

Would you need to work harder to earn an A on your biology test or to teach the content on the test to your classmates? If you're like most college students, you admittedly answered you'd work harder to teach the material. And if you stop and ask yourself why that is, you will likely answer with things like, "you really need to know the material to teach it. You really need to think about the questions students might ask. Or it's a lot of pressure to teach in a way that everyone will understand." Approaching your studying in a different way, in a "teach the material" way instead of a "make the grade" way, will be a learning strategy that benefits you throughout your college career.

When students study, they often think that going over their notes or making note cards is an effective way. While there is some content in your courses that can be learned this way, if you change your approach to learning instead, you can recall the information much easier and in a meaningful way. Teaching requires mastery, so if you aim for that level, you can't go wrong with your approach. Bloom's taxonomy is a great tool to use when you are learning. The lower levels of Bloom's, remember and understand, are foundational to your ability to reach the higher levels of apply, analyze, evaluate, and create. Knowing what level you need to operate at is important. But operating at that level is paramount. Here are some strategies to get you to those higher levels. First, use your textbook. Actively preview the material in the chapter, think about questions while you read, and take frequent breaks to summarize the material in your own words. Attend class and take notes. Note taking is a skill that you will get better at with practice, but I encourage you to take your notes by hand. You can type an entire class period verbatim and have no idea what you just wrote. When you write by hand, you're forced to paraphrase and to pay attention to what you're writing. It has meaning. Complete the practice problems in the reading assignment and do your homework. Try to do the homework without the aid of your book, notes, answers in the back of the book, or an internet search. When you rely on these resources instead of yourself, you're not working to improve your level of Bloom's, you're simply operating at the remember level. Homework problems are a great opportunity for you to test yourself, identify your weaknesses, and make adjustments to your learning before you're asked to do it on a test. It's OK to make mistakes. It's much better to make the mistake on your homework when the stakes are low than to make the mistake on the test because you incorrectly thought you understood the material. Spending a few study sessions with others in your class, where you teach the contents to one another, will illustrate to you if you're ready for a test or a quiz or if you still need to put in some learning time. Finally, anticipating questions, creating questions that you could see your teacher asking, is a great way to perform well on your test.

Students tend to confuse studying with learning. A good way to test what you are doing is to wait a couple days after the test and ask yourself if you could take a test now over the same material. If you truly did learn the material, you would be able to. These strategies are ones that will take practice, but in the end will save you time and effort because you did it effectively the first time.