

FINAL IMPACT ASSESSMENT REPORT ON POLICY LEARNING LAB AND STRATEGY UPGRADE & BOOST

D.T1.1.1 - FINAL IMPACT ASSESSMENT REPORT ON POLICY

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LEARNING LAB AND STRATEGY UPGRADE & BOOST

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Document Control

Document Summary			
Project Number	CE1662		
Project Title	CEUP 2030		
Work Package/Activity	A.T1.4 - WPT1 Impact Controlling for a practicable and sustainable Strategy & Policy Relevance		
Deliverable	D.T1.4.3 - Final Impact Assessment Report on Policy Learning Lab and Strategy Upgrade & Boost		
Deliverable Responsible (i applicable)	PP8 / PTP		
Deliverable Reviewer (I applicable)	- -		
Deliverable Due Date	May 2021		

Dissemination Level			
PU	Public		
PP	Restricted to other programme participants		
RE	Restricted to a group specified by the consortium		
СО	Confidential, only for members of the consortium	СО	

Docur	Document History				
Date	Version	Issuer	Description of Changes		
	0.1	PTP, MC	First draft		
	1.0	PTP, MC, Partners	Final		





1. EXECUTIVE SUMMARY

1.1. Project Overview

CEUP 2030 aims to generate stable innovation networks which foster better understanding on Central Europe Advanced Manufacturing and Industry 4.0 ("CAMI4.0") topics, to generate improved knowledge resource exchange on these technologies leading to an upgraded framework for policy-making and implementation.

Ultimately CEUP 2030 creates and tests a common method to promote improved knowledge dissemination to policy-making stakeholders using a collaborative exchange framework based in physical and digital-methods. These methods and the technology show-cases disseminated within these method structures are harvested from existing, high-quality innovation know-how in the CE area.

The project focuses on:

- Identifying the highest-quality innovation know-how in the CE Area, on the CAMI4.0 Topics.
- Enhancing skills capabilities and knowledge of people in charge of local, regional, and (trans)national RTI Policies, associated to the CAMI4.0 Topics.
- Creating a sustainable structure for awareness-raising and shared-sustainable RTI knowledge resource use to enhance policy decision support.
 Anticipating and fast-tracking policy / strategy policy pilot actions to promote a joint RIS3 for CAMI4.0 Excellence in CE/EU.

1.2. Main Project Results

The main results of the projects are the 6 outputs contributing to the result indicator by setting up a stable network for trend monitoring on CAMI4.0 topics as well as the RIS3 Round Tables both fostering innovation in a regional and transnational context. For immediate cooperative innovation learning, the Policy Learning Labs & the Tech Radars/PID fit to the indictor. For a mid-term and long-term anchoring, the Strategy & Boost and





the Policy Framework for 2021-2027 also contributes. The expected change at the territorial level will be noticeable by aligning structures & processes for a stable, future robust tech & innovation policy implementation lasting beyond project's end by integrating consequently stakeholders across Europe for strengthening CE. CEUP 2030 improves the situation of target groups through a deep-dive integration in both working group structure (TIN, RIS RT) & in the cooperative learning of the PLLs. In general, the project assures sustainability of outputs/results during project duration by the number of involved top level stakeholders & proven quality of PPs and their ASPs. After project's end there will be an agreed capitalization agenda & a long-term validity stated in the Policy Framework 2021-2027 (political) and the subsequent action plan (financial). PLLs, TINs & RIS3 RTs will stay as network organizations from the triplehelix stakeholders (institutional). The outputs/results of CEUP 2030 can & will be transferred to additional target audiences/territories during project lifetime anyway (e.g. TIN/PID/PLL on 5 conferences, using 3 EU Presidencies, working groups from DGs, Vanguard, EFFRA, etc.). Also, beyond CEUP 2030 it is planned and will be agreed to foster a strong transfer scheme (Policy Framework 2021-2027)

1.3. Work Package Overview

The overall objective of WPT1 links to the project's specific objective of enhancing skills, capabilities and knowledge of people in charge of local, regional and (trans)national Research, Technology and Innovation policies within the triple-helix context.

The challenge manifests in two sub-objectives which are:

- (1) To train and empower people to work in the environment of new technologies (strategically and operatively) regarding policy-relevant decisions
- (2) To pool a critical mass of trained stakeholders to generate sufficient power for policy-making and appropriate selection, adaption and fine-tuning of already proven tools, instruments and methodologies.

This leads to some very practical activities:

- the appropriate selection, adaption and fine-tuning of proven tools, instruments and methodologies, aka "Harvesting" - during A.T1.1
- The appropriate definition of the four technology topics for Central Europe Advanced Manufacturing & Industry 4.0 (CAMI4.0) - during A.T1.1
- The generation of a structure (the Policy Learning Lab) where stakeholders get acquainted with new technologies and their applications, so as to give them better context for future decisions- during A.T1.2





- The implementation of the PLL where complex technologies are explained in a practicable, understandable and time-optimized way - this should be mutual, triple-helix learning (policy, research and business) with on-site demonstration, i.e. live demos inside factories; learning connected with virtual & augmented reality, etc. - during A.T1.2
- The generation of a common strategy, based on previous work of Partners, to set a vision for the four CAMI4.0 topics - during A.T1.3
- The generation of a common Action Plan, based on the previous work of Partners & PLL engagement, to set a critical path for the four CAMI4.0 topics during A.T1.3
- The generation & implementation of a framework to gain 360-degree feedback from stakeholders on the methodology of collective exchange during PLL aka "Impact Controlling" - during A.T1.4

1.4. Impact Controlling System Overview

Impact Controlling System is a cross cutting activity where partners work together to determine a methodology and associated tools to monitor and measure the impact that the project has made on meeting its objectives. The developed methodology is a combination of qualitative and quantitative attributes which will be assessed across the lifecycle of the project.

Qualitative attributes are a series of questions that can be asked to a chosen group of Peer Reviewers, across the project's development; whilst quantitative attributes are based on project numerical indicators that are associated to connecting with Target Groups generally and meeting content-relevant deliverables on a work package by work package basis.

The methodology is accompanied by an in IT based tool, in the form of a group-accessible Excel sheet, which can be used to track and update information from Partners and their Peer Reviewers about the impact of the project on reaching its desired goals.

1.5. Impact Controlling Results & Discussion Overview

The qualitative and quantitative review of the activities in Work Package One have shown that impact has been made and the CEUP 2030 has the potential to generate connections of potential cooperation between Central Europe triple-helix actors.

A qualitative review indicated that it might be good to involve more people from business and companies to concrete practical use cases for different





sectors (like implementation/usage of CAMI4.0 topics in automotive, health...). This could also be addressed by visual representations of solutions in Industry 4.0. PLL participants also expressed a desire to gain insight into what was happening on the remaining PLLs and it would be valuable to meet other policy stakeholders. As a consequence of unpredicted COVID-19 disease situation (e.g. spread and effects), not all PPs were able to organize physical meetings with policymakers, so some PLLs were conducted through virtual workshops. It was important that the online PLLs were implemented upon criteria in the documents:

- WPT1 Guidelines
- DT.1.2.1 Guidance on Policy Learning Lab ecosystem for CE/EU cooperation on CAMI4.0
- DT.1.2.2 Report on Policy Learning Labs in Practice 1: Enhance & Expand the CAMI4.0 stakeholder trainings
- DT.1.2.3 Report on Policy Learning Labs in Practice 2: Valorize & Enrich & the CAMI4.0 stakeholder trainings
- Design of an implementation-oriented Strategy Upgrade & Boost supported by an Action Plan
- DT.1.4.1 Coaching guidance on impact controlling for the involved CAMI4.0 stakeholders
- D.C.1.1 Communication Strategy & Plan Overall.





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2. INTRODUCTION

The purpose of this report is to summarize the last two project partners peer review interviews and present a quantitative analysis of the impact of the working group on improving the skills, capacity and knowledge of people responsible for local, regional and (national) RTI policies in the context of the triple helix

In this report it can be found an overview of the methodology and partner contributions that have occurred to complete Deliverable D.T1.4.3. The deliverable is part of activity A.T1.4 "WPT1 Impact Controlling for Practicable and Sustainable Strategy & Policy Relevance" which ran from 2020.11 to 2021.02.

It is a cross-cutting activity during where Partners:

- identified peer reviewers among target groups & stakeholders replicating quadruple helix scheme (ALL);
- defined and shared distributed contribution & assessment procedures for deliverables
- defined impact controlling system for Practicable and Sustainable Strategy & Policy Relevance
- delivered inputs for a cooperation tool for distributed assessment and impact controlling among partners / peers.

