

## Classroom Assignment <7>: Pandas DataFrame – Defect Tracker

### Learning Objective:

Learn how to create and filter a defect tracker using DataFrames.

### Expected Completion Time:

Best Case: 20 minutes

Average Case: 25 minutes

### Assignment Details:

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Create a Python script named **pandas\_dataframe\_defects.py** that:

1. Creates a DataFrame with defect details:

DefectID	Module	Severity	Status
D1	Login	High	Open
D2	Payment	Medium	Closed
D3	Reports	Low	Open
D4	Login	High	Closed
D5	Payment	Medium	Open

2. Prints all Open defects.
3. Prints all High severity defects.
4. Counts how many defects are Open vs Closed.

### Hints to Solve:

- Use conditions: `df[df['Status']=="Open"]`.
- Use `.groupby("Status")["DefectID"].count()`.

### Expected Outcome:

- Filter data in DataFrames.
- Perform defect analysis by severity and status.