

1. **What is data cleaning in Pandas?**

Data cleaning is the process of detecting and correcting or removing inaccurate, incomplete, or irrelevant data using Pandas.

2. **What is the difference between loc and iloc?**

loc is label-based indexing, while iloc is integer position-based indexing.

3. **What are missing values and how does Pandas handle them?**

Missing values are absent data entries, usually represented as NaN, and Pandas handles them using methods like isnull(), fillna(), and dropna().

4. **What is groupby() and why is it used?**

groupby() is used to split data into groups and perform aggregate operations like sum, mean, or count.

5. **How does Pandas help in data preprocessing for AI models?**

Pandas helps by cleaning data, handling missing values, transforming datasets, and preparing structured data for AI models.