2.1. Background and Aims

Impact Assessment can help us design and implement better policies, plans, programs and projects that will face up to important challenges like example new technological opportunities. It provides a series of gateways (timely review periods), where Partners and the stakeholder network who were targets of the project, can assess whether the project has or is successfully meeting its intended goals. This means that the methodology is inherently tied to the overarching project's aims, and the intended goals of the project's core outputs.





2.2. Project Aim

CEUP 2030 aims to generate stable innovation networks which foster better understanding on Central Europe Advanced Manufacturing and Industry 4.0 ("CAMI4.0") topics, to generate improved knowledge resource exchange on these technologies leading to an upgraded framework for policy-making and implementation.

Ultimately CEUP 2030 creates and tests a common method to promote improved knowledge dissemination to policy-making stakeholders using a collaborative exchange framework based in physical and digital-methods. These methods and the technology show-cases disseminated within these method structures are harvested from existing, high-quality innovation know-how in the CE area.

The project focuses on:

- Identifying the highest-quality innovation know-how in the CE Area, on the CAMI4.0 Topics.
- Enhancing skills capabilities and knowledge of people in charge of local, regional, and (trans)national RTI Policies, associated to the CAMI4.0 Topics.
- Creating a sustainable structure for awareness-raising and shared-sustainable RTI knowledge resource use to enhance policy decision support.
- Anticipating and fast-tracking policy / strategy policy pilot actions to promote a joint RIS3 for CAMI4.0 Excellence in CE/EU.

2.3. Deliverables in WPT1 Impact Controlling

In WPT 1 Impact Controlling (AT1.4) there are deliverables:

Deliverables: WPT1 Impact Controlling (02.2020)				
 Coaching Guidance on 	Design of WPT1 impact controlling system, linked to global impact controlling scheme			
Impact Controlling for the Involved CAMI4.0	Includes guidance on engaging Peer Reviewers (3/PP), process and timeline for engagement in WPT1, qualitative and quantitative indicators which will be compared.			
Stakeholders (PTP) [04.2020]	1 IT-based handbook on all the above points, including interview consolidation templates.			





2. Ir	nterim
Impact	•
Assessi	ment
Report	on
Policy	
Learnii	ng Lab
and St	rategy
Upgrac	de &
Boost	(PTP)
[09.20]	20]

Specific feedback from a select Peer Reviewer (1 interview/PP), on an analysis and update recommendations for second PLL in practice and first insights on the strategic vision for CAMI4.0 Excellence.

One contribution from each PP (1 Sub-Report/PP) based on PP's qualitative and quantitative data from first stakeholder interview.

1 consolidated report, which brings all PP reports together, and draws common conclusions.

3. Final Impact
Assessment
Report on Policy
Learning Lab and Strategy
Upgrade & Boost (PTP)
[02.2021]

Interviews (2 interviews/PP - with different 2 Peer Reviewers), on the impact of WP1 (PLL specifically) at enhancing skills, capabilities and knowledge of people in charge of local, regional & transnational RTI policies, in a triple-helix context.

One contribution from each PP (1 Sub-Report/PP) based on PPs qualitative and quantitative date from second and third stakeholder interview.

1 consolidated report, which brings all PPs report together, and draws common conclusion over the success of the engagement model presented in WPT1.

2.4. Definitions

2.4.1. What is impact controlling?

Impact controlling, or more commonly known as impact monitoring, is a system and or a set of procedures which can be used to measure whether a project or task has reached its intended goal, or is on track to reaching its





goal. It can be succinctly defined as a continuous process of collecting data on specified indicators.¹

2.4.2. What is a Peer Reviewer?

Peer Review is defined as "a process of subjecting an author's scholarly work, research or ideas to the scrutiny of others who are experts in the same field"²

A Peer Reviewer is a term which has emerged from academic/scientific writing, which refers to an individual or organization whose goal is to assess the validity, quality and often the originality of an article (or a concept in an article). This term can be similarly assessed in the project world, where an individual or organization will be assessing the validity and quality of the project's goals and provide qualitative feedback on the group's ability to achieve the goals with the project's outputs.

2.4.3. What is Policy Learning Lab

The PLL are a two-part training program for policy-makers. Their goal is to enhance the capacities (skills, knowledge, capabilities...) of CAMI4.0 stakeholders and to enable adequate mind-sets for improving innovation and mutual learning within CEUP 2030. Participating stakeholders should get acquainted with new technologies and their applications in order to have a better context for future decisions.

Complex technologies are explained in a practicable, understandable and timeoptimized way during the PLL - this should be mutual, triple-helix learning (policy, research and business) with on-site demonstration, e.g. through live demos inside factories, learning connected with virtual & augmented reality, etc.

The PLL are established to train and empower people to work on policies & strategies for CAMI4.0 technologies (mutual Triple-Helix Learning). The PLL foster & anchor a policy training scheme where comprehensive learning processes are designed to be felt and understood quickly. Complex systems and

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¹ "What is Impact?" in the Danish Demining Group's "An introduction to Impact Monitoring" available at: http://danishdemininggroup.dk/media/1220258/im-manual-2012-web.pdf

² What Is Peer Review?" (2014). Int J Comput Appl. Web. Retrieved July 02, 2014, from http://www.iicaon-line.org/peer-review [Google Scholar] [Ref list]





technologies are made clear and understandable to target groups. The PLL are used for sharing information and are a platform for knowledge exchange regarding current developments and approaches towards challenges regarding the CAMI4.0 technologies. The involved stakeholders set the base for strong CE/EU policy making in WPT2 & WPT3.

The workshop's focus should be on empowering policy-relevant stakeholders with knowledge resources on the CAMI4.0 Topics through triple-helix-learning. The physical workshops manifest as interactive sessions where the participants can really "feel" the opportunities which the CAMI4.0 technologies could bring to the region.

There are essentially three different types of PLL through the different stages of CEUP 2030:

- First round of PLL: The first round of PLL establishes the connection of policy makers and stakeholders of CEUP 2030. Trust levels are low and there is little knowledge of the project among them. Therefore, the goal of the first round of PLL is to build trust and knowledge. Stakeholders should also get acquainted with a common nomenclature, feedback the workshop structure and recommend other stakeholders to be involved in the regional Trend and Innovation Networks (TINs). Furthermore, technology use cases should provide interesting, understandable insight on the potential of CAMI 4.0 technologies for the region of the PP.
- Second round of PLL (regional): The second round of PLL should build on the first round, create a dialogue on regional or national policy support (RIS3 alignment) and discuss the dissemination of technology good practices.
- Second round of PLL (transnational): The transnational PLL are part of the second round and should create a dialogue on transnational policy support across Central Europe. It should focus on the benefits of international collaboration and include a discussion on the dissemination of technology good practices as well.

2.4.4. Impact Controlling System Overview

Impact Controlling System is a cross cutting activity where partners work together to determine a methodology and associated tools to monitor and measure the impact that the project has made on meeting its objectives. The developed methodology is a combination of qualitative and quantitative attributes which will be assessed across the lifecycle of the project.

Qualitative attributes are a series of questions that can be asked to a chosen group of Peer Reviewers, across the project's development; whilst quantitative attributes are based on project numerical indicators that are associated to connecting with Target Groups generally and meeting content-relevant deliverables on a work package by work package basis.





The methodology is accompanied by an in IT based tool, in the form of a group-accessible Excel sheet, which can be used to track and update information from Partners and their Peer Reviewers about the impact of the project on reaching its desired goals.

The questions were asked in a way that touched on the project outputs of WPT1 within a wider contextual discussion:

"Does CEUP 2030 generate stable innovation networks, foster a better understanding & generates improved knowledge & exchange on new technologies relevant for Central Europe Advanced Manufacturing & Industry 4.0 (CAMI4.0)? Does it foster the exploitation & upstreaming of available outputs/results, leading to an upgraded framework for policy-making & implementation?"

"Have the skills, abilities and knowledge of the people responsible for policies improved within the triple helix?"

The questions in the 2nd Peer review were focused on both outputs and on the impact on enhancing skills, capabilities & knowledge of people in charge of local, regional, and (trans)national RTI policies in a triple-helix context. The second peer review included the following questions:

- Was the content understandable? What to change and why?
- Has the learning process been designed so that it can be felt and understood quickly? What would you change and why?
- How relevant and effective is the Policy Learning Lab (OT1.1.) to reach the project's wider aims & objective? What would you change?
- How relevant and effective is the Strategy with action plan (OT1.2) to reach the project's wider aim & objectives?
- Whether the lessons learned from the PLL were linked to the corresponding new joint improved strategy, supported by a policy implementation action plan. What are your recommendations to better target & formulate actions to deliver support for the CAMI4.0 Topics?
- How can the Strategy and action plan (Ot1.2) results be used to support other RIS3? Or Other Initiative(s)?
- How can the PLL (Ot1.1) results be used to support other RIS3? Or Other Initiative(s)?
- How can the PLL (Ot1.1) support other RIS3 work? Or Other Initiative(s)?





