# Chapter 19 Improve the Flipped Classroom with Universal Design for Learning

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# **ABSTRACT**

The flipped-classroom approach has been adopted widely across higher education. Some faculty members have moved away from it because of the perceived workload required in order to implement a full course "flip." Faculty members can adopt the three principles of Universal Design for Learning (UDL) in order to reduce their own workload and make their flipped-classroom content and interactions more engaging, meaningful, and accessible for students. Adopting both the classroom flip and UDL provides benefits to learners and instructors that go beyond adopting either separately.

# INTRODUCTION

The flipped-classroom model holds the promise of allowing faculty members to be able to focus on higher-order thinking and application of course concepts with students during in-class meetings. While the term "flipped classroom" is relatively new, the concept is not. Faculty members at colleges and universities have been experimenting with the idea of "the inverted classroom" since 2000 (see Lage, Platt, & Tregalia), but there are still different interpretations and definitions, especially since 2007 when the term "flipped classroom" was coined (Noonoo, 2012). In this chapter, the authors will suggest a three-part solution that helps faculty members to create robust and engaging flipped classrooms across the higher-education curriculum to improve learning, encourage engagement, and enhance access to learning interactions for all learners.

As scholars continue to analyze the different models and definitions for the flipped classroom model, educators are eager to learn more and to assess the value of the approach for student learning. Research

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has shown that the flipped classroom model improves student achievement of learning outcomes and increases student engagement (see Roach, 2014; Deslauriers, Schelew, & Weiman, 2011; Moravec, Williams, Aguilar-Roca & O'Dowd, 2010; and Shaver, 2010). However, faculty experiences with the model vary, based on how the flipped classroom is defined and implemented. For example, the following case shows how one definition can result in negative experiences for both faculty members and students.

In 2012, Dr. Barbi Honeycutt visited a campus to facilitate a faculty-development workshop focused on the flipped classroom. As she was arranging her materials, distributing handouts, and organizing her work space, a faculty member came into the room, introduced himself, and said, "I flipped all of my lectures last semester for my 300-level course. I recorded all three lectures a week for the entire semester."

Dr. Honeycutt smiled politely and asked, "Oh, you did? So how did that work out for you?" She suspected what was coming next, but let the faculty member share his story. He said, "I'm exhausted. My teaching assistant is exhausted. After each recording, we spent about six hours per lecture finishing the editing and uploading files. It took so much time. And I'm not sure it was worth it."

Of course they were exhausted. A three-credit course meets for approximately an hour three times a week over the course of a typical semester. That's a minimum of 45 hours of video-recorded lectures. Add another six hours to each of those one-hour video segments and the whole idea of the flipped classroom seems impossible, especially on top of all of the other responsibilities that faculty members and students have.

Dr. Honeycutt was curious: "Wow, that's a lot of time spent in the recording studio. What kind of feedback did you get from your students?" The faculty member said, "That's the thing. I'm not so sure my students ever watched all of the videos. Very few came to class prepared. I eventually found myself just going back to my routine and delivering the same lectures during class that I had recorded in the videos. I figured that the videos were there if students wanted to re-watch a lecture or if they missed class. I guess I don't see the point of the flipped classroom. It took too much time, and it didn't seem to matter to the students anyway. At least I can say I tried it, but it's probably not something I would do again."

Dr. Tom Tobin and Dr. Honeycutt have heard versions of this record-every-minute story from faculty members in colleges and universities across the world. It is a common misconception about the flipped-classroom model. In a recent article on "The Condensed Classroom" for The Atlantic, Ian Bogost even perpetuates this misunderstanding: "condensed classes actually seem to require more work rather than less ... [T]hey require the creation of elaborate video lectures" (2013).

Faculty adopters nearly always begin with excitement and enthusiasm about the possibilities of the flipped model, especially after hearing from other faculty members about positive changes in their students and even reports of having collaborative fun in the classroom. Some faculty members, however, respond with resistance and hesitance when the words "flipped classroom" are mentioned, for reasons much like those expressed by the faculty member in the case above. It is tempting to want to "dive in head first" and move all of one's content-sharing, lectures, readings, and student self-guided study away from in-classroom time. The most common method for doing this is by recording videos for students to watch—not surprising, since the original "flipped classroom" concept was primarily video-focused (see Noonoo, 2012). In cases like the one described above, three challenges can be addressed to help faculty members to be successful with the flipped approach.

First is the lack of a common definition of what is meant by the term "flipped classroom," and consequently, confusion over how best to apply it. Think of the exhausted instructor who recorded all of his

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