Lab-1 W-1

DSGN8310 Advanced Database Design

Review Built-in Functions

Practice Task-1

Please see the following list of functions and test them with various inputs. There is no grade for this lab.

For help, please visit the following link:

* <https://www.w3schools.com/mysql/mysql_ref_functions.asp>
* http://dev.mysql.com/doc/refman/5.7/en/date-and-time-functions.html
* http://dev.mysql.com/doc/refman/5.7/en/datetime.html
* http://dev.mysql.com/doc/refman/5.7/en/string-functions.html

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| --- | --- |
| String Processing Functions | Outputs |
| CONCAT(str1[,str2]...) | SELECT CONCAT("Prince", "George,", " BC")  Output: PrinceGeorge, BC |
| CONCAT(str1[,str2]...)  CONCAT\_WS(sep,str1[,str2]...)  LTRIM(str)  RTRIM(str)  TRIM([[BOTH|LEADING|TRAILING] [remove] FROM] str)  LENGTH(str)  LOCATE(find,search[,start])  LEFT(str,length)  RIGHT(str,length)  SUBSTRING\_INDEX(str,delimiter, count)  SUBSTRING(str,start[,length])  REPLACE(search,find,replace)  INSERT(str,start,length,insert)  REVERSE(str)  LOWER(str)  UPPER(str)  LPAD(str,length,pad)  RPAD(str,length,pad)  SPACE(count)  REPEAT(str,count) |  |

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| Numeric Functions | Outputs |
| ROUND(number[,length])  TRUNCATE(number,length)  CEILING(number)  FLOOR(number)  ABS(number)  SIGN(number)  SQRT(number)  POWER(number,power)  RAND([integer]) |  |

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| Data and Time Functions | Outputs |
| NOW()  SYSDATE()  CURRENT\_TIMESTAMP()  CURDATE()  CURRENT\_DATE()  CURTIME()  CURRENT\_TIME()  DATEDIFF()  UTC\_DATE()  UTC\_TIME() |  |

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| Data and Time Functions | Outputs |
| date/time parsing functions  DAYOFMONTH(date)  MONTH(date)  YEAR(date)  HOUR(time)  MINUTE(time)  SECOND(time)  DAYOFWEEK(date)  QUARTER(date)  DAYOFYEAR(date)  WEEK(date[,first])  LAST\_DAY(date)  DAYNAME(date)  MONTHNAME(date) |  |

Practice Task-2

Please execute/run the code provided in the Week-1 day-1 lecture; this will help you to have the ability to write user-defined functions.

Please rename the task file as your first\_name\_student\_number (e.g., sing\_5555555). After completing your practice task-1, please upload the DOCX/PDF file to the Lab Practice-1 DROPBOX.

Note: The content of this lab will be used to prepare the Lab Test-1.