1.What is Data Analysis?

Data Analysis is a subcomponent of data analytics that involves the use of technical tools and data handling techniques. Data Analytics is the discovery , interpretation, and communication of meaningful patterns in data. Data Analysis refers to qualitative and quantitative techniques and processes used to enhance productivity and business gain. Data is extracted and categorized to identified and analyze behavioral data and patterns, techniques vary according to organizational requirements.

2.What are the tools useful for data analysis?

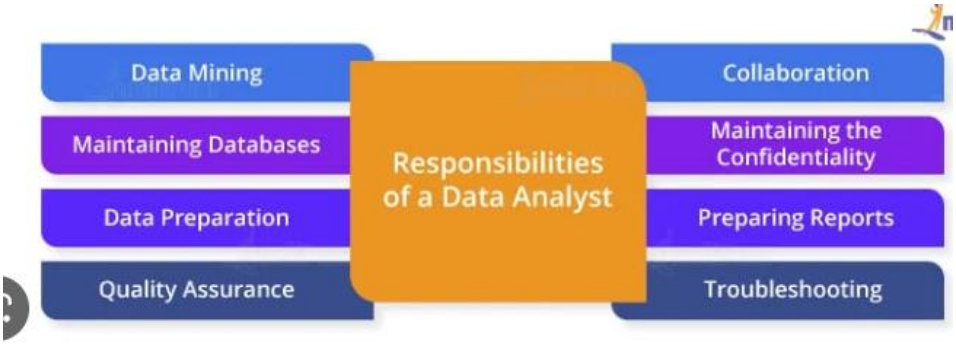
Microsoft Excel
SAS
R
Python
Tableau public
Apache Spark
And Many More.

3.What are the various steps involved in any analysis project?

Step1:Define the Problem.
Step 2:Collect the data.
Step 3:Clean the data.
Step 4:Analyze the data.
Step 5:Visualize and share your findings.

4.What are the responsibilities of a Data Analyst?

- Interpret data, analyze results using statistical techniques and provide ongoing reports
- Develop and implement databases, data collection systems, data analytics and other strategies that optimize statistical efficiency and quality
- Acquire data from primary or secondary data sources and maintain databases/data systems

- Identify, analyze, and interpret trends or patterns in complex data sets
- Filter and “clean” data by reviewing computer reports, printouts, and performance indicators to locate and correct code problems
- Work with management to prioritize business and information needs
- Locate and define new process improvement opportunities.
- 

5.Write some key skills usually required for a data analyst?

- EDA (Exploratory Data Analysis)
- Acquiring data from primary or secondary data sources and maintaining databases.
- Data storing and retrieving skills and tools.
- Cleaning dirty data (unstructured data).
- Manage data warehousing and E TL (Extract Transform Load).
- Develop KPl's to assess per in-depth.
- In depth exposure Of SQL and analytics.
- Develop visual representations Of the data, throægh the use Of Bl platforms.
- Interpreting data, analyzing results using statistl€al techniques.
- Developing and implementing data analyses, data collection systems and other strategies that optimize
- statistical efficiency and quality.
- Data Analysts should have familiarity with data warehousing and business intelligence concepts.
- Strong understanding of Hadoop Cluster.
- Perfect with the tools and components of the data architecture.

6.What are the common problems that data analysts encounter during analysis?

Collecting meaningful data
Selecting the right analytics tool
Data Visualization
Data from multiple sources
Low-quality Data.

7.What is the difference between data analytics and data science?

	Data Science	Data Analytics
Fundamental Goal	Asking right business questions and Finding solutions	Analysing and Mining Business Data
Various Task	Data Cleaning, preparing analysis to gain insights	Data querying , aggregation to find patterns
Quantum of Data	Broad set of Data(Big Data)	Limited set of Data
Definition	Data Science is the art and science of extracting actionable insights from raw data	Data analysts are not commonly responsible for building statistical models or deploying machine learning tools
Focus	Pre-processed Data	Processed Data