Q1. What are the advantages of PLSQL over SQL?

Ans: The advantages of PL/SQL over SQL are:-

1. Procedural Language Features:-
   - PL/SQL supports procedural constructs such as loops, conditions, and variables, allowing for more complex programming logic compared to standard SQL, which is declarative.
2. Block structures:-
   - PL/SQL code is organized into blocks which can encapsulate logic, making it easier to manage and maintain.
3. Cursors:-
   - PL/SQL supports both implicit and explicit cursors, enabling developers to handle query results more flexibly and manage data retrieval efficiently.
4. Data manipulation:-
   - PL/SQL can handle complex data manipulations and transformations that are not easily achievable by SQL.
5. Modular Programming:-
   - PL/SQL allows for the creation of reusable procedures and functions, promoting modular programming and code reuse.

Q2. List Different Pre-defined Exceptions.

Ans.

	Exception	Oracle Error	SQL CODE
1.	ACCESS_INTO_NULL	06530	-6530
2.	CASE_NOT_FOUND	06592	-6592
3.	INVALID_CURSOR	01001	-1001
4.	INVALID_NUMBER	01722	-1722
5.	LOGIN_DENIED	01017	-1017

6.	NO_DATA_FOUND	01403	+100
7.	PROGRAM_ERROR	06501	-6501
8.	TOO_MANY_ROWS	01422	-1422

Q3. Explain User-Defined Exceptions

Ans:
- PL/SQL allows you to define your own exceptions according to the need of your program.
- A user-defined exception must be declared and then raised explicitly, using either a RAISE statement or the procedure
- Syntax:-

```
Declare
    my_exception Exception;
```

- eg:-

```
Declare
    myex EXCEPTION;
    i number;
Begin
    For i in (SELECT * FROM enum) LOOP
        IF i eno = 3 THEN
            RAISE myexec;
        END IF;
    END LOOP;
Exception
    When myex THEN
        dbms_output.put_line('Employee number
        already exist in enum table.');
END;
/
```

O/P:

```
SQL > @user_exp
Employee number already exist in enum table
```