

**The University Senate of Michigan Technological University
Proposal 35-21**

**“Proposal to Establish Guidelines for Accelerated Graduate Certificates at Michigan
Technological University”**

**Submitted by:
Graduate School**

1. Proposal Date: October 13, 2020

2. Proposed Name for Policy: Accelerated Graduate Certificates

3. Proposing Contacts and Departments: Jacque Smith, Director of Graduate School Operations and Enrollment Services

4. Goals of the Proposed Policy:

To develop a flexible policy framework that will allow individual departments/programs to offer an integrated bachelor’s/graduate certificate program that meets the needs of their students, faculty, and academic disciplines. The proposed policy will allow students to apply a limited number of credits towards both the bachelor’s degree and the graduate certificate. With the current development of numerous nine credit graduate certificates and the ability to potentially double-count credits, the Graduate School hopes to attract outstanding Michigan Tech bachelor’s students into our graduate certificate programs and then potentially on to our master’s programs. Since many of the graduate certificates are available online, students have the ability to continue as on campus students or leave the area and pursue the certificate in an online environment. This flexibility will allow students to be able to pursue career paths and complete advanced educational credentials at the same time.

5. Policy Guidelines:

This proposal addresses the “accelerated” part of accelerated certificates. All other policies and procedures for graduate certificates fall under the current Senate policy. (411.1 as of September 2020.)

For Programs

- Any certificate can be earned as an accelerated certificate. The Graduate School will ensure that the plan conforms to this policy and will make information about programs

available to the Graduate Faculty Council and the University Senate and will advertise the programs on the Graduate School website.

- Recommended curricula for accelerated certificate programs can allow students to apply up to 3 of the credits earned while an undergraduate to both their bachelor's degree and graduate certificate.
- Only students who intend to complete both their bachelor's and graduate certificate at Michigan Tech can enroll in an accelerated graduate certificate program.

For Students

- In order to be formally accepted into an accelerated graduate certificate program students must apply to and be accepted into the Graduate School at Michigan Tech. Applications will be reviewed according to their normal procedure.
- Students can apply for admission to an accelerated graduate certificate program at any time after they attain junior-level class standing and up to two years after they are awarded their bachelor's degree.
- Only students with a cumulative undergraduate GPA upon graduation of 2.75 or above are eligible to enter an accelerated graduate certificate program.
- A student can earn a maximum of two accelerated certificates. For example, two three credit classes could be double counted towards the undergraduate degree and two different certificates. In the case where a single three credit class is used as part of the undergraduate degree and is used to satisfy requirements for two certificates, that would count as two accelerated certificates.

For University Administration

- Students will be considered undergraduates for the purposes of financial aid, tuition, and class standing until their undergraduate degree has been awarded.
- Once students are awarded their undergraduate degree, they will be considered graduate students for the purposes of financial aid, and tuition.
- Prior to completion of the graduate certificate, students must indicate on their graduate certificate degree schedule the course being used for their undergraduate degree (if any are allowed by the program) and the credits that should be applied to both their bachelor's degree and graduate certificate.

6. Financial Analysis:

During the fall 2019-2020 recruiting period a total of 4 students who received a bachelor's degree from Michigan Tech applied to our graduate certificate programs and one student was

accepted. Fall 2018-2019 also resulted in one accepted graduate certificate student from Michigan Tech. These are extremely small numbers considering that 768 bachelor's degrees were awarded in the spring 2020 semester and 753 spring 2019.

With recent changes allowing graduate certificates to be at the nine credit level, available in online formats and the possibility to double count 3 credits, the Graduate School believes that this will incentivize students to consider completing an advanced educational credential and stay connected to Michigan Tech beyond their bachelor's degree. Michigan Tech has already proven at the master's level that accelerated programs are a tool for engaging students and enrollment growth.

At our current level of conversion of Michigan Tech bachelor's students to graduate certificate students, the financial cost of accelerated certificates would be miniscule. The cost would be 3 credit hours graduate level tuition per year. The Graduate School is looking to increase enrollments into certificate programs with an incentive of double counting 3 credits and new 9 credit certificate programs. This does mean that we are losing out on a third of the certificate tuition, but we have the potential for increased enrollments, revenue, and the granting of additional graduate level credentials - having Michigan Tech students paying for 6 credit hours of tuition and then receiving a graduate level educational credential is better than not having students in certificate programs. Through marketing, ability to double count credits and new programs the Graduate School hopes to enroll 2% of the students graduating with bachelor's degrees. If bachelor's graduate rates are comparable for previous years, that would be approximately 15 students for fall 2021. Having 15 additional students each paying for 6 credits of graduate level tuition (currently \$1,285 per credit) would result in \$115,650 of additional revenue the university is currently not receiving. We hope that once the students are successfully through the certificate program that they will consider utilizing the earned credits towards a master's degree at Michigan Tech. It must be noted that the Registrar's policy on Senior Rule states that the total number of Senior Rule credits may not exceed one-third of the required non-research course credits. This means a student could also utilize 3 Senior Rule credits along with 3 double-counted credits towards their graduate certificate. The proposed accelerated certificate policy is intended to make it more likely for students to continue their graduate education here at Michigan Tech.

7. Benchmarking

Many institutions have graduate certificate programs that have components that align with portions of this policy. Where this policy is unique is that it allows students to pursue accelerated graduate certificates while being undergraduates. From a benchmarking standpoint little information is available. The following links have some relevant information.

University of Michigan

[\(https://rackham.umich.edu/navigating-your-degree/certificate-program-information/\)](https://rackham.umich.edu/navigating-your-degree/certificate-program-information/)

University of Wisconsin Milwaukee (2.75 GPA requirement)

<https://uwm.edu/graduateschool/certificate-admission/>

University of Arizona

<https://grad.arizona.edu/gsas/degree-requirements/certificate#credit-requirements>

Supplementary information

Currently Michigan Tech has 13 graduate certificates available. Several of these certificates are at the 15 credit level and have seen minimal enrollments. These certificates will be reviewed for the possibility of conversion to 9 credit certificates.

Currently approved (9 Credit) graduate certificates:

Accounting Analytics

Applied Statistics

Artificial Intelligence in Healthcare

Data Science Foundations

Forensic Accounting

Security and Privacy in Healthcare

The College of Engineering has proposed 18 new (9 credit) graduate certificates which are in the review process for possible approval. All of the proposed certificates will be available to students in an online format. A listing of the proposed graduate certificates follow:

Structural Engineering: Advanced Analysis

Structural Engineering: Building Design

Structural Engineering: Bridge Analysis

Structural Engineering: Hazard Analysis

Structural engineering: Timber Building Design

Geoinformatics

Natural Hazards and Disaster Risk Reduction

Aerodynamics

Computational Fluid Dynamics

Dynamic Systems

Quality Engineering
Vehicle Dynamics
Medical Devices & Technologies
Fundamentals of Material Engineering
Computational Material Science
Sustainable Pavement Design & Construction
Resilient Water Infrastructure
Water Resources Modeling

If approved these certificates all have the potential to be accelerated for our own undergraduate students, allowing them to take the next step of receiving graduate level credentials and possibly going on to using their certificate coursework towards a Michigan Tech master's degree.