2.4.5. Impact of the Policy learning lab

The PLL are a key methodology of CEUP 2030 and increase the sustainable impact of the project significantly as they strengthen the competence base and capacities of the involved stakeholders - within and beyond the project.





3. METHODOLOGICAL APPROACH TO IMPACT CONTROLLING

The CEUP2030 Impact Controlling System in WPT1 was developed with four distinct parts, as visualized in Figure 3. Its core elements are qualitative and quantitative measurement aspects, which are backed up and supported by a useful toolkit of the Peer Review Group and the Monitoring Impact assessment tool.



Figure 1 Impact Controlling System Overview

The system's methodological development emerged through detailed discussion between the deliverable responsible and WPT1 Lead partner, Partner, Pomurje Technology Park ("PTP) and the Lead Partner, Krakow Technology Park ("KTP"), with support from external support of Mind Consult & Research GmbH ("MCR"). The methodology aimed to capture requirements of the project application form, but kept the project's goal at the heart of the development, to ensure processes were not overly onerous.





This methodology was electronically presented to Partners in June, when Partners were first asked to provide contributions on Peer Review and quantitative indicator assessment.

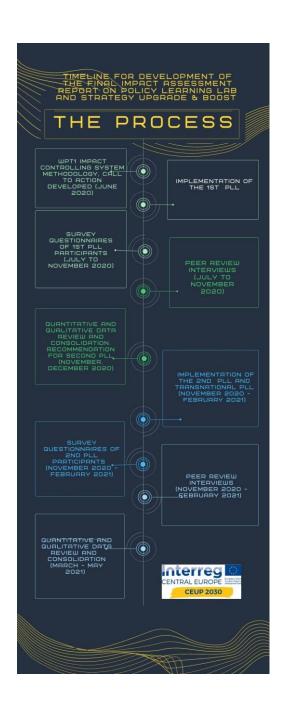


Figure 2Timeline for Development of the Final Impact Assessment Report on Policy Learning Lab and Strategy Upgrade & Boost





3.1. Peer Review Group

As defined a Peer Reviewer is an individual with the remit of assessing the validity and quality of project results. The Peer Review Group is a number of individuals, identified by each Partner, with the appropriate skill set of assessing validity and quality of project results. The Peer Review group is distributed across the Central Europe area, and across Alliance competencies, and not an entity that will be brought together in one

place regularly - it is better described as "providing individual feedback to their trusted Partner contact", about the results of the project.

As presented in Figure, the Peer Review group development methodology had five distinct parts, to move from the initial concept to a full group of balanced Peer Reviewers



Figure 3 Peer Review Group Development Methodology

Partners were asked to generate a list of appropriate Peer Reviewers, who were balanced regarding their representation of project target groups (quadruple-helix representation) and project topics. It was also requested that the partners consider the expertise of the Peer Reviewer, their background, and their interest in the project goals, as core attributes around which certain Peer Reviewers should be chosen.

The Peer Reviewers can take on an important double-role: ensuring the Partner's think outward whilst also supporting the Partners in disseminating project results outward.

The results of this were the generation of a table, with 1 to 2 Peer Reviewers per Partner, identifying at least, the name of the contact person, the type





of organization, and the areas of CAMI4.0 topics the Peer Reviewer has a specific expertise.

3.2. Qualitative Measurements



Figure 4 Qualitative Measurement Methodology Development

The qualitative measurement aspect, the second part of the Impact Controlling Methodology, describes a process that looks to gain information or patterns from non-numerical data. During the early stages of the project, the methodology was developed through detailed discussions which determined that interviews and personal discussions (specifically with the Peer Review group), would be a strong method of gaining the data. An overview of this methodology is described in Table 1, below

Measurement approach:	Interviews / personal discussions - 2 interviews that ask for their impact expectations of project CEUP 2030
Result documentation	Brief report, or interview transcripts
Responsible:	Every partner of CEUP 2030
Interviewer:	Every partner
Interviewee:	Peer Reviewers

Partners were asked, in September 2020, to contact two Peer Reviewers who have also participate in the second Policy learning lab. These interviews, as





described in the Table above, is used to gather Peer Reviewer 'impact', which has been and will be used as the basis for assessment across the total project. At this point, Partners had appropriate information about the project, primarily a common narrative on its goals and projected plan, and could describe the project in detail to the Peer Reviewers.

In the Appendix of this document, you can find an imbedded file which shows the most up-to-date version of the interview transcript which was used to generate a common structure to the returned qualitative data. The goal of the questions was to provide open questions surrounding the goals of the project as a whole, and Work Package output; asking about the Peer Reviewer's institutional views about the usefulness and benefit (value) of the outputs from WPT1

3.3. Quantitative Measurements



Figure 5 Quantitative Measurement Methodology Development

The third aspect of the Impact Controlling methodology, quantitative measurement, looks to gather information on impact from numerical data, or indicators. These indicators will be used to weight the relative impact of the indicator on meeting the project's objectives.

There are two broad categories of quantitative indicators which emerged in the project:

1) Target Group Indicators: which represent a numerical value of organizations which are brought into the CEUP2030 project in relation to a certain category of organization type.





2) Output (or Work Package) Indicators: which represent a numerical value of outputs associated with essential deliverables within each Work Package. Often these numbers represent the number of specific activities a Partner had to complete in relation to a specific output.

3.3.1. Target Group Indicators

The selected institutions, organisations, companies should contribute with a high impact to the project implementation and their capitalization, strategic anchoring as well as to a high-quality communication of gained project results.

- Local public authority 20
- Regional public authority 20
- National public authority 7
- Interest Groups, including NGOs 10
- Higher education and research 30
- Education/training centre and school 10
- Large enterprises 20
- SME 80
- Business support organisations 20

While implementing WPT1, we reminded the partners to think carefully about the stakeholders how to involve them in the activities.

Target Groups can, and should be included in project content work (such as attendees at

Please further specify the target groups see examples in annex 4 of the application manual (classification of target groups)		 Target value Please indicate the size of the target group the project aims to actively involve. 	
Local public authority	Local & municipal authorities associated to innovation & technology support initiatives will be engaged in the project 10 from PPs area and a further 10 from complementary areas (e.g. Graz, Salzburg, Bratislava, Brno, Jena)	20,00	
Regional public authority	Regional ministries of economy, technology, innovation & Industry will be engaged from 10 PP regions + 10 further regions which provide critical synergy to promote the CEUP 2030 Framework of Excellence vision (e.g. Styrla, Thuringia, South Tyrol, etc.)	20,00	
National public authority	National ministries or delegated & policy-relevant agencies will be involved from PPs associated country. Focus will be on incorporating National S3 coordinating ministries, leveraging off of engaged Associated Partners.	7,00	
Interest groups including NGOs	Via Members, Owners & founders of PPs Interest Groups will be brought into the partners (approximately 17PP). Interest groups engagement deepen understanding about Impact on Industry/labour/technology innovation generally.	10,00	
Higher education and research	Through HERR, innovation to promote the PID 8. TINS become more future foresight orientated. Critical connections with this Target Group is key, therefore each PP engages 3 from their networks to enhance thematic discussions within project life cycle.	30,00	
Education/training centre and school	Each PP will identify one E/TC&S to support transferability & sustainability of PID tool use, focusing on an integrative approach which connects to training centres to promote interdisciplinary teaching methods for the four topics.	10,00	
Large enterprises	LEs will be involved, especially through use-case development & to showcase practical relevancy industrial impact from these target technologies (Each PP engages 2 LEs, gaining a collaboration pool in Robotics, Materials, Big Data/Sensors & Al).	20,00	
SME	SMEs, especially those within PP networks, will be included to showcase practical relevancy of targeted growth support mechanisms associated to the technology areas (Each PP engages 8, approx. 2 with a business model/ tech area.)	80,00	
Business support organisation	PPs & networks engage regularly with BSOs (technology parks, dusters), these multiplying organisations will be involved in TiN discussion & further in RE3 Roundtables. PPs each bring 2 BSOs into the CEUP 2030 activities.	20,00	

PLLs or included in your strategic Action Planning process), as Peer Reviewers, and as general attendees at workshops and strategic alignment activities. They are counted institution by institutions (each institution should count once - not on a person-by-person basis!)

