

**HOT TOPICS:**  
**Assessment of Online Programs and Micro-credentials**  
Facilitator Notes and Incomplete Bibliography  
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Micro-credentials and badges will be focus—online programs seem to have some internal standards for quality control—or at least institutions are getting more confident with available approaches.

Introductions and brief history

Examples of current uses:

- Girl/Boy Scouts (this also illustrates that badges on the same topic can be done at multiple levels)
- Military approach for ensuring that folks know specific skills (like how to fly)
- College preparatory work for students starting at community colleges
- Leadership skills/ extracurricular
- Competency-based education (Example: MS program in computer Science)

How suitable is the largely undergraduate model for graduate level education and preparation? Where do these things fit in an institution's current repertoire of undergraduate and graduate offerings?

Do they belong on the transcript (have to coordinate with Registrar)? Or in a cloud-based portfolio? This depends at least in part on the 'type' of badging program or micro-credential.. The worlds of micro-credentials, and badges specifically, seem to vary in their main function and audience. Examples given range from no-credit professional development badges to course-driven, credit associated badges or micro-credentials.

For example, how would a badge process would work for the basic or biomedical sciences? A badge for being able to design primers and run PCR? A badge for cell/tissue culture? A badge for scientific writing? A badge for a particular type of coding or technology (R programming? Block Chain?)? Scientific communication? The range in these topics highlights the dual purposes that institutions are using micro-credentials for – soft skills, professional development or hard skills, discipline focused.

Badges—multiple vendors out there... various platforms (which one will last?). QA/QC—who develops? What if done by a vendor? Who assesses the content? And not only does have to assess the quality of the curriculum design and expected competencies -- but have to consider who will be assessing the student...

There was discussion regarding the concept of 'stacking' badges together toward another credential. Practice varies, with some institutions anticipating students earning badges that contribute to the master's degree, but others strongly objecting to practice that could lead to a 'backdoor' to the master's degree.

General questions that require further consideration:

What purpose do these modalities serve? What should assessment focus on? Do these modalities provide real and unique value to students – how? What metrics are needed to demonstrate that a program serves students with intended impacts?

In the micro-credentialing space, there appear to be dual purposes – demonstration of competence and actual learning. What are the relative merits and challenges of these two goals?

How do front end design efforts translate into meaningful assessment? What role should faculty play in assessment? This is a key link, whether working with a vendor or not – meaningful assessment must be linked to strong initial program design. Throughout the design process, assessment should be developed hand in hand, with both spaces focused on providing value to the student.

What are some examples at your institutions of programs that are deemed ‘successful’, and which metrics do you use to demonstrate success? Conversely, can anyone share examples of initiatives in this space that have failed or been discontinued? Any lessons learned? What are key timeline issues? How much of this may ultimately turn out to be ‘flash in the pan’?

### **An Incomplete Bibliography**

Scouting badges the badges are series of tasks to help you establish competency in a specific area... Except that the topics are very different than when we were in Girl Scouts!

[https://www.girlscouts.org/en/our-program/badges/badge\\_explorer.html](https://www.girlscouts.org/en/our-program/badges/badge_explorer.html)

The concept is used in multiple ways for undergraduates.... either to pre-admission prep work OR small accomplishments along the way to keep students motivated..... <https://www.ccp.edu/guided-pathways/micro-credentials> <https://www.onlineschoolscenter.com/micro-credentials/>

This outlines how one school has implemented such programs-- plus, explains the origin of the term micro-credential.... <https://education.depaul.edu/about/alumni-professional-partners/newsletter/spring2018/Pages/micro-credentials.aspx>

This report has a lot of background info and also current opinions about platforms, etc (NSF workshop on micro-credentials) <https://www.si.umich.edu/system/files/content/downloads/Micro-Credentials%20In%20Admissions%20Report.pdf>

Example of earning "stackable" micro-credentials -----> MS degree in machine learning [https://www.northeastern.edu/bayarea/academic\\_program/micro-credentials/](https://www.northeastern.edu/bayarea/academic_program/micro-credentials/)

Science Technology leadership program-- micro credentials-- graduate certificates, MS degrees <https://education.uky.edu/school-technology-leadership-program-offers-microcredentials-graduate-certificates-masters-degrees/>

May 2018 University of Michigan School of Information: NSF-funded workshop on the promise and pitfalls of digital badges in the admissions process. <https://www.si.umich.edu/news/digital-badges-college-admissions-may-not-be-far-work-remains>

Open badges/ recognition/ credit. <https://www.open.edu/openlearncreate/mod/page/view.php?id=130595>  
[www.digitalpromise.org](http://www.digitalpromise.org)

Badge creation guidelines: Penn State University <http://sites.psu.edu/badges/wp-content/uploads/sites/4454/2015/04/BadgeDesignGuidelines.pdf>

IMS Global Learning consortium—merger of two main commercial badging process <https://www.imsglobal.org/activity/digital-badges>