Module 1
[Assignment]

Q-1) What is software? What is software engineering?

Ans: Software, is a collection of computer programs and related data that provide the instructions for telling a computer what to do and how to do it.

Q-2) Explain types of software

Ans: There are some types of software are there

1. <u>System Software:</u>

   System software provides the basic functions for computer usage and helps run the computer hardware and system.

2. <u>Programming Software:</u>
   Programming is the process of designing, writing, testing, debugging, and maintaining the source code of computer programs. The purpose of programming is to create a program that exhibits a certain desired behaviour.
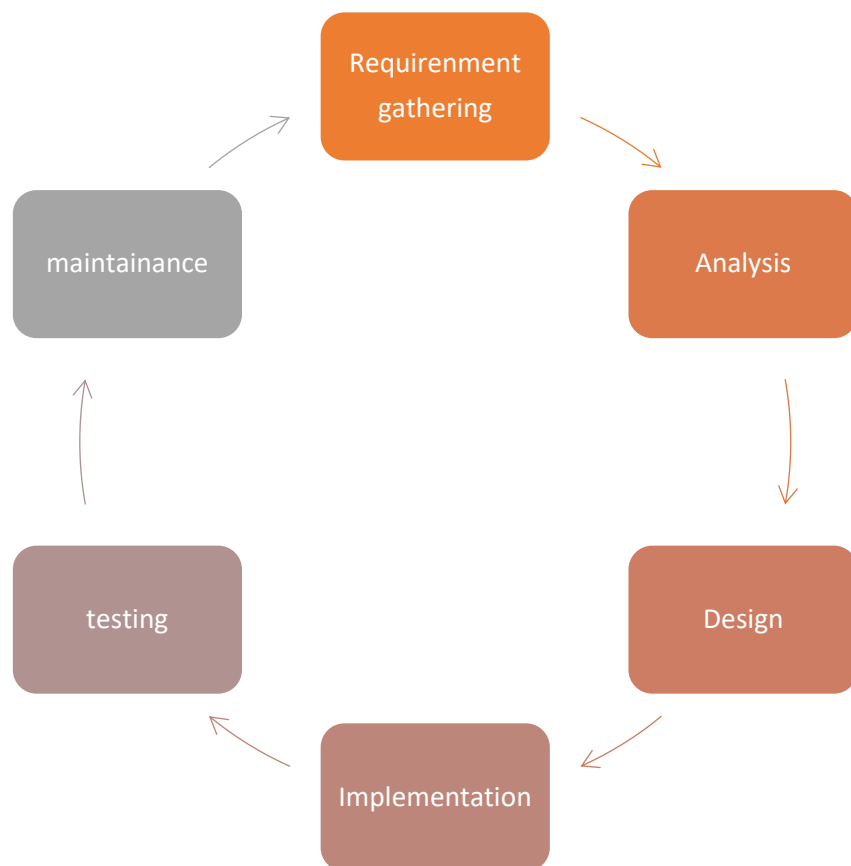
3. <u>Application Software:</u>

   Application software is the general designation of computer programs for performing user tasks. Application software is the general designation of computer programs for performing user tasks.

Q-3) What is SDLC? Explain each phase of SDLC

Ans: SDLC [Software Development Life Cycle] is a structure imposed on the development of a software product that defines the process for planning, implementation, testing, documentation, deployment, and ongoing maintenance and support.

