**DBMS LAB**

**Experiment 10**

**Built-in Functions**

**Submitted By,**

**Niranjan V Ram**

**39, S5 CSE**

**Aim:**

Familiarize various Built-in functions available in MySQL.

**Functions and Codes:**

**String Functions**

---------------------

1. ASCII

It returns the ASCII value of the first character.

Syntax: ASCII(character)

select ASCII(fName) as ASCIIfName from Staff39;

+------------+

| ASCIIfName |

+------------+

| 77 |

| 68 |

| 65 |

| 83 |

| 74 |

| 74 |

+------------+

2. CHAR\_LENGTH

It returns the length of the string.

Syntax: CHAR\_LENGTH(string)

select CHAR\_LENGTH("Hello World") as Stringlength;

+--------------+

| Stringlength |

+--------------+

| 11 |

+--------------+

3. CONCAT

It concatenates given strings.

Syntax: CONCAT(expression1, expression2, expression3,...)

select CONCAT("Hello ", "World!") as String;

+--------------+

| String |

+--------------+

| Hello World! |

+--------------+

4. LOWER

It converts the string into its lower case equivalent.

Syntax: LOWER(text)

select LOWER("Turn THIS into lower CASE") as String;

+---------------------------+

| String |

+---------------------------+

| turn this into lower case |

+---------------------------+

5. SUBSTRING

It extracts a substring from a string (start at position 6, extract 3 characters)

Syntax: SUBSTRING(string, start, length)

select SUBSTRING("Take any substring", 6, 3) as String;\

+--------+

| String |

+--------+

| any |

+--------+

**Numeric Functions**

---------------------

1. COS

It returns the cosine of a number.

Syntax: COS(number)

select COS(65);

+--------------------+

| COS(65) |

+--------------------+

| -0.562453851238172 |

+--------------------+

2. COUNT()

It returns the number of records returned by a select query.

Syntax: COUNT(expression)

select COUNT(branchNo) from Staff39;

+-----------------+

| COUNT(branchNo) |

+-----------------+

| 6 |

+-----------------+

3. AVG()

It returns the average value of an expression.

Syntax: AVG(expression)

select AVG(salary) from Staff39;

+-------------+

| AVG(salary) |

+-------------+

| 17883.5000 |

+-------------+

4. MAX()

It returns the maximum value in a set of values.

Syntax: MAX(expression)

select MAX(salary) from Staff39;

+-------------+

| MAX(salary) |

+-------------+

| 32445 |

+-------------+

5. MAX()

It returns the minimum value in a set of values.

Syntax: MIN(expression)

select MIN(salary) from Staff39;

+-------------+

| MIN(salary) |

+-------------+

| 9270 |

+-------------+

**Date Functions**

---------------------

1. CURDATE()

It returns the current date(in YYYY-MM-DD format)

Syntax: CURDATE()

select CURDATE();

+------------+

| CURDATE() |

+------------+

| 2022-12-04 |

+------------+

2. CURTIME()

It returns the current time(in HH-MM-SS format)

Syntax: CURTIME()

select CURTIME();

+-----------+

| CURTIME() |

+-----------+

| 20:03:25 |

+-----------+

3. CURDATE()

It returns the number of days between two date values.

Syntax: DATEDIFF(date1, date2)

select DATEDIFF("2022-06-08","2022-05-15");

+-------------------------------------+

| DATEDIFF("2022-06-08","2022-05-15") |

+-------------------------------------+

| 24 |

+-------------------------------------+

4. DAYNAME()

It returns the weekday name for a given date.

Syntax: DAYNAME(date)

select DAYNAME("2022-05-04");

+-----------------------+

| DAYNAME("2022-05-04") |

+-----------------------+

| Wednesday |

+-----------------------+

5. WEEKDAY()

It returns the weekday number for a given date.

Syntax: WEEKDAY(date)

select WEEKDAY("2017-06-15");

+-----------------------+

| WEEKDAY("2017-06-15") |

+-----------------------+

| 3 |

+-----------------------+

**Advanced Functions**

---------------------

1. BIN()

It returns the binary value of a number.

Syntax: BIN(number)

select BIN(63);

+---------+

| BIN(63) |

+---------+

| 111111 |

+---------+

2. CURRENT\_USER()

It returns the user name and host name for the MySQL account that the server used to authenticate the current client.

Syntax: CURRENT\_USER()

select CURRENT\_USER();

+----------------+

| CURRENT\_USER() |

+----------------+

| root@localhost |

+----------------+

3. DATABASE()

It returns the name of the current database.

Syntax: DATABASE()

select DATABASE();

+-------------+

| DATABASE() |

+-------------+

| dreamhome39 |

+-------------+

4. IF()

It returns a value if a condition is TRUE, or another value if a condition is FALSE.

Syntax: IF(condition, value\_if\_true, value\_if\_false)

select IF(500<1000, "YES", "NO");

+---------------------------+

| IF(500<1000, "YES", "NO") |

+---------------------------+

| YES |

+---------------------------+

5. VERSION()

It returns the current version of the MySQL database, as a string.

Syntax: VERSION()

select VERSION();

+----------------+

| VERSION() |

+----------------+

| 10.9.4-MariaDB |

+----------------+

**Submitted By,**

**Niranjan V Ram**

**39, S5 CSE**