Figure 6 Target Groups of CEUP 2030 (Source: AF, 2018; pg 63)

3.4. Thematic Result Indicators

Thematic Result Indicators are relevant for the full project. However, there are contributions to these indicators through the thematic work in the project's work packages. The following thematic result indicators should be monitored whilst implementing WPT1:





Table 11.1. Table 1 Thematic Result Indicators

Number of trained persons	Persons	100,00	Through the Policy Learning Labs (WPT1), collaborative learning techniques will be used to upgrade and upstream technology focused results to policy-relevant users (10/PP – 100 total); these users will be engaged again once tools are further developed & upgraded (WPT2), and policy-relevant stakeholders are brought into the RIS3 Round tables to determine implementation alignment steps for the Framework for CAMI4.0 Policy Excellence.
---------------------------	---------	--------	---

How: the policy learning labs will engage at least 10 stakeholders per partners (10/PP - 100 total), in collaborative learning techniques. These stakeholders will be policy-relevant individuals working for critical organisations which have influence on the regional, national and transnational development of CAMI4.0 topics (from public authorities to interest groups/NGOs with key influence over advanced manufacturing / industrial digitisation or Industry 4.0).

3.4.1. Output Indicators for WPT1

3.4.1.1. OUTPUT1 - CEUP 2030 Policy Learning Lab

This output describes the physical structure which will be created and deployed by each partner to train and empower policy-relevant stakeholders on the CAMI4.0 Topics, to generate sufficient knowledge exchange to support policy-making. This output has a number of parts which must be achieved for it to be considered "complete". It consists of three major parts.

Part 1 = PLL Methodology Harvesting, here, the partners examined their portfolio of results from the previous programming period and checked whether we have a method for interactive stakeholder engagement to better familiarize stakeholders with technologies. technologies, which we presented in the PLL.

Part 2 = Physical PLL Sessions

Then we conducted two rounds of physical workshops / interactive sessions where we addressed policy-relevant stakeholders:

- Round One PLL = 10 Workshops 1/PP
- Round Two PLL = 10 Workshops 1/pp, 4 of which take place transnationally to better connect trans-regionally oriented policy-relevant stakeholders in:
- o Poland:
- Germany;
- Italy:
- o Austria.

Part 3 = Stakeholder Feedback Loops





After each session of PLL, first round of PLL (due in August 2020) and the second round of PLL (due February 2021) PPs have completed a detailed interview scheme with identified Peer Reviewers. This 360-degree feedback was used to improve the deployment techniques and technology use-cases which are delivered.

Table 2 Number of Trainings Implemented for Improving Innovation Capacity and Mind-Sets: 1

Output O.T1.1	CEUP 2030 Policy Learning Lab – Cross-linked capacity enhancement for CAMI4.0 stakeholders	The CEUP 2030 PLL is established by 10 trainings (A.T1.2) to train and empower people to work on policies & strategies for CAMI4.0 technologies (mutual Triple-Helix-Learning). The PPL fosters & anchors a policy training scheme where comprehensive learning processes are designed to be felt & understood quickly. Complex systems and technologies are made clear and understandable to target groups. The gained 100 stakeholders set the base for strong CE/EU policy making in T2 & T3.	S.O.1.1 / S.O.1.2 - Number of trainings implemented for improving innovation capacity and mind-sets	1,00	02.2021
---------------	--	--	---	------	---------

To meet these results, each partner had to contribute to the development of a "training" framework and contribute by launching two stakeholder workshops where technology showcases are presented in an interactive and understandable way.





3.4.1.2. OUTPUT 2: CEUP 2030 Strategy Upgrade & Boost

This output describes the development of a Strategy & Action Plan which sets the vision and working plan for the Trend and Innovation Networks ("TIN") for CAMI4.0. The output consists of two parts:

Part 1 = The Joint Strategy for CAMI4.0 Excellence, which sets strategic vision statements from each PP on the CAMI4.0 Topics. The vision had to be based on the harvested strategies implemented by the PPs in the previous programming period and the feedback and insights gained from stakeholders during the implementation of the PLL. The latter aspect of "feedback and insight" is an element of "upgrading and enhancing" this result.

Part 2 = The Action Plan for CAMI4.0 Excellence, which sets a structured working module for the 4 CAMI4.0 Topics. This plan had to define policy pilot actions, ie. Policy instruments for CAMI4.0 with which project partners have experience, which will be the basis for discussion in RIS3 round tables (WPT3).

Table 3 Number of strategies and action plans developed and/or implemented for strengthening linkages within the innovation system: 1

Output O T1 2	Factoria a constale	policy implementation action plan (A.T1.3). Thus a policy relevant exploitation of the CE/EU project scheme is set for an immediate use and in a long-term strategic manner. This will be further enhanced in T2 &	systems	1,00	02.2021
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4. MONITORING IMPACT ASSESSMENT TOOL



Figure 7 Preparation of the impact assessment tool

The monitoring tool is used as a tool to monitor indicators in WPT1 and to prepare D.T1.4.3 - Final Impact Assessment Report on Policy Learning Lab and Strategy Upgrade & Boost.

This Tool allows the partnership to monitor:



CEUP 2030



• 'State of the art', mapped knowledge within the work package 1;



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Figure 8Image of the Introduction Sheet of the Monitoring Impact Assessment **Tool**

- Identified potential Alliances tracking (with and update capability); and
- Visualize and share impact connecting produced bν knowledge (feedback).

Overall, it supports distributed impact monitoring of Partnership related to the goals and outcomes of CEUP203. The cooperation tool is an IT-based Microsoft Excel is currently hosted the Partnership's project management space Alfresco, and is not publicly available. However, in the images below, one can find a number of images that represent the sheets available Partners to map, record, track and update information that received from Partners and Peer Reviewers about the project's quantitative and qualitative impact.





Qualitative Indicator Interview Summary Tracker provides an overview of all the contact details and information of the Peer Reviewers which have been identified by the Partners. It also provides an interpretation of WP T1 topics where the individual or organization carries competency to provide impact controlling feedback

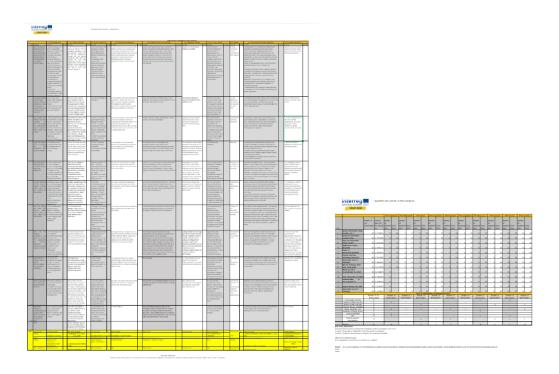
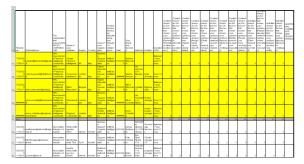


Figure 9 Qualitative Indicator Interview Summary Tracker





Figure 10 Quantitative Indicator Summary Tracker



Quantitative Indicator Summary Tracker provides a single location where all the quantitative indicators from WPT1 will be stored, and recorded in one place. In the column "link location", add the web link where you posted report about the workshop- The data is entered by each Partner!





5. RESULTS

As inferred in the section of this report which lays out the Impact Controlling methodology, the following section provides an overview of the results which have emerged from the collective work of the partnership. The results are broadly broken down into three sections, providing an overview of final numbers related to the Peer Review Group, the outcomes of the interviews with the Peer Reviewers (as summarized through the Impact Controlling Tool), and the final values of quantitative indicators which have been achieved in WPT1.

5.1. Peer ReviewGroup

Amongst target groups and stakeholders of each of the project partners, we have identified and created a Peer Reviewers' group, which would represent the triple-helix actors. It was important for these Peer Reviewers also to represent a specific interest in either of the CAMI4.0 Topics. Overall, there were 30 organizations identified as Peer Reviewers.

Partner Name	PP No.	No. of Peer Reviewe rs Identifie d - 1st PLL	No. of peer reviews conduct ed - 1 st PLL	No. of Peer Reviewers Identified - 2 nd PLL	No. of peer reviews conduct ed - 2 nd PLL
Krakowski Park Technologiczny	LP1	1	1	2	2
PROFACTOR GmbH	PP2	1	1	2	2
Verein Industrie 4.0 Österreich	PP3	1	1	2	2



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Fraunhofer Gesellschaft zur Förderung der angewandten Forschung e.V. für das Fraunhofer Institut für Werkzeugmaschi nen und Umformtechnik	PP4	1	1	2	2
Karlsruher Institut für Technologie	PP5	1	1	2	2
Associazione Fabbrica Intelligente Lombardia	PP6	1	1	2	2
S.c.p.a. Sistemi Intelligenti Integrati Tecnologie	PP7	1	1	2	2
Pomurski tehnološki park	PP8	1	1	2	2
Pannon Business Network Association	PP9	1	1	2	2
Hrvatska agencija za malo gospodarstvo, inovacije i investicije	PP1 0	1	1	2	2
Total Peer Reviewers - after 1st PLL			10	Total Peer Review ers - after 2 nd PLL	20
	Total Peer Reviewers				

In total, 10 Peer Review interviews took place between August 2020 and December 2020 and 20 peer review interviews took place between January and March 2021 after 2nd PLL. In Table below you can see the total number after 1st and 2nd PLL.





