1. **What is Power BI and how does it work?**
   * **Answer**: Power BI is a business analytics tool by Microsoft that allows users to connect to various data sources, transform and model data, and create interactive visualizations and reports. It works by importing data from multiple sources, transforming the data using Power Query, and then creating dashboards and reports to gain insights.
2. **What are the different components of Power BI?**
   * **Answer**: Power BI consists of Power BI Desktop (for creating reports), Power BI Service (cloud-based for sharing and collaboration), Power BI Mobile (for viewing reports on mobile devices), and Power BI Gateway (for connecting on-premises data to Power BI).
3. **What are Power BI DAX functions, and why are they important?**
   * **Answer**: DAX (Data Analysis Expressions) is a formula language used in Power BI for creating calculated columns, measures, and custom tables. DAX is important because it allows users to perform complex calculations and data analysis to derive meaningful insights from data.
4. **How do you handle large datasets in Power BI?**
   * **Answer**: Large datasets in Power BI can be managed using DirectQuery, which queries data directly from the source without importing it into Power BI, or by using data reduction techniques like aggregations, filtering, and using dataflows to pre-process data.
5. **Can you explain the difference between Power BI Report and Power BI Dashboard?**
   * **Answer**: A Power BI report is a detailed, multi-page collection of visualizations based on a dataset, while a dashboard is a single-page view that aggregates key metrics from multiple reports. Dashboards are used for quick, high-level insights, whereas reports provide detailed analysis.
6. **How do you share reports in Power BI?**
   * **Answer**: Reports in Power BI can be shared through the Power BI Service by publishing the report, granting access to other users or groups, embedding reports into apps, or exporting the report in various formats like PDF or PowerPoint.
7. **What are Power BI dataflows, and when would you use them?**
   * **Answer**: Dataflows are ETL (Extract, Transform, Load) processes in Power BI that allow for centralized data transformation and preparation. They are useful when multiple reports or users need to use the same cleaned data source across different workspaces or projects.
8. **What is Power BI Gateway, and why is it important?**
   * **Answer**: Power BI Gateway is a tool that facilitates the connection between on-premises data sources and the Power BI Service. It allows users to refresh their reports and dashboards with up-to-date data from local databases without having to manually import the data.
9. **How do you optimize the performance of a Power BI report?**
   * **Answer**: Optimizing Power BI report performance involves reducing the complexity of DAX calculations, minimizing the size of the dataset through filtering, using aggregations, optimizing data model design, and using performance analysis tools like the Power BI Performance Analyzer.