■ Caching in Flutter

■ What is Caching?

- Caching means saving data temporarily so it can be quickly reused later.
- It reduces loading time and improves app performance.

■ Why use Caching?

- Faster data access.
- Works offline when internet is not available.
- Reduces repeated network calls.

■ Types of Caching in Flutter:

- 1. Memory Cache -> Store data in variables during app runtime.
- 2. Local Storage Cache -> Save data in device storage using packages like:
- shared_preferences (key-value pairs).
- hive (NoSQL database).
- sqflite (SQL database).
- 3. Image Cache -> Flutter automatically caches images with Image.network.
- 4. HTTP Cache -> Use http caching or dio_http_cache package.

■ Example with shared_preferences:

Save data -> prefs.setString('username', 'Amr');
Get data -> prefs.getString('username');

■ Summary:

- Caching helps improve speed and offline support.
- Choose method depending on your need (shared_preferences, hive, sqflite, dio).