

INTRODUCTION

The Council of Chief State School Officers (CCSSO) recently convened a wide range of stakeholders through the Certification and Licensure Collective (CLC) to support states to improve certification and licensure systems, including **initial licensure**, **renewal**, and **reciprocity** or teacher mobility. As part of this work, CCSSO joined with [Digital Promise](#) to convene a task force to outline principles to support the design, assessment, and implementation for educator micro-credentials so teachers can expand, validate, and receive recognition for their professional learning journey.

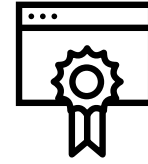
Micro-credentials are gaining momentum as an approach for educators to demonstrate proficiency on a discrete skill or competency to indicate their expertise. Microcredentials are one part of the larger [nested system of professional learning](#) that teachers experience. A micro-credential is a competency-based certification of a discrete skill: an educator earns a micro-credential by submitting evidence verifying that they meet the definition of competence outlined by the entity developing and/or issuing the micro-credential. Similar to degrees/certifications, the assessment of evidence results in a determination to award or deny, with the educator either earning the micro-credential or not. The micro-credential submission process takes place through an online platform, and micro-credentials earned are typically recognized with a “digital badge.”¹ See the diagram on the next page for more information on the micro-credential development process and the process for earning a micro-credential.

Key Term	Description
Developer	The organization(s) or individuals that identify and establish the expected knowledge and skills to be recognized through the micro-credential (often the same entity as the issuer)
Earners	The individual who submits evidence demonstrating their learning competency in order to earn a micro-credential.
Assessor	The individual(s) that review evidence submitted by earners and apply criteria to assess and determine each earner’s proficiency
Issuer	The organization(s) or institution(s) that formally award the micro-credential to earners who have successfully met the proficiency criteria (often the same entity as the developer)
Recognizer	The organization(s) or institution(s) that recognize and give currency or value to the micro-credentials and allow them to be used by earners for various purposes

Adapted from Cross-State Collective Inquiry Project: Micro-Credential Quality Criteria, Midwest Comprehensive Center and Great Lakes Comprehensive Center at the American Institutes for Research, 2019

¹ A digital badge is a visual representation of an accomplishment or skill that can be earned in a variety of learning environments.

THE EARNER JOURNEY



Step 1:

The **earner** decides to earn a micro-credential. The **earner** identifies micro-credentials offered by **developers** and selects one to earn. The **earner** takes steps to develop the competency and submits evidence that demonstrates their competency in that area.

Step 2:

The **assessor** reviews evidence against a rubric and makes an award determination to the **issuer**. The **issuer** awards or denies the micro-credential.

Step 3:

Recognizers, including employers, higher education institutions, and others, provide value for the micro-credentials earners have attained.

As states, districts, professional organizations, and other entities develop, or consider developing, systems and policies around the design, assessment, and/or implementation of micro-credentials for educators, it has become clear that some overarching guidance is essential to ensure sufficient quality and consistency. This resource aims to provide that guidance for 1) designing appropriate educator micro-credential content and contours, 2) maintaining adequate criteria for assessing educator micro-credentials, and 3) ensuring the experience of engaging in micro-credentials is relevant and impactful for educators.

The following principles were curated based on the expertise and experiences of organizations participating in the “competency-based professional learning” task force as part of CCSSO’s Certification and Licensure Collective.

DESIGN PRINCIPLES

The design principles were developed to support the development of meaningful micro-credentials. Those who are creating and publishing micro-credential options for educators should consider each of these principles to promote quality in their design.

Non-Technical Design Considerations

- A. **Consistent:** Micro-credentials should include consistent categories for ease of use (including the name of the competency; the key method(s); evidence-based rationale for why the competency is important, including supporting research; suggested and available resources for developing the competency; submission guidelines; and evaluation criteria).
- B. **Evidence-based:** Micro-credentials should capture skills and competencies that are supported by high-quality, peer-reviewed research.
- C. **Contextual:** Micro-credential submissions should capture the authentic learning context in which the educator operates.