That means all Peer Reviewers were interviewed for the qualitative analysis. Interviews took from 30 minutes up to two hours, depending on the project partner's approach to discussion and in how much detail the interviewees wanted to go.

5.2. By CAMI4.0 Topic

Interviews with Peer Reviewers were carried out on the basis of 4 main topics of CAMI4.0: Intelligent Production Systems, Automation & Robotics, Smart Materials and Artificial Intelligence. These topics have been selected in the framework of CEUP2030 project, since they have been recognized as the most strategic topics to be developed in the Central Europe area to maintain the competitiveness of Advanced Manufacturing stakeholders and to develop further their knowledge and competences. More precise, each CAMI4.0 topic has also been specified in term of sub-topics to clearly identify the contents to be discussed and developed within the network. Some interviews with Peer Reviewers covered several topics.

Table 4 Number of Peer reviewers per topic

CAMI 4.0 Topics	Total Peer Reviewers - 1 st PLL	Total Peer Reviewers - 2 nd PLL
Intelligent Production Systems	0	4
Automation & Robotics	7	6
Smart Materials	2	2
Artificial Intelligence	1	8





5.3. By Target Group

Table 5 Number of Peer reviewers per organization

Target Group	Total Peer Reviewe rs - 1 st PLL	Total Peer Reviewe rs - 2 nd PLL	Togeth er
Local public authority	1	2	3
Regional public authority	1	0	1
National public authority	1	2	3
Interest Groups, including NGOs	0	0	0
Higher education and research	2	4	6
Education/traini ng centre and school	0	1	1
Large enterprises	1	3	4
SME	1	3	4
Business support organizations	3	5	8
Total	10	20	30





5.4. Qualitative Mesurments

In order to anonymously present the results of the qualitative interviews after 2nd PLL, the interviews have been summarized into thematic areas highlighted in relation to each question which was asked. This is to provide an overview of grouped perspectives about the project as a whole and the individual outputs.

The following sections provide an overview of the major themes which emerged throughout the interviews, first presenting the themes, and then providing a breakdown of how often this theme emerged in the interviews which took place.





5.4.1. Question 1: When hearing the objectives of CEUP 2030, generally, what opportunities do you expect this project to bring to your organization? Your region? Central Europe?

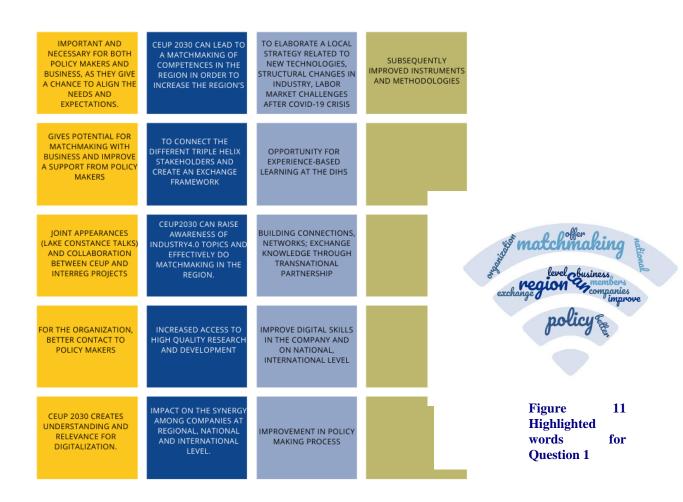


Figure 12 Exposed content with the interviewee in question 1

5.4.2. Q: How relevant and effective was/is the Policy Learning Lab (OT1.1.) in order to reach the project's wider aims & objectives? What would you change?





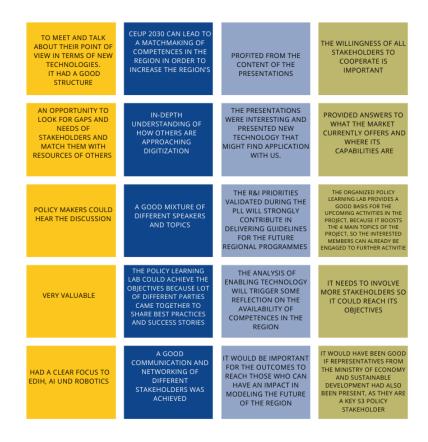


Figure 13 Exposed content with the interviewee in question 2



Figure 14 Highlighted words for Question 2

5.4.3. Was the content understandable? What would you change and why?







Figure 15 Exposed content with the interviewee in question3



Figure 16 Highlighted words for Question 3





5.4.4. Q4: How relevant and effective was/is the Strategy with action plan (OT1.2) to reach the project's wider aim & objectives?



Figure 17 Exposed content with the interviewee in question 4



Figure 18 Highlighted words for Question 4





5.4.5. Q5: How did the Policy Learning Lab (OT1.1.) create added value for your region's key stakeholders?

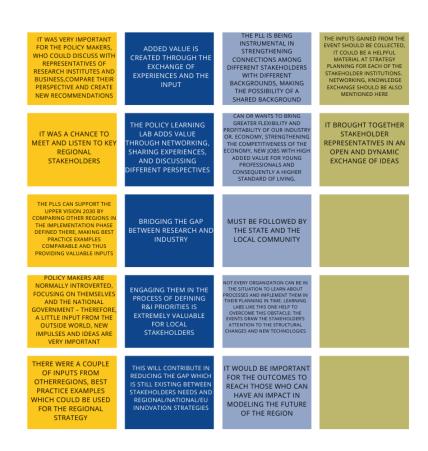


Figure 19 Exposed content with the interviewee in question 5



Figure 20 Highlighted words for Question 5





5.4.6. Q6: How have been results of CEUP 2030 utilized to create added value for our region's key stakeholders?

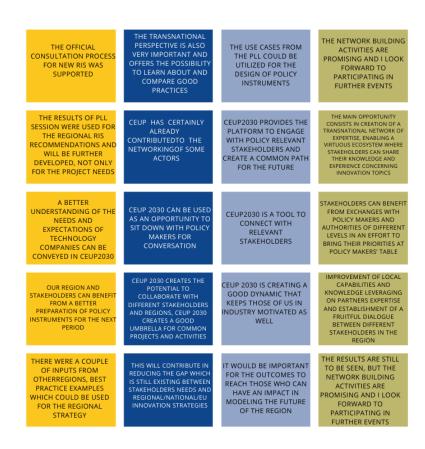


Figure 21 Exposed content with the interviewee in question 6

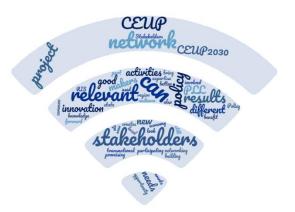


Figure 22 Highlighted words for Question 6





5.4.7. Q7: How is Strategy (OT.1.2) creating added value for your region's key stakeholders?

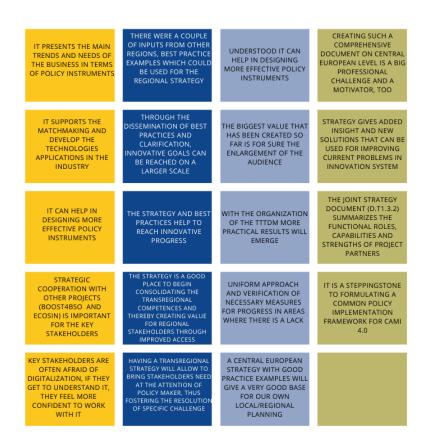


Figure 23 Exposed content with the interviewee in question 7



Figure 24 Highlighted words for Question 7





5.4.8. Q8: Whether the lessons learned from the PLL (Ot1.1) were linked to the corresponding new joint improved strategy, supported by a policy implementation action plan. What are your recommendations?



