

Colorado School of Mines – GRADUATE COUNCIL MEETING AGENDA
 April 3, 2024, 4:00 – 5:00 pm, via Zoom

Attendees:

Voting Members: 24 total (16 - majority needed for quorum). Quorum was present.

P	Soutir Bandyopadhyay (Chair)	P	Danielle Ostendorf (LB)	P	Andy Osborne (NSE)	P	Owen Hildreth (ME)
p	Adrienne Marshall (HSE)	P	Bettina Voelker (CH)	P	Jaeheon Lee (MN)	P	Jared Carbone (EB)
P	Eileen Martin for Yaoguo Li (GP)		Juan Lucena (EDS)		Jim Ranville (GC)	P	Pejman Tahmasebi (PE)
	Suveen Mathaudhu (MME)	P	Nikki Farnsworth (CBE)	P	Ryan Venturelli (GE)	p	Dong Chen (CS)
P	Adrienne C. Kroepsh (HASS)	P	Yamuna Phal (EE)	p	Rena Zhu (GSG)	P	Samy Wu Fung (AMS)
		p	Lori Tunstall (CEE)	P	Gabriel Walton (UCTE)		Uwe Greife (PH)

Other Regular Attendees and Guests

P	Tim Barbari (OGS)		Carolyn Freedman (OGS)		Jenny Briggs (OGS)		Vibhuti Dave (UG)
	Wendy Adams (HNRS)	P	D. Scott Heath (RO)	p	Paul Myskiw (RO)		Roxane Aungst (OGS)
P	Sam Spiegel (Mines Online)		Suzanne Beach (Payne)		Jen Gagne (Grad Admissions)		Valerie Holt (AES)
	Jon Johnson (Mines Online)		Atef Elsherbeni (EE)		Richard Krahenbuhl (GP)	P	Kristeen Serracino (AA)
P	Colin Schneider (RO)	p	Cadi Gillette (IGP)				

Special Guest(s): Rob Braun, Scot Allen, Erin McCaffrey

Welcome

Soutir Bandyopadhyay

Briefings and Information Items

Office of Graduate Studies

Tim Barbari

T. Barbari reminded the council that it is crunch time for the 2024-2025 catalog production with 2-3 weeks remaining. About one third of the departments or programs have submitted their pages with the reflected changes around the 400-level courses. He will be reaching out to everyone via email who has not done so with a completed version to approve or the option to complete on their own. The email will also include a spreadsheet with a column for 500-level cross-listings. These will run through the consent agenda of the council over the remainder of the semester and get expedited to the catalog without having to submit through the formal CIM process.

Registrar's Office

Paul Myskiw

P. Myskiw reminded the council that this week is registration week. The Registrar's Office is registering juniors currently and will move to sophomores and freshmen next. There have been no unexpected issues. For fall registration, a waitlist of 20 has been implemented for every undergraduate course. There has been some slight confusion from students and faculty, but for the most part, everything is working as expected. The migration to the Cloud with the student information system was scheduled to go live at the end of May. However, the decision has been made between the vendor and ITS that it will be postponed till September. Instead, changes that occurred last year with the federal financial aid application are taking priority over this project to ensure there are no disruptions to the campus when the migration takes place.

Graduate Student Government

Rena Zhu

R. Zhu announced that GSG is hosting the research symposium right now in the Student Center. It is going very well, and this is the first time the GRADS has gone beyond Mines. Additional upcoming events include town hall and faculty/staff appreciation. Once more details are available, R. Zhu will provide them to S. Bandyopadhyay and K. Serracino to distribute to the council.

R. Zhu also mentioned an email received from an ETM student inquiring about graduate student registration occurring after undergraduate student registration and asked P. Myskiw for clarification. P. Myskiw added that as 400-level courses are removed from graduate curriculum, this will shift graduate and undergraduate (senior) registration to the same time so that 400-level courses can fill up. P. Myskiw sent an email to all DHs to review enrollment and increase capacity to address this issue of a growing campus.

