

HESS Supporting Information

Article title: How you teach changes who you reach: understanding the effect of teaching modality on student engagement, content interest, and learning in undergraduate hydrology

Authors: Georgakakos, C., Knighton, J.

Article acceptance date: [Click here to enter a date.](#)

The following Supporting Information is available for this article:

Table S1: Class activity data sheet

Date:

Number of students in class:

[illegible]

Notes:

Table S2: Classroom activity definitions

Activity participant	Activity Code	Definition
Instructor	Lecture	Instructor communicates new content information while students listen and take notes.
	Practice Problem	Instructor gives an example problem to work through together in class
	Problem/assessment Review	Instructor reviews answers to problems already completed by the students on homework or assessments
	Projection	Instructor uses non-slide projection to talk through new content, applications or site specificity (e.g. maps, model interfaces, database websites). Included in student <i>lecture</i> activity when directed to entire class.
	Slides	Instructor uses slides to introduce new content. Included in student <i>lecture</i> activity.
	Whiteboard	Instructor uses the whiteboard to introduce new content. Included in student <i>lecture</i> activity when directed toward the entire class.
Student	Computer	Students work on their own computers either individually or in small groups.
	Group Student Work	Students work together in small groups
	Indiv. Student Work	Students work through tasks individually
	Lecture	Students listen and take notes while instructor lectures
	Student Chatter	Students talk amongst themselves

Table S3: Student Survey Questionnaire

Question Format	Survey Question
Likert-style <i>(Strongly Agree, Agree, Neither Agree or Disagree, Somewhat Agree, Strongly Agree)</i>	1) Please check the box that marks your agreement or disagreement with the following statements : a. This module helped me understand the topic addressed. b. My interest in watershed hydrology increased as a result of this lesson. c. This module excited me about a career in watershed hydrology. d. I would like to learn more in this area of watershed hydrology. e. My group worked together effectively in this module.
Open-ended	2) What was the most interesting part of this module for you? 3) What was the least interesting part of this module for you? 4) If this lesson changed how you think about your future studies/career, please explain. 5) How did your group collaborate effectively in this module? 6) How could your group have improved collaboration in this module?