2. Basic Questionnaire.

a) Django is a high level Python web framework designed for rapid development of secure and maintainable websites. It follows the MVT (Model View Template) design pattern. Its main purpose is to ~~simply~~ simplify the process of building web applications by promoting DRY (Don't Reapeat Yourself) principles, emphasizing reusable components and following the MVC (Model View Controller) architectural pattern.

b)

Views	Templates
→ Handle the business logic of your web application.	→ Define the structure and presentation of your user interface
→ Determine which data to fetch and how to aggregate it based on the URL requested	→ Recieve data from views and combine it with HTML markup to create the final page.
→ They decide what template to use and how to present the data.	→ Handle how the data is presented.
→ Retrieve data from the database and prepare it for rendering.	→ They include reusable logic.

c. In Django, a model is a Python class that represents the structure and behavior of the data in a database. Models define the fields and methods associated with a particular type of data, allowing developers to interact with the database using high-level Python objects rather than SQL queries. Models are used to create, read, update and delete data from the database, providing a convinient and intuitive way to manage application data.

3. App Development

a) • Advantages of Flutter:
   i) Fast Development Cycle
   ii) Beautiful User Interfaces
   iii) Cross-Platform Development.
• Disadvantages of Flutter:
   i) Limited Third-Party Libraries
   ii) Steep Learning Curve for Dart
   iii) Limited Corporate Adoption.
   iv) Large App Size

b) Stateless Widget

→ Immutable and doesn't change its state during runtime

→ Properties remain constant throughout the widget's lifetime.

→ It recieves data and configuration from its parent widget and renders its UI based solely on that info.

Stateful Widget

→ Mutable and can change dynamically.

→ Used for elements that respond to user input or evolve.

→ State object corresponding to it manages the widget's state and triggers UI updates when necessary

c. Types of build modes in flutter :

i) Debug Mode

ii) Profile Mode

iii) Release Mode.

d. In Dart, you can create private variable by prefixing their names with an underscore (_). Variables starting with an underscore are considered private to their library.

Eg: class MyClass { int _privateVar = 31 }