Announcement – Handbook 10.1 Policy

Soutir Bandyopadhyay

All council members were sent information regarding the Handbook policy changes for Item 10.1 and the online IP policy. S. Bandyopadhyay requested that everyone review those and if there are any concerns, please forward them by Friday as he is preparing a report for the Handbook Committee to present to the Faculty Senate.

Graduate Tuition Model

Tim Barbari

The working group is seeking graduate council to approve the graduate tuition policy to a per credit model. As an overview, in mid-fall semester of 2022, a committee was created to form a model that would generate more revenue if the price point was lowered for non-thesis master's students and resolve the inequity issues that arose from the plateau tuition between full-time and part-time students. By shifting to a per credit model, this would allow a 15% to 20% reduction in the per credit rate which establishes a more competitive full-time rate (full-time means 9 credit hours) and eliminate the lack of revenue generated due to the current plateau effect (free credits between 9 and 15 credits). Currently, online programs are already using the per credit model so this change would additionally provide more continuity and marketing opportunities with the ability to switch modalities. The exec team pushed this idea in fall '22/spring '23 with the plan to present it to the Financial Committee of the Board of Trustees during the current academic year and implement it in fall '24.

A question that arose was how this tuition model would impact the combined program. There will be ups and downs for the combined program as students in this program may still have to pay more

based on the number of remaining credits. However, with the per credit model there would be a 5% savings for a 30-credit hour degree which makes the MSNT programs more financially attractive and should drive up enrollment (in theory).

An additional concern is that the tuition cost would go up for PhD students on grants and contract if over 9 credit hours. The working group worked on a solution to this issue by reducing the per credit price for grants and contracts to \$700 per credit (in lieu of \$910 per credit) and eliminate reduced registration (everyone registers for 9-10 credit hours per semester over the life of a PhD student). Feedback has been received that the cost of a student to the grant in the old model is too expensive and even in collaborative efforts, Mines is losing opportunities because of a high grant budget.

Graduate Council input is needed in how to grandfather students who are already on reduced registration or those who are not quite there but have already paid in the older system. The policy change for the new tuition model says that after a certain number of credits have been completed, students may register for the 1-credit 709 course (Graduate Thesis/Dissertation) and be considered full-time. For PhD students, the research proposal must also be on file.

- **Question:** S. Bandyopadhyay asked if the policy change has already been approved or does it still need GC voting?
- **Answer:** T. Barbari answered that the decision to go a per credit pricing structure was made year ago by the leadership team, but we are now looking for ways to implement and what kind of policy do we need to have approved.
- **Question:** O. Hildreth asked if a student graduates in four years, what is the cost? Does it cost more or less?
- **Answer:** T. Barbari answered that 5 years was used because that is the average time of completion, but we can look at pricing structures in increments of years.
- **Question:** How does the grandfathering work on the money side especially for those who have already paid a couple of years?
- **Answer:** Chris is currently looking into that aspect of it. For those students who have paid into the system at a higher rate, the 9 credits will cost less but we might have to subsidize further. That calculation still needs to be made and will be the last thing on the implementation to avoid financial harm as we switch over to the new model.

Handbook 10.3 Policy for Research Integrity

Scot Allen
Erin McCaffrey

Handbook item 10.3 includes the policy for research integrity that applies to all researchers on campus. The current version did not adequately address potential misconduct by students, research faculty, postdocs, or research associates. There was also no language on the interplay between academic and research misconduct. Because Mines accepts federal money, it must follow federal requirements which change relatively frequently. Currently, the policy for research integrity in the Faculty Handbook includes a longer section that is the procedures for implantation. RTT is recommending that the policy for research integrity stay in the Handbook, but move the detailed procedures to the Policy Library, which is maintained by the Office of Compliance, Policy & Risk Management. RTT and the Research Council have established a partnership to ensure input

from faculty and other stakeholders on any revisions. RTT also recommends allowing membership on inquiry or investigation committees that represent the status of the respondent.

Adjourn

Next meeting: April 17, 2024, 4:00-5:00 via Zoom. Please send all agenda items to Soutir Bandyopadhyay (sbandyopadhyay@mines.edu) and Kristeen Serracino (kristeen.serracino@mines.edu) 1 week in advance

Consent Agenda The following proposals will not be discussed unless specifically requested by the Council. Please review the following items. With no objections, approval is implied, and items will be processed accordingly.

