

WHAT IS THE DIFFERENCE BETWEEN COMPUTER ENGINEERING & SOFTWARE ENGINEERING & COMPUTER SCIENCE

Computer Engineering (College of Engineering)

Computer Engineering teaches you about both the hardware and software aspects of computers, and so is a good program to take if you would like a more general understanding of computers. In contrast to the other two programs, Computer Engineering is focused more on the designing and developing of computer systems and how the software interacts with the hardware. So you will be learning about circuits, logic gates, physics, but also programming. Computer Engineering is a lot more hands on too. If you want to learn about how computers work and also learn about programming, then take Computer Engineering.

Software Engineering (College of Engineering)

Software Engineering basically takes Computer Science and combines it with Engineering. It focuses more on the application than theory in comparison with Computer Science, but it still contains science courses due to being offered by the Engineering department. The main focus though is software development and building and maintaining software systems. Software Engineering is a lot less focused on the hardware than Computer Engineering, but in comparison to Computer Science it is more applied and provides a greater emphasis on the developmental process to ensure that programs work as they should and are safe. If you like programming and would like to take more of a hands on approach to it, take Software Engineering.

Computer Science (College of Science) You are NOT an Engineer!

Computer Science is offered by the College of Science as opposed to the other two, and so it involves more math courses and is more theoretical than the engineering programs. This means no courses on circuits, but more on programming and the theory behind it. This means a lot more math. Be prepared. Computer Science does not have courses on circuitry or how the hardware systems work, and has less practical and hands on learning of programming than Software Engineering. So in general, if you like to know more about the algorithms and ideas behind programming, take Computer Science.