**Software Engineering Assignment**

**Module - 1**

**(Overview Of IT Industry)**

**Q1.What is software? What is software engineering?**

**Ans:-** Software is a set of instructions that tell a computer how to perform specific tasks. Software Engineering is a branch of computer science the process of developing, testing and deploying computer application to solve the real world problems.

**Q2. Explain types of software.**

**Ans:-** The various categories of software below are the most common software.

**1. System Software :-**

These software programs are designed to run a computers application programs and hardware. System software coordinates the activities and functions of the hardware and software.

2.**Application Software** :-

Application Software is a computer software package that perform a specific function for a user.

3. **Device Software :**–

Driver software is also known as device driver, this software is often considered a type of system software. Device drivers control the devices and peripherals connected to a computer, helping them to perform

their specific tasks.

**Q3. What is SDLC? Explain each phase of SDLC**.

**Ans:-** The Software Development Life Cycleis a structured process used for developing software applications.

1. Analysis

2. Planning

3. Designing

4. Development / Implementation

5. Deploy / Testing

6. Maintain

**1.Analysis :–**

Analysis seeks to identify and record the precise requirement of the final user.

**2.Planning :–**

Planning involve defining the software purpose and scope.

**3.Designing :-**

The Design is all about building the framework. The development team is responsible for software engineering and outlines the software functionality and aesthetic.

**4.Development / Implementation :-**

Development aims to develop software that is functional, efficient, and user-friendly.

**5.Deploy / Testing :–**

Testing involves a thorough examination of the software for any bugs or glitches. After crafting a product with precision, it’s time to Deploy it to the users by pushing to the production environment.

**6. Maintain :-**

This adaptation involves responding to user feedback, resolving unexpected issues, and upgrading the software based on users’ evolving requirements.

**4. What is DFD? Create a DFD diagram on Flipkart.**

**Ans**:- Data Flow Diagram is a graphical representation of the flow of data within a system.

**DFD diagram :-**

User

Login / Registration

View Item

Add to cart

Make payment

Payment Confirmation

Order Confirmation

**Q5. What is Flow chart? Create a flowchart to make addition of two numbers.**

**Ans:-** A Flow chart is a diagram that shows the steps and sequences of a process or workflow.

Start

Number1

Number2

Sum =

Number1+Number2

Display Sum

Stop

**6. What is Use case Diagram? Create a use-case on bill payment on Paytm.**

**Ans:-** A Use Case Diagram is a vital tool in system design, it provides a visual representation of how users interact with a system.

**Case Diagram:-**

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User -----> Login / Registration

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Payment Type

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Bill Detail

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Payment Method

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Payment Gateway

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Payment Process

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Payment Confirmation

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