviews were aimed to explore the following thematic areas: *i.* digital infrastructure of classrooms and spaces where blended teaching is delivered; *ii.* training opportunities provided by university governance to reduce the gap in technical and relational skills within learning connected environments; *iii.* teaching and relational strategies used by teachers.

The results allow the enhancement of practices and core experiences considered central to the development of *evaluative recommendations* to be provided to stakeholders and decision makers involved in the European higher education system.

Keywords: evaluative recommendations; teaching innovation; connected learning environments; blended learning.

Author Index

Elena UNGUREANU

Camelia RADULESCU

Brice LE ROUX

Simona Maria COTOROBAI

Irini APOSTOLOU
Cecilia SIMON
Tom OJWANG
Aspasia Dania
María José Álvarez Barrio
María del Rio Diéguez
Katerina Psegiannaki
Samantha Costa
Olivier Vors
Maria Impedovo
Alfonsina Mastrolia
Veronica Lo Presti
Laurent HEISER
Christine CHOVELON
Christine FALLER
Brigitte TROUSSE
André Koffeman
E. Lejonberg
Nina DASOUQI
Kinga BIAŁEK
Manuela HACKEL
Peter Grüttner

Norman Sträßer
Alain Legardez
Didier Mulnet
Émiliane RUBAT DU MÉRAC
Maria Chiara Gallotta
Astrid Favella
Maria DENTALE
Darine BOUTELDJA
Nicolas SEMBEL
Ismail BADACHE
Aimie Brennan
Angela Canny
Marco Snoek
André Koffeman
Maria Assunção Flores
Samantha MERCIER
Valeria Campillo
Laurent Heiser
Christine Chovelon
Christine Faller
Audrey Raynault
Sarah Danis
Stéphane Allaire
Louise Patenaude
Pauline Escande Gauquié
Audrey Bonjour

Elena Reichelt

Thierry Gobert

Brigitte Trousse

Jean-François Céci