

## **Computer Science and its applications**

Computer science is the study of computer technology, both hardware and software. It is the science that deals with the theory and methods of processing information in digital computers, the design of computer hardware and software, and the applications of computers. Information technology (IT) is the use of any computers, storage, networking and other physical devices, infrastructure and processes to create, process, store, secure and exchange all forms of electronic data, often in the context of a business or other enterprise. Software engineering is the application of a systematic, disciplined, quantifiable approach to the development, operation, and maintenance of software. This field applies the structured approach that is used in engineering to software development, with the stated goal of improving the quality, time and budget efficiency of developing software.

Computer science has various fields in which it is applied. The first is web development. A web developer is a programmer who creates programs and website applications and can create custom code to accommodate a client's needs, developing everything from the site layout to features and functions on the webpage. Web development can be divided into three parts; client-side coding, which is code that executes in a web browser and determines what your clients will see while on your website, server-side coding, which is code that executes on a web server and powers the background mechanics of the website's functionality, and database technologies which helps a website run smoothly.

The second is computer networking. This field covers topics dealing with device interconnection, which could be anything from laying out a home network to linking up military installations. It also deals with resource sharing and creating better protocols for transmitting data in order to create secure connections and reduce network traffic. The third field is computer

programming. Computer programming is simply the process of creating computer programs. It involves activities such as analysis, developing understanding of problems, generating algorithms, and verification of requirements for a program. The ultimate purpose is to find a series of instructions that will automate a specific task or solve a given problem.

The field of computer science that I am mostly interested in is computer programming. This is because it will help me understand programming languages better and as a result, I could be able to analyze problems and turn their solutions into executable programs, which is a huge goal for me. I would like to come up with inventions that will make day-to-day living better for everyone and create programs that will revolutionize our way of living for the betterment of our society.

### References

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