Figure 25 Exposed content with the interviewee in question 8



Figure 26 Highlighted words for Question 8





5.4.9. Q9: How can the PLL (Ot1.1) results be used to support other RIS3? Or Other Initiative(s)?

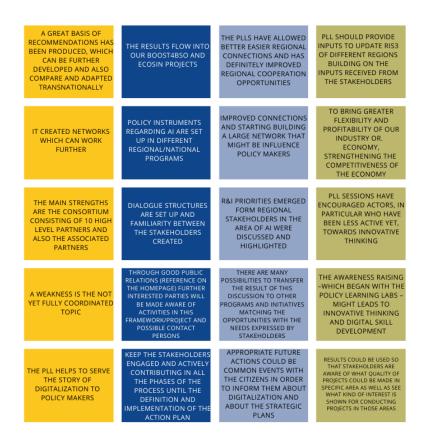


Figure 27 Exposed content with the interviewee in question 9

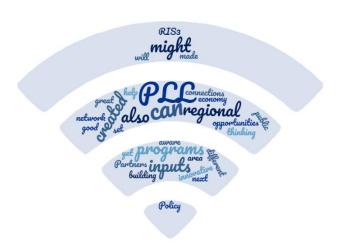


Figure 28 Highlighted words for Question 9





5.4.10. Q10: How can the Strategy and action plan (Ot1.2) results be used to support other RIS3? Or Other Initiative(s)?

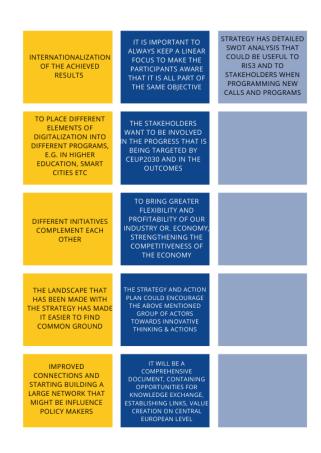


Figure 29 Exposed content with the interviewee in question 10

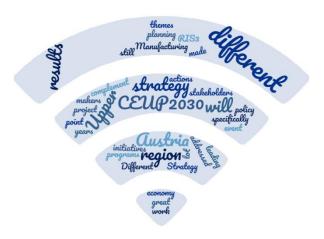


Figure 30 Highlighted words for Question 10





5.4.11. Q11: What other comments or recommendations do you have about CEUP 2030 and its goals & visions, which have not been mentioned yet?

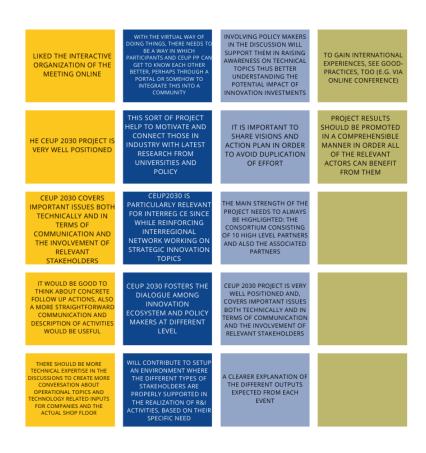


Figure 31 Exposed content with the interviewee in question 11



Figure 32 Highlighted words for Question 11





5.5. Quantitative Mesurments

Provides an overview about quantitative measurements about 1st and 2nd PLL workshops conducted (number of participants, satisfaction with the workshops, etc.). This chapter quantifies the impact of the workshops on each Policy learning lab visitor. Currently the term "TBC3" is used as a holding place for any numerical indicator which has not been reported as achieved yet

Table 6 Overview of 1st round PPLs

No, Name of PP	Date and Place of the PPL	CEUP 2030's Participant s
PP1_KTP	Data: 16.09.2020r.Miejsce: Krakowski Park Technologiczny ul. Podole 60, 30-394 Kraków, Parter, Sala Enterprise	14
PP2_PRO	19.11.2020, online meeting	19
PP3_PIA	Workshop zum Thema "Artificial Intelligence" (AI) 22. September 2020, 10:00-15:30, online via Go To Meeting	15
PP4_IWU	First round of PLL, Chemnitz, 07 October 2020, online meeting	10
PP5_KIT	CEUP 2030 Policy Learning lab 1, 17.09.2020, Online	10
PP6_AFIL	1st Round of PLL, 6th July 2020, Webinar (due to COVID restriction)	43
PP7_SIIT	1st Round of PLL, August 2020, Webinar	11
PP8_PTP	Datum sestanka: 07.08.2020 Lokacija sestanka: Prostor Bistra hiša, Martjanci 36, 9221 Martjanci	9
PP9_PBN	First round of PLL, 9th July 2020	10
PP10_HAMAG	I.Policy Learning Lab u sklopu projekta, "Central Europe Upstreaming for Policy Excellence in	13

³ TBC - to be conducted

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	Advanced Manufacturing & Industry 4.0 towards 2030" CEUP 2030, Zagreb, Hrvatska, 29.10.2020. https://global.gotomeeting.com/join/268214237	
Total		
Number of		154
Participants		

Table 7 Overview of 2nd round (from D.T1.2.3)

No, Name of PP	Date and Place of the PPL	CEUP 2030's Participants
PP1_KTP	Second Policy Learning Lab Krakow, 18 November 2020, on-line	24
PP2_PRO	Second Policy Learning Lab, 11 March 2021, on-line	9
PP3_PIA	Part of transnational PLL	/
PP4_IWU	Policy Learning Lab 2 im Rahmen von Interreg CEUP 2030, 16 February 2021, on-line	19
PP5_KIT	Second PLL, 9 February 2021, on-line	18
PP6_AFIL	2nd Round of PLL, 22 January 2021, on- line	19
PP7_SIIT	Second Round PLL, 14 December 2020, On-line	44
PP8_PTP	2nd PLL, 18th March 2021, online	28
PP9_PBN	2ndPLL, 18 January 2021, on-line	12
PP10_HAMAG	2nd Round of PLL, 11 February 2021, on- line	14
Total Number of Participants		187





Table 8 Overview of transnational PPLs

No, Name of PP	Date and Place of the PPL	CEUP 2030's Participants
КТР	CEUP 2030 Transnational Policy Learning Lab, 24 September 2020, online	14
PRO & PBN	Transnational Policy Learning Lab, 20 April 2021, online	125
PIA	Transnational PLL, 2 December 2020, online	46
AFIL	CEUP2030 Transnational Policy Learning Lab: Mutual learning on Regional strategies and policy toward 2030, 28 April 2021, online	22
Total Number of Participants		207

The indicators were based on the impact of the workshop on the individual participant. In the evaluation questionnaire, the participants assessed their satisfaction with individual parts of the workshop. They had 4 options available, Excellent, satisfied, Unsatisfied, Not Applicable. To make it easier to quantify individual parts of the workshops, we evaluated each answer with a number.

0-Not Applicable; 1- Unsatisfied; 2- satisfied; 3- Excellent





Table 9 Impact of the workshop on the individual participant

		Number of	Average	Number of	Average
		ALL	Score⁵ per	ALL	Score ⁷ per
Line		Participants ⁴	participant	Participants ⁶	participant
		1 st PLL		2 nd PLL	
	General information (time, location,	83	2,72	80	2,84
1.	etc.)				
2.	Instructor information (contact info)	83	2,80	80	2,75
3.	Goals and objectives clearly stated	83	2,66	80	2,75
4.	Assignments clearly described	83	2,46	80	2,8
5.	Clarity of instructions/questions	83	2,57	80	2,71
	Content matches workshops	83	2,54	80	2,69
6.	objectives				
7.	Appropriate level of challenge	83	2,57	80	2,64
	Did the workshop meet your	83	2,61	80	2,66
8.	expectation		·		
	Would you have recommended to	68	2,71	80	2,83
9.	others		,		,
10.	Clear instructions provided	68	2,66	80	2,72
	Helped develop understanding	68	2,69	80	2,57
11.	of new principles or concepts		,		,
12.	Helped develop new skills	68	2,34	80	2,47
13.	Appropriate level of challenge	68	2,59	80	2,55
	It has policy implications and	-	-	80	2,65
14.	influence on the community				,
	Establishes cooperation and	-	-	80	2,61
15.	partnerships				,
		L	l		

To summarize it, the participants were more than satisfied with the workshops. It was most noticeable that the participants have expected more from "development of new skills" related to CAMI4.0 topics. It will also be necessary to consider how to clearly describe assignments in the PLL.

