EEE 212

LAB 2 – Section1 - Even

Part A. [30 points]

Write a program to accept an input string of 9 characters from the keypad and display them on the first row of the LCD screen based on the following table:

Input	Displayed
0-9	0-9
A	l
B	o
C	g
*	(
#	)

Part B [70 points]

Write a program to calculate the logarithm with base of 4 of an integer ranging in [0,150). For this purpose, as an example, we input *log(120)* which appears in the first row, and the result is displayed in the second row as 3.45 with 2 fractional digits displayed. The input will always have 8 characters, i.e. even if we input two digit or one digit numbers such as 53 or 4 they will be written as *log(053)* and *log(004).* You don't have to consider invalid inputs that are not in the form of *log(XXX)*.

Use the lookup table solution for this problem. The table for this question is provided to you on Moodle.