

# Software development

There will be nobody today who has not heard about the word “**software** “. Software is just a prevalent trend of modern world. The life bus is not going to run without software today. Software has a large market today as the whole world is digitized. To be said in brief software is ruling the world today. It is beyond imagination a world without software. In every aspect of life software is playing a vital role that we cannot avoid it and have to go hand to hand to exist in this modern digital world. The world is now full of millions of application softwares with different purposes.

**Software** development is a term which involves a number of activities from development to delivery of software products. A simple term but a long process of activities.

Software development will include –

1. Specification
2. Requirement
3. Planning
4. Designing
5. Programming
6. Testing
7. Debugging and
8. Maintenance

It is not easy to describe software engineering in a sentence. Taking from specification to maintenance the activities carried out through out a software development process every phase has its significant role in final product. Every phase can be described as below.

## **Software Specification:**

A software should play a specific role. In other words it must do for what it is built. Purpose of the software should be specific. The task of the software should be clear.

## **Software Requirement:**

Software must fulfill its requirements. Requirements are those for which software is development. It is very essential to know what the client requires in the software. The requirement will show the purpose of the software. The software should perform according to its requirements. That is the main purpose of software.

## **Planning:**

After gathering the requirements of customer it is very important to plan how to build the software. This is strategic approach phase of software development. A good planning will give an efficient development way. Proper planning is the key of success which is also applicable to software development process.

**Designing:**

Designing would be the frame of the software. To develop a better looking and efficiently working software proper designing is very important. Designing reflects the shadow of the product to be built.

**Programming:**

This is the main phase of software development which will give the final product. Programming can be said the actual development of the software. It is the backbone of the software. The whole functionality would be involved in the programming phase. Programming will give the required product.

**Testing:**

Testing is the phase where the developed product is tested whether it is working properly or not. This is an important role in software development process. A bad product will not work or not survive in market. Therefore testing is very crucial. Testing should be perfect as a single default may rise huge problem. It is also necessary that without a test a product is useless that it may not work and all the things done may be a disaster.

**Debugging:**

Debugging is the process of removing the faults. After testing if there is any fault it should be removed before final delivery of product. Debugging is very necessary as a defected product is not going to be sustained in the market for long.

**Maintenance:**

Maintenance is the final phase of software development. A developed product should be maintained properly. Without maintenance everything get damaged therefore software also be maintained to work long.