⁴ Participants who completed the questionnaire

⁵ O-Not Applicable; 1- Unsatisfied; 2- satisfied; 3- Excellent

⁶ Participants who completed the questionnaire

⁷ 0-Not Applicable; 1- Unsatisfied; 2- satisfied; 3- Excellent



CEUP 2030



,	1		1		1			
Indicator description	Unit	Target	Partici pants who compl eted the questi onnair e 8	Total participa nts	Particip ants who complet ed the questio nnaire ⁹	Total participa nts		Total
			1 st	PLL	2 ^{nc}	¹ PLL	Tr. PL L	
Target Group	Indicators							
Local public authority	Number of institution s	20	5	44 ¹⁰	2	37		81
Regional public authority	Number of institution s	20	5		8			
National public authority	Number of institution s	7	12		6			
Interest Groups, including NGOs	Number of institution s	10	0	3 ¹¹	0	2		5
Higher education and research	Number of institution s	30	19	52 ¹²	16	46		98
Education/ training centre and school	Number of institution s	10	2		4			
Large enterprises	Number of institution s	20	6	55 ¹³	13	102		157
SME	Number of institution s	80	15		11			

⁸ Participants that have fill out evaluation questionnaire

⁹ Participants that have fill out evaluation questionnaire

 $^{^{\}mbox{\tiny 10}}$ grouped into one line because the participants did not define themselves in detail

 $^{^{\}rm 11}$ grouped into one line because the participants did not define themselves in detail

 $^{^{\}rm 12}$ grouped into one line because the participants did not define themselves in detail

 $^{^{\}rm 13}$ grouped into one line because the participants did not define themselves in detail



CEUP 2030



			1	T				
Business support organization s	Number of institution s	20	19		20			
Total Project	Impact Indi	cators						
# of institutions adopting new and/or improved strategies and Action Plan	Number of institution s	40		ТВС		ТВС		ТВС
# of institutions applying new and/or improved tools and services	Number of institution s	40		ТВС		ТВС		ТВС
Amount of funds leveraged based on project achievemen	Amount of found	2 million €		TBC		ТВС		ТВС
# of jobs created (FTE) based on project achieveme nts	Persons	10		ТВС		ТВС		ТВС
# of trained persons	Persons	100		154		187	207	548
WPT1 Impact	Indicators							
Trained persons at the involved stakeholde r institution	Persons	100		154		187	207	548
Number of quality	Interview s	30		10		20		30



CEUP 2030



proposals for the PLL workshop						
Number of strategies and action plans developed and/or implement ed for strengthening linkages within the innovation systems	Number	2	TBC	1		1
An adopting new and/or improved strategies and Action Plan	Number of institution s	40	ТВС	ТВС		ТВС
WP	C Impact Inc	licators				
Satisfaction of participants with Policy learning lab	% of participan ts	90	More than 90 %	More than 90 %	More than 90 %	More than 90 %
Participants at project events in WP C (physical reach)	stakehold	300,00	154	187	207	548





6. DISCUSSION

The goal of this report is to provide summary of PPs final 2 peer review interviews, plus quantitative analysis of WP impact on enhancing skills, capabilities & knowledge of people in charge of local, regional and (trans)national RTI policies in a triple-helix context.

The activities within WPT1 have focused on the appropriate selection, adaption and finetuning of proven tools, instruments and methodologies, aka "Harvesting" - during A.T1.1 where we defined the four technology topics for Central Europe Advanced Manufacturing & Industry 4.0 (CAMI4.0). After The generation of a structure (the Policy Learning Lab), first stakeholders were acquainted with new technologies and their applications, so as to give them better context for future decisions.

In the second semester we worked on the generation of a common strategy, based on previous work of Partners, setting a vision for the four CAMI4.0 topics -that happened during A.T1.3. Unfortunately, due to the emergency situation (COVID-19), the Joint Strategy was not completed before the first PLL workshop and therefore did not provide insight for the first participants of PLLs and Peer Reviewers. This work package also envisages the creation of a Joint Action Plan based on the previous part of the Partners & PLL program, to identify a critical path for the four CAMI4.0 themes - in activity A.T1.3. In the second PLL, decision-makers already had insight into the strategy, and some already had insight into the action plan with pilot use cases and have been checked and tested.

We can conclude, that the impact controlling has given 360-degree feedback from stakeholders during first, second and also transnationals PPLs.

6.1. Quantitative

We can say that the impact on the ecosystem and everyone involved in the CEUP 2030 project, as far as WPT1 is concerned, was in line with expectations. If we look at those actors included in the 2nd PLL (at least those who completed the evaluation questionnaire), we see that most of them came from the large enterprises, BSO, SME, and the higher education sphere. Altogether there were in first and second PLL 81 decision-makers





(from a local, regional and national public authority). CEUP 2030 high impact has occurred through meetings, especially during:

- Peer Review Interviews; and
- Training Activities;

The 2nd PLL showed that participants were generally satisfied with the workshops. According to survey, they received good information related to the CEUP2030 project, the information was well presented with all project objectives. The vast majority of participants expressed that the 2nd PLL has met expectations and would recommend a similar workshop in the future. Compared to the first PLL, participants were also more satisfied in terms of developing new skills related to topics CAMI 4.0.

We can say that activities in WPT1 built connections between quadruple helix actors, with a primary delivery focus on Academia, Enterprises and Government and a bit less towards Civil Society.

6.2. Qualitative

This section will discuss those results which are relevant to the research question, about how WPT1, and the project as a whole is seen to generate new connections and potential cooperation amongst Central Europe triplehelix actors.

After the 2nd PLL, the partners conducted a together 20 peer reviews, where we checked and got quality answers regarding the project itself, regarding the PLL workshop and regarding the activities that have taken place in the WPT1.

20 Peer Reviewers were from different types of organizations.

6.2.1. Central Europe as a Whole

The main strength of the area of the project is the wide ecosystem as far we consider the number of regions involved, where the CEUP 2030 partner organizations are coming from, where some have highly developed CAMI 4.0 topics ecosystem, some want to break through with it and some are just following and starting to gain ground in CAMI4.0 topics.

The main weakness is still not enough coordination of the topic. The companies need effective support/measures for connecting and exchange





(platforms?). Problem is a large amount of high-level information and superficial talk ("Al will change everything" etc.), a lot of marketing in the digital realm regarding Industry 4.0, Digitalization, Big Data...

Regions or smaller units (municipalities...) are necessary to spread CAMI4.0 topics and make them mainstream, use cases (as mentioned above) need to be stories that especially SMEs can relate to in order to start their digital transformation.

Also, there are not to be expected rapid implementation actions due to being held back by existing rules, structures, policies etc.

As for the vision, it is similar, we have regions that have a clear vision in individual areas and want to be at the forefront, then we have regions that want to get closer to these regions (following same or similar mindset), and finally we have regions that are barely aware of the benefits of CAMI4.0 topics.

6.2.2. CEUP2030 as a Whole

Peer Reviewers estimated that the CEUP2030 project could have a very significant impact for the region of Central Europe. The results and discussion made in the frame of CEUP2030 can be an important amendment that gives the policy makers a chance to meet and discuss with the representatives of business sector and provides the pragmatic perspective in planning the next financing period. CEUP 2030 can offer extended services which might offer significant benefits for organizations, for the region and also for the companies interested in the project. Most of those involved in the Peer Review are familiar with the Interreg Central Europe program, and from this point of view suitable for peer review.

CEUP2030 can create added value for region with the better understanding of needs and expectations among technological companies that can benefit in better preparation of the policy instruments for the next period. Also, the transnational perspective is very important and interesting. It gives a possibility of getting insights to latest technologies and to learn or hear about best practices etc.





6.2.3. Policy Learning Lab

The first PLL was very general, but informative. The second PLL had a clear focus to the CAMI 4.0 topics and was very well communicated in Advance, in other words, the content was more mature and impactful.

Peer reviewer pointed out, that the examples were very interesting, a good mixture of different speakers and topics.

The organized Policy Learning Lab **provides a good basis** for the upcoming activities in the project, because it boosts the 4 main topics of the project, so the interested members can already be engaged to further activities.

Interviewees observe that PLL is very relevant for reaching projects objectives but it is not as effective as it need to be. The R&I priorities validated during the PLL will strongly contribute in delivering guidelines for the future regional programs and the analysis of enabling technology will trigger some reflection on the availability of competences in the European regions. These set of R&I priorities outlined will be included in the guidelines that will be transferred to the institution.

2nd PLL was a great chance for representatives of different stakeholders to meet and talk about their point of view in terms of new technologies. Regarding to the feedback from Peer reviewers, even though that all 2nd PLLs were conducted online, they had a good structure, but they would still prefer the workshops in person. Workshops offered an opportunity to look for gaps and needs of stakeholders and match them with resources of others. It was great that policy makers could hear the discussion.

The Policy Learning Lab could achieve the objectives because a lot of different parties came together to share best practices and success stories.

Through the participation of universities, applied research institutions, SMEs, larger companies as well as representatives from politics, a **good communication and networking of different stakeholders was achieved**. The main problem was the "low" involvement of policy makers. Being the project very ambitious, it would be important for the outcomes to reach those who can have an impact in modeling the future of the region. It needs to involve more stakeholders so it could reach its objectives. The topics and participants were relevant. However, it would have been good if representatives of decision-makers at the state level were involved, as they are a key S3 policy stakeholder.

Participant profited from the content of the presentations, and the interactive parts were really where the benefits lie and allowed them to get into contact with the other people in the room.





In the roundtable we have to consider how to explain and get people to feel comfortable to participate and to **include verbal and nonverbal people**.

Also, to consider for the next events to have a more international imprint, to exchange ideas on a wider scale.

