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Intro to Computer Science

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Fields Report

In today's society, technology plays a major role. Along with playing a major role, technology is advancing at a very rapid rate. With all these advancements comes a new industry with different degrees and careers. Within the industry of computer science, there are multiple different areas, some include computer science, software engineering, and information technology. Some of the careers in the areas include web development, software development, database administration, computer scientist and the list continues.

Computer Science (CS) is the study of how computers and computer systems work together in their set ecosystem. Computer Science, in the field, requires a strong foundation of math and science but usually, math is utilized more than science. Along with Computer Science comes the study of algorithms and being able to scale these processes. Software engineering and information technology are both subfields of Computer Science and are much more specific. Software Engineering (SE) deals with the creation and management of various programs. Information Technology (IT) deals with the maintenance of software, networks, and computer hardware. Information Technology also deals a lot with the transfer of various data.

One of the biggest fields, if not biggest, in computer science is programming. Most people who get tech-related degrees or seek a tech career end up in a programming position. Programming relates back to CS in ways like having to deal with the study of algorithms and optimization for the user. Networking is also a major field inside of CS and not to mention it is

fairly new too. Networking deals with connecting multiple computer systems among themselves. Many Networking ideas come from theories designed by Computer Scientist. A new and upcoming field inside of computer science is data science. In the field, people help business understand and make use of their various amounts of data. The most common code language used in this field is Python.

The field that I am most desired to enter would be software engineering. I would love to one day, maybe, work in a major tech company like Google or Apple. Until then, with the use of Software Engineering I want to help many other business transitions into a complete technology based era. I personally think, the time of writing and physical documents is almost over and I would love to be a part of the new era where every business is entirely digital making it more productive to get information around as well help cut the cost down for a business overall.

For the most part, Computer Science, Software Engineering and Information Technology are very similar in so many ways, especially to the average computer user. The various field inside of each degree are similar too. Many of the major fields include some form of software development and technology support/maintenance. My desired field, after graduation, is software engineering but it is also the most common but good thing I am not completely committed to that field.