1) What do you mean by BI? Explain.

ANS: - BI stands for Business Intelligence. It refers to the technologies, tools, and practices used to collect, integrate, analyze, and present business data to support decision-making, strategic planning, and performance management.

2) How Power-BI helps in BI, and how does it help Analysts? Explain

ANS: - Power BI is a business analytics service by Microsoft that provides interactive visualizations and business intelligence capabilities with an interface simple enough for end users to create their own reports and dashboards. Power BI helps in BI in several ways:

1] Data Integration: Power BI allows users to connect to various data sources, including spreadsheets, databases, and cloud services, and combine them into a single view. This makes it easier for analysts to work with large and complex data sets, as they can quickly import and transform data into a usable format.

2] Data Analysis: With Power BI, analysts can create interactive reports and dashboards that allow them to visualize and analyze data. The tool includes a range of data visualization options, including charts, graphs, and maps, which enable analysts to identify trends and patterns in the data and make informed decisions.

3] Collaboration: Power BI allows analysts to collaborate on data sets and reports with other team members, providing a centralized platform for sharing insights and working together on data-driven projects.

4] Mobile Support: Power BI offers mobile apps for iOS, Android, and Windows devices, allowing analysts to access and interact with their data on-the-go.

5] Automation: Power BI offers automation capabilities through Power Automate, which allows analysts to automate repetitive tasks such as data transformation and report generation.

3) Explain Descriptive analytics?

ANS: - Descriptive analytics is a type of analytics that focuses on summarizing and describing past events or data. It involves analyzing historical data to identify patterns, trends, and relationships in the data. The main goal of descriptive analytics is to provide insights into what has happened in the past and how it may affect future outcomes. Descriptive analytics can be used in a variety of fields, such as business, finance, healthcare, and sports. For example, a retail company may use descriptive analytics to analyze sales data from the past year to identify trends in customer behavior and sales performance. Similarly, a healthcare organization may use descriptive analytics to analyze patient data to identify patterns in disease prevalence and patient outcomes.

4) Explain Predictive analytics?

ANS: - Predictive analytics is a type of analytics that uses historical data and statistical algorithms to make predictions about future events or behaviors. The goal of predictive analytics is to identify patterns and relationships in data that can be used to forecast future outcomes or behaviors. Predictive analytics can be used in a variety of applications, such as fraud detection, customer churn prediction, sales forecasting, and inventory optimization. For example, a bank may use predictive analytics to detect fraudulent transactions by analyzing customer behavior and transaction data. Similarly, a retailer may use predictive analytics to forecast sales demand and optimize inventory levels.

5) Explain perspective analytics?

ANS: - Prescriptive analytics is the process of using data to determine an optimal course of action. By considering all relevant factors, this type of analysis yields recommendations for next steps. Because of this, prescriptive analytics is a valuable tool for data-driven decision-making.

6) Write five real-life questions that PowerBi can solve.

ANS: - 1]How can we identify the most profitable products or services in our business?

Power BI can help to analyze sales data by product or service, and identify the top performers in terms of revenue, profit margin, and other key metrics.

2] How can we track customer satisfaction levels over time?

Power BI can help to analyze customer feedback data from surveys or other sources, and track trends in satisfaction levels over time. It can also identify common issues or concerns that are impacting customer satisfaction.

3] How can we optimize our supply chain operations?

Power BI can help to analyze data related to inventory levels, shipping times, and supplier performance, and identify areas where improvements can be made to reduce costs and improve efficiency.

4] How can we measure the effectiveness of our marketing campaigns?

Power BI can help to analyze data related to website traffic, social media engagement, and other metrics, and measure the impact of marketing campaigns on lead generation, customer acquisition, and revenue growth.

5] How can we identify and prevent fraudulent activities in our business?

Power BI can help to analyze data related to transactions, user behavior, and other key indicators, and identify patterns or anomalies that may be indicative of fraudulent activities. It can also provide real-time alerts when suspicious activity is detected.