2.1 NUCLEAR ENGINEERING Andy Osborne
[CIM 3/11]
1 program change: MEMSPHD-NUAS/NUEG: ME, MS &
PHD IN NUCLEAR ENGINEERING

Eliminate 400-level Physics class from counting towards credit for fulfilling core elective requirements for compliance with HLC policy.

2.2 ECONOMICS AND BUSINESS Jared Carbone
[CIM 3/15]
1 program change: MS-ETMT: MS IN ENGINEERING AND
TECHNOLOGY MANAGEMENT (ETM)

OGS has requested that 400-level courses no longer count toward MS degree requirements for 4+1 programs. We propose deleting language from the ETM portion of the graduate catalog that permits credit for 400-level courses and the associated list of courses. We are also adding 2 new courses (EBGN527 and EBGN529) to the list of ETM electives in the Engineering Management and Analytic Methods section.

2.3 COMPUTER SCIENCE Dong Chen
[CIM 3/21]
2 new courses: DSCI503: ADVANCED DATA SCIENCE

We are upgrading the current DSCI 403 course; previous syllabus attached (both face-to-face and online) to have a 500-level designation and a requirement for a deeper dive and more complex thinking than the previous course. This supports the Mines@150 mission through the interdisciplinary nature of the data science program, certificates, and graduate students.

Specifically, by "expanding our offerings and diversifying delivery, in particular for professionally oriented pre and post graduate education". For the online comments:

- I have finished the EFOL in 2019 and created now 3 online courses.*
- The course will be developed during the Summer 2024.*
- The course will run the 1st 8 weeks of Fall 2024 semester.*

When I travel abroad, I teach my Data Science course, this is why I checked that box. NOTE: In the syllabus, the time is approximate, the concepts are interweaved, while still following the data-science pipeline. The semester project starts mid-semester and goes until the end where they will present their results with a professionally formatted paper or poster, and a presentation to the class (video for the online students).

[CIM 3/23]

DSCI570: INTRODUCTION TO
MACHINE LEARNING

We are upgrading the current DSCI 470 course; previous syllabus attached (both face-to-face and online) to have a 500-level designation and a requirement for a deeper dive and more complex thinking than the current DSCI 470 course. Adding the verbiage: graduate students must complete a more challenging project that utilizes complex machine learning algorithms, requiring a deeper understanding of machine learning approaches and critical thinking. This supports the Mines@150 mission through the interdisciplinary nature of the data science program, certificates, and graduate students. Specifically, by "expanding our offerings and diversify delivery, in particular for professionally oriented pre and post graduate education". For the online comments:

- I took the Trefny Foundations of Course Design Summer of 2022.*
- The existing OL course will be utilized and will be updated during Summer 2024 to include the extra project - all other content will remain as is.*
- The course will run the 2nd 8 weeks of Fall 2024 semester.*

NOTE: In the syllabus, the time is approximate, the concepts are interweaved, while still following the machine learning pipeline.

2.4 PETROLEUM ENGINEERING

Pejman Tahmasebi

[CIM 3/25]

1 course change:

PEGN681: PETROLEUM
ENGINEERING SEMINAR

This course is designed to encourage the active participation of our graduate students in seminars. In some instances, students also present their research as they are completing their graduate studies. Therefore, every Ph.D. student must register for PEGN681 as a 0-credit course and receive a grade of PRG. After the student's public research presentation and thesis defense are both complete, the grade of PRG is then converted to a letter grade (i.e., 1-credit course).

2.5 MECHANICAL

Cadi Gillette

[CIM 3/26]

2 program change:

MS-ADD-NT: MSNT IN ADDITIVE
MANUFACTURING

Updated course list to align with university policy regarding 400-level courses.

XCRTG-ADD: GRAD CERT IN
ADDITIVE MANUFACTURING

Removed 400-level course to align with the university's policy.

2.6 AMS

Samy Wu Fung

[CIM 3/26]

1 program change:

MSPHD-AMS: MS & PHD IN APPLIED
MATH & STATISTICS

Editing program to remove 400 electives under new policy.