Flutter History:

Flutter is a relatively new open-source software development framework created by Google. Its history is as follows:

- 1. **Dart Programming Language:** The history of Flutter is closely tied to the development of the Dart programming language. Dart was created by Google and was designed to address the limitations of JavaScript for building large-scale, high-performance web applications. Dart was officially announced in 2011.
- 2. **Early Experiments:** Before Flutter, Google experimented with various technologies for building mobile apps. One of these was "Sky," a portable framework for building native interfaces. The ideas and lessons learned from these experiments contributed to the development of Flutter.
- 3. **Introduction of Flutter:** Flutter was officially announced by Google at the Dart Developer Summit in October 2015. It was initially released as an early alpha preview. The primary goal was to provide a framework that allowed developers to build high-quality native interfaces for Android and iOS from a single codebase.

What is Flutter:

Flutter is an open-source UI software development framework created by Google. It is used to build natively compiled applications for mobile, web, and desktop from a single codebase. Flutter is particularly known for its capabilities in creating beautiful and fast user interfaces. Here are some key features and aspects of Flutter:

- 1. **Cross-Platform Development:** Flutter allows developers to write a single codebase that can run on multiple platforms. This means you can develop apps for Android, iOS, web, and desktop with a unified codebase, reducing development time and effort.
- 2. **Dart Programming Language:** Flutter uses Dart as its programming language. Dart is also developed by Google and is designed for building fast and efficient applications. While Dart may not be as widely used as other languages like JavaScript or Java, it's relatively easy to learn and work with.
- 3. **Widget-Based UI:** Flutter is built around a widget-based architecture. Everything in Flutter is a widget, and widgets can be composed to create complex user interfaces. Flutter provides an extensive library of customizable widgets for common interface elements, and you can create your custom widgets as well.
- 4. **Hot Reload:** One of Flutter's standout features is its "hot reload" capability. This allows developers to see the immediate impact of code changes in the app's UI without having to restart the application, making the development and debugging process very efficient.
- 5. **Rich Ecosystem:** Flutter has a growing ecosystem of libraries, packages, and plugins that can be used to extend the functionality of your application. You can find packages for everything from state management to handling API calls.

- 6. **Performance:** Flutter compiles to native ARM machine code for mobile platforms and uses the Skia graphics library for rendering, which results in high-performance applications with smooth animations and a consistent look and feel.
- 7. **Community Support:** Flutter has a thriving developer community and strong industry support, making it easier to find resources, documentation, and help when building applications.

What is FrameWork:

Framework pre-built ad reusale software structure for developing aplications. In flutter case flutter is a framework that means they have written some programs files in dart programming langauage and we have to just use those files in our program to make mobile applications, but for this as we know flutter framework is in dart we need to learn dart programming to make applications in Flutter