6.2.4. Strategy with an Action Plan

According to the Peer reviewers Strategy with an Action plan sounds like a **nice approach**, but it remains to be seen how it will be implemented. It presents the main trends and needs of the business in terms of policy instruments and supports matchmaking and develops the technologies applications in the industry and can help in designing more effective policy instruments.

The strategy and Action plan with best practices can help to **reach innovative progress**. There were a couple of inputs, best practice examples, from other regions, that **could be used for the regional strategies**. Through the dissemination of best practices and clarification, innovative goals can be reached on a larger scale. It is a good place to begin **consolidating the transregional competencies** and thereby **creating value for regional stakeholders** through improved access. Having a transregional strategy will allow bringing stakeholders to need to the attention of policymakers, thus fostering the resolution of specific challenges and it can help in designing more effective policy instruments.

Peer reviewers see problems, that key stakeholders are often afraid of digitalization, but if they get to understand it, they feel more confident to work with it. Also, specifying a value created by the project might be a bit hard. According to the Peer reviewers, only 4 months have passed from the first PLL, and that the biggest value that has been created so far is for sure the enlargement of the audience. They believe that with the organization of the TTTDM more practical results will emerge.

A Central European strategy with good practice examples will **give a very good base for local/regional planning**. It will be a comprehensive document, containing opportunities for knowledge exchange, establishing links, value creation on Central European level. Strategy has detailed SWOT analysis that could be **useful to RIS3** and to stakeholders when programming new calls and programs.

The Joint Strategy document with an Action plan summarizes the functional roles, capabilities and strengths of project partners. As such, it is a stepping to formulating a common Policy Implementation Framework for CAMI 4.0





7. CONCLUSION

The policy learning lab has proven to be an effective tool to bring the topic of CAMI 4.0 closer to decision makers. We can say that the workshops carried out by all partners in the CEUP 2030 project had an impact on decision-makers. A total of 548 participants took part in the 1st, 2nd PLLs and in all 4 international PLLs. A total of 81 decision-makers took part in the 1st and 2nd PLLs. Based on the elevation questionnaires made in the workshops, we can say that the participants were satisfied with all segments of the workshops and would be happy to suggest similar workshops to their colleagues. If we compare the results of the evaluations of the first and second PLL, it is noticeable that the satisfaction with the workshop has improved. An interview with selected experts was also conducted after the workshops. Here we got the answer to the project itself, the answer to the topic and the answer from the possibility of implementing the project results in the environment. Regarding the expected effects of the results in work package 1, we can say that all indicators have been achieved or. exceeded.





8. ANNEX

8.1. ANNEX 1 - Evaluation Template For 2nd Pll

2 ND	POLICY LEA	ARNIG LAB EVA	LUATION FORM			
Partner Na	ame		Choose a	n item.		
Institution			Free Text			
Region			Free Text			
	Type of organization			n item.		
	CAMI 4.0 related topics			n item.		
Date			Click here to e			
Duratio	n					
Name			Free	Text		
Addres	ς		Free 7			
E-Mail			Free 7			
Position			Free 7			
		(in the box that	shows your opinion)			
Some	Exce	Satisfac	Unsatisfact	Not		
	llent	tory	ory	Applicable		
General information		•	•			
(time, location, etc.)						
Instructor information						
(contact info)						
Goals and objectives						
clearly stated						
Assignments clearly						
described						
Clarity of						
instructions/questions						
Content matches						
workshops objectives						
Appropriate level of						
challenge						
Did the workshop meet						
your expectation						
Would you have						
recommended to others	os (Insert er	V in the bouth of	ahawa ware anini w	\		
ACTIVITI	<u>es (insert an)</u> Exce	Satisfac	shows your opinion Unsatisfact) Not		
	llent	torv	orv	Applicable		
Clear instructions	пен	LOI y	OI y	Applicable		
provided						
Helped develop						
understanding of						
new principles or						
concepts						
Helped develop new						
skills						
Appropriate level of						
challenge						





It has policy implications and influence on the community		
Establishes cooperation and partnerships		

ADDITIONAL COMMENTS AND SUGGESTIONS:	
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8.2. ANNEX 2 - External 2nd Peer Review Template for WPT1 Outputs

EXTERNAL 2 ND PEER REVIEW TEMPLATE FOR WPT1 OUTPUTS				
Partner Name	Choose an item.			
Institution name	Free Text			
Region	Free Text			
Type of organization	Choose an item.			
CAMI 4.0 related topics	Choose an item.			
Date	Click here to enter a date.			
Duration				
Name	Free Text			
Address	Free Text			
E-Mail	Free Text			
Position	Free Text			

Introduction Text for Interviewer:

(It is recommended that a short project overview is given by the PP to the Interviewee, which includes insight into the plans the PP is working on to deliver value and innovation capacity building in your region)

You are selected as external peer review individual from your regional CEUP 2030 project, due to your expertise, competence, experience and relevance to our quality monitoring programme.

Thank you very much for your time and support.

This interview is part of the impact controlling for the project; your answers will be summarized, so that no conclusion to individuals will be possible.

The objective of the interview is:

- to learn what impact you expect from CEUP 2030
- to receive a first opinion on how the current outputs, work can reach these goals.

There will be next opportunity to meet and exchange again information, presumably in Spring 2021

Overall Objective of CEUP 2030

The main objective is to set up stable innovation network with better understanding & improved knowledge, exchange of new technologies, relevant for Central Europe Advanced Manufacturing & Industry 4.0 (CAMI4.0), fostering the exploitation of available outputs/results that will lead to an upgraded policy-making & implementation.





Specific Objective of CEUP2030:

- S01_Enhance skills, capabilities and knowledge of people in charge of local, regional and (trans)national Research, Technology and Innovation policies within the triple-helix context
- S02_Ensure awareness and shared sustainable responsibility on using the Research, Technology and Innovation knowledge resources in CE/EU for enhancing policy decision support
- S03_Anticipate and fast-track policy strategies focused on the CE/EU sustainable and continuous development, necessary to promote an aligned joint S3/RIS3 for CAMI4.0 excellence

"Research Question in 2nd peer review":

focus on both outputs and on impact on enhancing skills, capabilities & knowledge of people in charge of local, regional and (trans)national RTI policies in a triple-helix context.

PT1 Objective:

The overall objective of WPT1 links to the project's specific objective of enhancing skills, capabilities and knowledge of people in charge of local, regional and (trans)national Research, Technology and Innovation policies within the triple-helix context.

The challenge manifests in two sub-objectives which are:

- (1) To train and empower people to work in the environment of new technologies (strategically and operatively) regarding policy-relevant decisions
- (2) To pool a critical mass of trained stakeholders to generate sufficient power for policy-making and appropriate selection, adaption and fine-tuning of already proven tools, instruments and methodologies.

	methodologies.		
	Category & Question	Answer	
A.	General		
_	When hearing the objectives of CEUP 2030, generally, what opportunities do you expect this project to bring to your Organization? Your region? Central Europe?	Free Text Response	
В.	6. Relevance & Effectiveness (referring to the relevance of the project work to the objective and aim of the project, and effectiveness at building a sustainable transnational support structure with sustainable linkages & enhancing regional innovation capacity		
_	How relevant and effective was/is the Policy Learning Lab (OT1.1.) in order to reach the project's wider aims & objectives? What would you change?	Free Text Response	
_	Was the content understandable? What would you change and why?	Free Text Response	





_	How relevant and effective was/is the Strategy with action plan (OT1.2) to reach the project's wider aim & objectives?	Free Text Response	
C.	C. Value- Creation (referring specifically to the project's future activities using WPT1 outputs, to showcase how value can be created with transnational support structures - for instance: access to knowledge, personal networking, concrete cooperation)		
_	How did the Policy Learning Lab (OT1.1.) create added value for your region's key stakeholders?	Free Text Response	
_	How have been results of CEUP 2030 utilized to create added value for our region's key stakeholders?	Free Text Response	
_	How is Strategy (OT.1.2) creating added value for your region's key stakeholders?	Free Text Response	
D.	Sustainability/Transferability (referring specifically to the ability of the work p RIS3 aims & integrated into other initiatives to s		
_	Whether the lessons learned from the PLL (Ot1.1) were linked to the corresponding new joint improved strategy, supported by a policy implementation action plan. What are your recommendations?	Free Text Response	
-	How can the PLL (Ot1.1) results be used to support other RIS3? Or Other Initiative(s)?	Free Text Response	





_	How can the Strategy and action plan (Ot1.2) results be used to support other RIS3? Or Other Initiative(s)?	Free Text Response
E.	Closing Remarks	
_	What other comments or recommendations do you have about CEUP 2030 and its goals & visions, which have not been mentioned yet?	Free Text Response