

My SQL

- Database :- A collection of related data tables.
- Table :- A structured collection of data organized into rows and columns.
- Column :- A vertical entity in a table that contains all information associated with a specific field in a record.
- Row :- A horizontal entity in a table that contains data values for each column.
- Primary Key :- A unique identifier for each record in a table.
- Foreign Key :- A column or set of columns in one table that refers to primary key in another table.
- Index :- A data structure that improves the speed of data retrieval operations on a database table.
- Query :- A request for data or information from a database table.
- Join :- A SQL database operation used to combine records from two or more tables based on a related column.
- Normalization :- The process of organization data in a database to reduce redundancy and dependency.

- **Transaction**:- A sequence of SQL statements that are executed as a single unit of work.
- **Stored Procedure**:- A set of SQL statements with a specific name, which are stored in the database catalog and can be invoked later.
- **View**:- A virtual table based on the result of a SQL query.
- **Trigger**:- A set of SQL statements that automatically "fires" when a specified event (e.g. INSERT, UPDATE, DELETE) occurs on a particular table.
- **Backup and Restore**:- Processes of creating copies of data to prevent loss and restoring data from backups when needed.
- **Transaction**:- A sequence of one or more SQL statements treated as a single logical unit of work, ensuring data integrity by either committing or rolling back changes if an error occurs.
- **Normalization**:- The process of organizing data in a database to reduce redundancy and dependency, ensuring data integrity and efficiency. Involves dividing large table into smaller one and relationship b/w them.