- D. **Right-sized and -labeled:** Micro-credentials should cover a substantive yet discrete set of skills that correspond with the demonstrated competency and should be labeled in a way that accurately describes the competency.
- E. **Resourced:** Micro-credentials should be accompanied by relevant, evidence-based, and publicly accessible resources that provide sufficient information, tools, and support for developing the competency.
- F. **Demonstrable:** Micro-credentials should require educators to provide substantive evidence of how they have demonstrated the named skill/competency in their practice in real and varied circumstances, including via a representative sample of students' work, when applicable.
- G. **Reflection-oriented:** Assessment should enhance the learning experience by prompting educators to reflect on their practice of the named skill/competency and the associated evidence submitted.
- H. **Clear and transparent:** As part of the micro-credential design process, issuers should design and publish scoring rubrics that provide detailed expectations for both the earner and the assessor.
- I. **Validity-minded construction:** Artifacts, demonstration(s) of learning, and other components of the evidence required to earn the micro-credential should be relevant and consistent with the desired skill/competency being developed.

Technical Design Considerations

- J. **Shareable:** Micro-credentials should be awarded as digital badges that meet the [Open Badge Standard](#) and contain the relevant metadata,² can be visually displayed, and are portable across technical platforms.

ASSESSMENT PRINCIPLES

The assessment principles were developed to support valid and reliable micro-credential assessment. Those who are designing content, assessing micro-credential evidence, issuing micro-credentials, and recognizing/providing value for micro-credentials earned by educators should consider each of these principles to support transparency between issuers, assessors, recognizers, and earners.

- K. **Competency-based:** Assessment should be based on the evidence that was submitted as proof of demonstrating the targeted competency based on the rubric, not the time it took to learn or demonstrate the skill.
- L. **Tailored assessment:** Assessment criteria and rubrics should be tailored to align with the specific competency, not based on a generic rubric.

² Metadata refers to information about the earner's skills and achievements such as the micro-credential name, date issued, evidence required, assessment criteria, etc.

- M. **Targeted feedback:** Assessors should provide feedback aligned with the published rubric so the educator can learn and grow from the micro-credentialing attempt, regardless of the issuing decision.
- N. **Qualified assessors:** Assessors should 1) be trained in and understand the competency and its required submission components and associated rubric, 2) make objective decisions, and 3) have no conflict of interest in the issuing decision.
- O. **Reliable assessors:** Issuers should establish and periodically review validity and reliability of assessors' ratings to ensure quality and consistency of scoring.

IMPLEMENTATION PRINCIPLES

The implementation principles were developed to support appropriate use of micro-credentials for educators. Those who are supporting and/or recognizing educator professional growth and advancement should consider each of these principles in support of a competency-based approach to professional learning and pathways, as should the educators selecting micro-credentials to earn.

- P. **Vertically Aligned:** Micro-credentials should be clustered with related skills, sequential when appropriate, and stackable to communicate the development of a family of skills.
- Q. **Goal-driven:** Selection of micro-credentials should be informed by an educator's individual professional needs or goals and state, district, or school needs or goals.
- R. **Collaborative:** The implementation and resulting educator learning experience should promote collaboration and interaction with colleagues (including through feedback loops and reflections).
- S. **Currency:** Formal incentives should be established so that "stacks" of high-quality micro-credentials can provide value to the earner, such that consistent demonstration of competency in a given topic area or toward a specified goal is formally recognized as part of licensure, relicensure, career advancement, and/or compensation policies.
- T. **Supported with Policies:** Policies and structures should be in place that support the integration of high-quality micro-credentials as a component of professional pathways, including through communication, implementation, and monitoring supports.

ADDITIONAL CONSIDERATIONS

We believe that adherence to these principles will help ensure greater consistency, relevance, and rigor among micro-credential offerings. However, as the field continues to evolve and new learnings surface from the application of micro-credentials for educators, it will likely be necessary to revisit and revise these principles. We also recognize that, as with most sets of standards, much room for interpretation still exists within them. As a result, the field likely needs more detailed “best practices,” along with a process for external validation and oversight. One way to address this is for micro-credentials to be reviewed by a qualified, objective third party³ to ensure alignment with these design, assessment, and implementation principles.

ACKNOWLEDGEMENTS

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- **American Institutes for Research**
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- **Getting Smart**
- **Kentucky Valley Educational Cooperative**
- **Learning Forward**
- **National Education Association**
- **New America, Education Policy Program**
- **Tennessee Department of Education**
- **Western Governors University, Teachers College**
- **William and Ida Friday Institute for Educational Innovation at NC State University**



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³ A qualified, objective third party is an entity known in the field as having and employing evidence-based expertise in the specific content area (e.g., based on published work or track record of successful implementation) and having no vested interest in earners’ pursuits of or outcomes from the micro-credential.



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