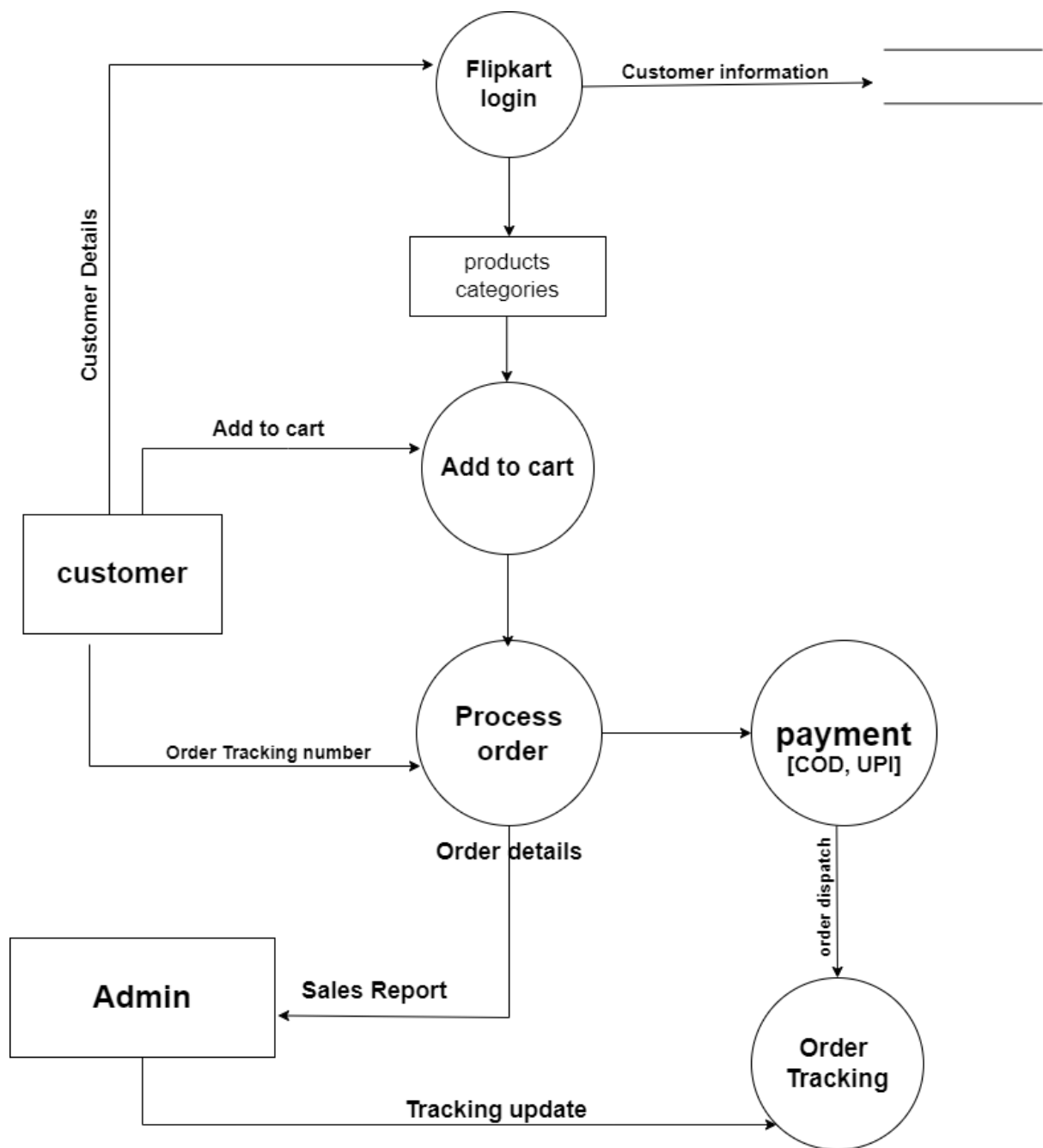- SDLC Phases:

Q-4) What is DFD? Create a DFD diagram on Flipkart

Ans: A data flow diagram (DFD) is a graphical representation of the "flow" of the data through an information system, modelling its process aspects.
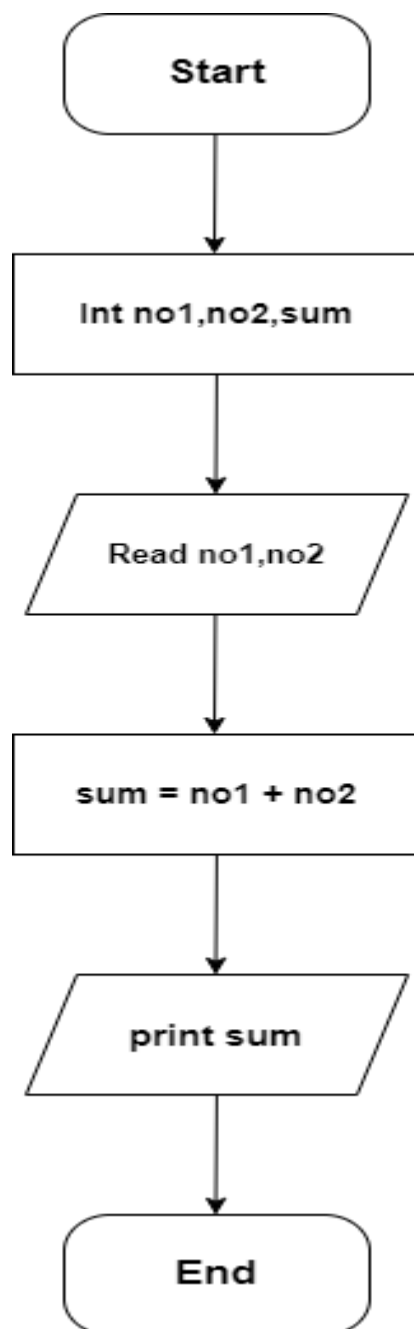
- <u>DFD of Flipkart:</u>

Q-5) What is Flow chart? Create a flowchart to make addition of two numbers.

Ans: Flowchart used to show algorithm or process. Can give step solution to the problem

- Flow chart of addition of two number

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            ┌──────────────┐
            │    Start     │
            └──────┬───────┘
                   │
                   ▼
        ┌──────────────────────┐
        │   Int no1,no2,sum     │
        └──────────┬───────────┘
                   │
                   ▼
          ╱──────────────────╲
         ╱   Read no1,no2      ╲
         ╲                     ╱
          ╲──────────────────╱
                   │
                   ▼
        ┌──────────────────────┐
        │   sum = no1 + no2     │
        └──────────┬───────────┘
                   │
                   ▼
          ╱──────────────────╲
         ╱     print sum       ╲
         ╲                     ╱
          ╲──────────────────╱
                   │
                   ▼
            ┌──────────────┐
            │     End      │
            └──────────────┘
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Q-6) What is Use case Diagram? Create a use-case on bill payment on Paytm.

Ans: A Use Case Diagram is a type of Unified Modelling Language (UML) diagram that represents the interaction between actors (users or external systems) and a system under consideration to accomplish specific goals.

- Use-Case diagram for bill payment on paytm