# BEYOND DIPLOMAS: MAPPING NEW FORMS OF QUALIFICATION RECOGNITION AT EUROPEAN UNIVERSITIES

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#### **Abstract**

This short presentation is the first step towards a better understanding of the practices that Higher Education institutions (HEIs) deploy to recognise qualifications for smaller or different (compared to mainstream) university diplomas, for which the umbrella term micro-credentials is used. We will thus seek to analyse the qualification recognition systems that HEIs adopt in their strategy to accredit educational offers, except for diplomas, and thus contribute to the broader discussion of skills and knowledge recognition in the new context of micro-learning and micro-credentials worldwide. A randomly collected set of 18 Higher Education practices have been mapped against three parameters on which the analysis is grounded: a) certification types, b) credit transfer or accumulation, and c) quality accreditation of learning programmes.

# **Keywords:**

Micro-credentials, higher education, certification, credit transfer, continuing education.

#### Introduction

New types of credentials (cf. micro-credentials, badges) beyond mainstream credentials as diplomas are, give new impetus to global education and impact knowledge and skills accreditation and recognition at Higher Education systems. In the European Union, policies on digital credentials are paving the way for emerging models and technologies for formal and non-formal learning, with the ambition of embracing vocational, university, and lifelong learning contexts (European Commission, 2020; ECIU, 2021). Further developments are expected to ease the adoption of common frameworks of reference in the diverse landscape of qualification types, especially in the field of the so-called micro-credentials, understood as "proof(s) of the learning outcomes that a learner has acquired following a short learning experience. These learning outcomes have been assessed against transparent standards" (European Commission, 2020, p.10).

This short presentation contributes to the discussion on new methods of credit recognition beyond mainstream credits (mostly diplomas) that are deployed by HEIs. The origin of this study is the collaborative project BlockAdemic (Development of a Distributed Digital Data Security Platform with Blockchain support for Certification of Education Activities and Higher Education Degrees, <a href="https://blockademic.iti.gr/en">https://blockademic.iti.gr/en</a>). This 2020-2022 project funded by the European Regional Development Fund of the European Union and Greek national funds, aims to create a digital distributed cybersecurity system for the certification and verification of educational activities, qualifications, and skills in the field of higher education and lifelong learning, creating an inviolable educational passport.

Part of the BlockAdemic project is the current study carried out between January and April 2021. The aim is to map a range of practices currently implemented on credential recognition methods adopted by European universities. This presentation corresponds to the beginning of the study, which will be further extended in later stages, thus the current presentation is only indicative and presents a glimpse of the more elaborate analysis to come. From a methodological point of view, we conducted desktop research by randomly selecting practices based on the following criteria: a) they were deployed by HEIs, b) they offered credit recognition practices for credits other than diplomas, c) they were ongoing in 2021 and d) they shared sufficient information publicly about the practice. This first stage of desktop research led us to the identification of 18 random practices deployed by the institutions listed below.

Table 1: List of randomly chosen HEIs adopting micro-credentials

1	Anadolu Universitetsi Akadema	10	Open University Future Learn
2	E-learning EKPA	11	OpenHPI
3	Edward Jenner Leadership Future Learn	12	OpenSAP
4	edX MicroBachelors	13	UNED Abierta

5	European Schoolnet Academy	14	UNINETTUNO OpenupEd
6	EUTEMPE Net Technical University of Varna	15	Universite de Paris FUN MOOC
7	Institut Pasteur FUN MOOC	16	University of Edinburgh edX MicroMasters
8	Miríadax CertJoin	17	University of Modena EduOpen
9	Open Universiteit Professional Program	18	University of Osnabrück iversity

The second stage of the study corresponded to the analysis of each practice against six parameters. These are: i) types of certification, ii) credit frameworks, iii) credit acquisition processes based on course duration, assessment forms, and conditions to be met iv) quality accreditation, v) data storage software(s), and vi) Learning Management System (LMS) used. This presentation deals with three out of the six aforementioned parameters, which are:

- The certification types awarded to learners
- The credit transfer or accumulation framework adopted
- The number and type of quality accreditations acquired by each course or platform

#### 1. Certification methods

At least nine types of broader assorted certification categories have been recognised in the listed case studies (Figure 1). These are a badge, certificate, confirmation of participation, record of achievement, supplement, diploma, award, honour, and additional types. They reflect the diversity of certification methods applied within micro-learning programmes. Further nuances are expressed within each category, i.e. 8 out of the 14 records in the "certificate" category are expressed through various designations, i.e. "qualified certificate", "verified certificate", "course completion certificate" and more (apparent in the interactive web view of the graph we make available at <a href="http://bit.ly/certification-methods">http://bit.ly/certification-methods</a>). Emerging standard-setting initiatives, such as the Common Microcredential Framework (CMF) aim to make these micro-credentials stackable, standardised, and transferable across higher education systems at a European and global level.

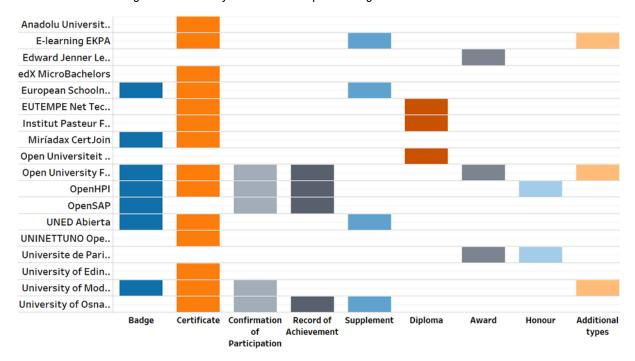


Figure 1. Variation of certification types – 9 broadly defined categories of certifications issued within the 18 selected programmes. An insight into the variety of designations within each category is provided through the interactive data visualisation at <a href="http://bit.ly/certification-methods">http://bit.ly/certification-methods</a> (legend tooltip with information appears on hovering over the coloured blocks).

