The purpose of a worksheet is to provide a support structure for your study and to provide better coverage of routine introductory exercises prior to completing more challenging homework assignments. Much of the text comes from questions that arise during the course.

Please attempt the worksheet on your own. Answers are provided under the Practice module.

 To receive credit for completing the worksheet, you must write 'Done' in a textbox on D2L submission folder when you have finished the worksheet. Do not paste your work. Just say 'Done'.

**1. Simple PL/SQL Function**

Create a function called format\_phone. It will format the following string 123.456.7890 so that it looks like a U.S. phone number (123) 456-7890.

Note 1:  Add two variables of type VARCHAR2 and length 50. The first variable will hold an unformatted phone number and the second a formatted phone number. Initialize the first variable to 123.456.7890.

Note 2: Look up  PL/SQL functions [replace](https://docs.oracle.com/cd/B19306_01/server.102/b14200/functions134.htm) and [substr](https://docs.oracle.com/cd/B19306_01/server.102/b14200/functions162.htm).

**2.** **Parametric Function**

Create a table Employee with last\_name varchar2(50), first\_name varchar2(50), phone\_number varchar(13). Next insert some sample data of form (‘Joe’, ‘Smith’,’123.456.7890’) and (‘Chris’, ‘White’, ‘324.675.2344’)

Modify the function to use an input parameter instead of a hard coded variable value. Compile and test the function using '123.456.7890' as the input parameter. In this function map the variables created in Exercise #3 to variable of type Employee phone number. Finally use the function to format all phone numbers in Employee to a U.S. phone number format.

**3. Regex Function**

Replace the function created above with one that uses regular expressions.

Look into [regexp-instr](https://docs.oracle.com/cd/B19306_01/server.102/b14200/functions129.htm) and [regexp\_replace](https://docs.oracle.com/cd/B19306_01/server.102/b14200/functions130.htm" \l "i1305521).