

IAF SPACE EDUCATION AND OUTREACH SYMPOSIUM (E1)
In Orbit - Postgraduate Space Education (4)

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BREADTH & CIRCUSES: EFFORTS TO DISCOVER EFFECTIVE AND MEANINGFUL HYBRID
ONLINE EDUCATION**Abstract**

Designing courses to appeal to post-graduate students is a challenging task, made all the more difficult by incorporating high-impact practices (HIPs) that suit the task at hand. In space education, this challenge is amplified by the enormous diversity of topical areas in which courses can be offered. Some programs resolve this dilemma by adapting the program to the student, rather than the student to the program. This presentation aims to demonstrate examples of courses in a hybrid graduate & post-graduate program, with both synchronous and asynchronous elements, and with a mixed status student body (i.e., both M.S. and PhD students attending together in the same courses). At times, such an arrangement can feel more like a circus than graduate or post-graduate education, but there are workarounds for unique situations. Specifically, the presentation will draw from two courses offered in the Department of Space Studies at the University of North Dakota, and will reveal both successful models for student learning, and also some obstinate difficulties yet to be solved. The program these students are attending requires students from various walks of life (space engineers, school teachers, prospective academics, etc.) to take coursework from a myriad of socially and technically focused education in order to ensure educational breadth, with classes ranging from traditional lectures, to seminars, to active learning efforts. As exemplar courses, the presentation will describe the methodology and high-impact practices associated with classwork in a group-oriented Capstone class, and an individual-based research Space Law course. The methods by which online and on-campus students interact, connect, and work cooperatively are also examined.