***Embedded SQL***

**Embedded SQL** is a method of combining the [computing](https://en.wikipedia.org/wiki/Computing) power of a [programming language](https://en.wikipedia.org/wiki/Programming_language) and the [database](https://en.wikipedia.org/wiki/Database) [manipulation](https://en.wikipedia.org/wiki/Data_Manipulation_Language) capabilities of [SQL](https://en.wikipedia.org/wiki/SQL). Embedded SQL [statements](https://en.wikipedia.org/wiki/Statement_(programming)) are SQL statements written inline with the program [source code](https://en.wikipedia.org/wiki/Source_code) of the host language.

Embedded SQL is a method of inserting inline SQL statements or queries into the code of a programming language, which is known as a host language. Because the host language cannot parse SQL, the inserted SQL is parsed by an embedded SQL preprocessor.  
  
Embedded SQL is a robust and convenient method of combining the computing power of a programming language with SQL's specialized data management and manipulation capabilities.

***Clustered Index***

A clustered index is a type of index where the table records are physically re-ordered to match the index.   
  
Clustered indexes are efficient on columns that are searched for a range of values. After the row with first value is found using a clustered index, rows with subsequent index values are guaranteed to be physically adjacent, thus providing faster access for a user query or an application.

 a clustered index stores the actual data, where a non-clustered index is a pointer to the data. In most DBMSs, you can only have one clustered index per table, though there are systems that support multiple clusters (DB2 being an example).   
  
Like a regular index that is stored unsorted in a database table, a clustered index can be a composite index, such as a concatenation of first name and last name in a table of personal information.

***difference between sql and pl/sql***

1.*SQL is a****Structured Query Language****used to issue a single query or execute a single insert/update/delete.*

*PL-SQL is a****programming language SQL****, used to write full programs using variables, loops,operators etc. to carry out multiple selects/inserts/updates/deletes.*

*2. SQL may be considered as the source of data for our reports, web pages and screens.*

*PL/SQL can be considered as the application language similar to  Java or PHP. It might be the language used to build, format and display those reports, web pages and screens.*

*3. SQL is a data oriented language used to select and manipulate sets of data.  
PL/SQL is a procedural language used to create applications.*

*4. SQL is used to write queries,****DDL****and****DML****statements.  
PL/SQL is used to write program blocks, functions, procedures triggers,and packages.*

*5.SQL is executed one statement at a time.  
PL/SQL is executed as a block of code.*

*6. SQL is declarative, i.e., it tells the database what to do but not how to do it.  
Whereas, PL/SQL is procedural, i.e., it tells the database how to do things.*

*7. SQL can be embedded within a PL/SQL program.  
But PL/SQL can’t be embedded within a SQL statement.*