Jupyter Notebook Installation and Usage Guide

1. How to Install Jupyter Notebook Using Anaconda?

Anaconda is a software that helps manage Python tools like Jupyter Notebook. Here's how you can install it step by step:

Step 1: Download Anaconda

- Go to https://www.anaconda.com/.
- Click on **Download** and choose the version for your operating system (Windows/Mac/Linux).
- Follow the on-screen instructions to install Anaconda.

Step 2: Open Anaconda Navigator

- After installation, search for **Anaconda Navigator** on your computer and open it.

Step 3: Install Jupyter Notebook

- Inside Anaconda Navigator, find **Jupyter Notebook**.
- If it shows an **Install** button, click it to install.
- If it shows **Launch**, it's already installed, and you can click **Launch** to open it.

2. How to Open Jupyter Notebook?

- Once you click **Launch** in Anaconda Navigator, a web page will open in your browser.
- You'll see a dashboard with a list of folders and files from your computer.

To create a new notebook:

- Click **New > Python 3 (ipykernel)**.
- A new page will open where you can write and run your Python code.

3. What Libraries Do You Need?

A **library** in Python is like a tool that helps you do specific tasks. Some common libraries you might need for running code in Jupyter Notebook include:

- **pandas:** Helps with organizing and analyzing data.
- **numpy:** Useful for math calculations.
- **matplotlib:** Helps create charts and graphs.

- **seaborn:** Makes prettier charts and graphs.

How to Install These Libraries?
You can install these libraries directly inside Jupyter Notebook:

python

Copy code

```
!pip install -r requirements.txt
```

4. How to Run Code in Jupyter Notebook?

Running code in Jupyter Notebook is easy:

Step 1: Click inside a blank cell and type the code.
Example:

python

Copy code

print("Hello, World!")

Step 2: Press **Shift + Enter** or click the **Run** button to execute the code.

- The result will appear just below the cell.

1. Restart the kernel in Jupyter Notebook to ensure a clean environment.
2. Click on Kernel > Restart & Run All to execute the code.

5. How to Save and Share Your Work?

- To save: Click **File > Save As** and name your notebook.
- To share: Click **File > Download As > PDF** to save a PDF version of your work.

6. Troubleshooting Tips

- **Error: "Module not found"** → Make sure to install the library using !pip install <library_name>
- **Kernel Error:** Go to **Kernel > Restart** and try running your code again.