#### 2. Credit transfer and accumulation

A provisional categorisation of frameworks for awarding credits brings forth a heterogeneous composition; at least one type of credits is issued by each programme, spanning from transferable and more broadly recognised

credit systems (cf. ECTS, CFU), discipline-specific ones (cf. CME), and credits validated within the boundary of local authority bodies and governing regions (cf. UK and US credits, official credit recognition of continuing education for educators residing in Madrid, Castile and León (Spain) or Portugal), to credits transferred between partnering micro-credential programmes and higher education institutions (cf. edX MicroMaster credits are recognised as academic credits by the Rochester Institute of Technology, while edX MicroBachelor credits by the Thomas Edison State University). In three cases vocational qualifications are recognised through the ECVET (European credit system for vocational education and training), the CPD (Continuing Professional Development), and as professional credentials. Moreover, a non-transferable point system is applied in one case, using a gamified approach that acknowledges peer to peer interactions and proactive participation across the communication channels and assignments of the programme.

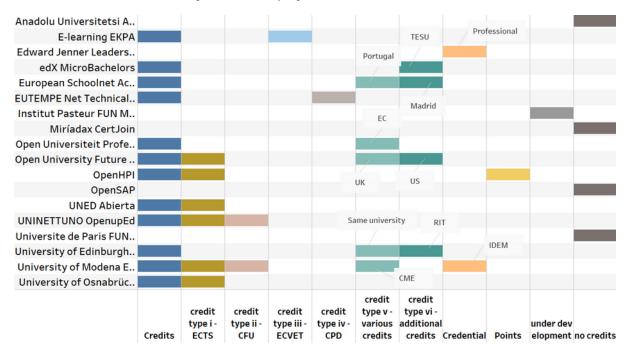


Figure 2. Credit transfer and accumulation framework – Data representation of transferable and non-transferable credit types among the 18 selected case studies (view the interactive data visualisation at <a href="http://bit.ly/credits-transfer-accumulation">http://bit.ly/credits-transfer-accumulation</a>). Legend of figure 2: CFU: Credito Formativo Universitario (Italian official university educational credits), CME: Continuing Medical Education, CPD: Continuing Professional Development, EC: N/A, ECVET: European credit system for vocational education and training, ECTS: European Credit Transfer System, IDEM: IDEntity Management per l'accesso federato (Italy), RIT: Rochester Institute of Technology, TESU: Thomas Edison State University.

#### 3. Quality accreditation

Quality standards offer effective ways to leverage the validity, trustworthiness, and transparency of microcredentials. Quality accreditations included in the analysis refer to standards that can be applied through a stepwise approach and that principally assess the quality of certifications, credits, learning experience, and the openness spectrum of the programme. An aggregated view of quality accreditations (Figure 3) through which the programmes are assessed against various standards, reveals that the majority of the listed case studies (13 out of 18) adhere to one and up to four distinct quality standards, resulting in a sum of 27 accreditations in total for all programmes. The types of quality accreditations are numerous and may be independent of each other. Among others, they include international standards (the International Organisation for Standardisation (ISO)), national ones (the Online Course Certification System (EOCCS), the European Board for Accreditation in Medical Physics (EBAMP), the Common Microcredential Framework (CMF), the OpenupEd Quality Label, the European Qualification Framework (EQF)) or national ones (Framework for Higher Education Qualifications in England, Northern Ireland and Wales (FHEQ).

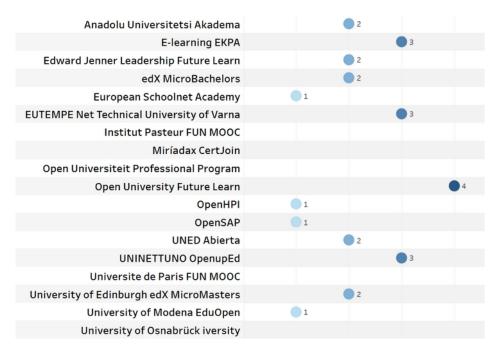


Figure 3. Quality accreditation – Number of quality standards followed by each case study (view interactive data visualisation at <a href="http://bit.ly/quality-accreditation">http://bit.ly/quality-accreditation</a>).

### **Data visualisations**

Data presented in this study are available as interactive data visualisations, cf. three links above (legend tooltip with information appears on hovering over data).

# **Synthesis**

Based on this short-scale analysis we can claim that the three parameters analysed (certification types, credit transfer or accumulation, and quality accreditation of learning programmes) show a wealth of approaches as an indication of a field (micro-learning and micro-credentials) in full development. It is also worth noting the need for more coordinated efforts in the sense of transparency and compatibility between the various standards and methods adopted (ECIU, 2021; Habib & Sanzgiri, 2020). This preliminary study will be further extended to embrace more practices and to test the methodology on a large set of examples.

# Acknowledgements

This study is part of the BlockAdemic project ("Development of a Distributed Digital Data Security Platform with Blockchain support for Certification of Education Activities and Higher Education Degrees", <a href="https://blockademic.iti.gr/en">https://blockademic.iti.gr/en</a>). We would like to thank Sofia Terzi, the technical coordinator of the project, for guidance on the overall design and framing of the study.

# **Funding**

Co-financed by the European Regional Development Fund of the European Union and Greek national funds through the Operational Program Competitiveness, Entrepreneurship, and Innovation, under the call RESEARCH- CREATE - INNOVATE (project code:T2EDK-04180).

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