Assignment:

Work out the following assignments:  300 points total

1.        For the following three groups of scores find the :

a.       total groups sum of squares,

b.      the between groups sum of squares,

c.        within groups sum of squares.

d.      Degree of freedom for within groups

e.      Degree of freedom for between groups

f.        The between groups mean square

g.       The within groups mean square

h.      The F value

**Group X                                 Group Y                                             Group Z**

62                                                           60                                           59

60                                                           60                                           49

50                                                           58                                           49

48                                                           53                                           47

47                                                           49                                           42

2.       Compute a Single classification analysis of variance on the following data, determining the:

a.       Sum of X for each group

b.      X square for each score

c.       Total sum of squares

d.      The between  sum of squares

e.      The within sum of squares,

f.        Degree of freedom for between groups

g.       Degree of freedom for within groups

h.      the between groups mean square,

i.         the within groups mean square

j.         and the value of F

**Group A                               Group B                               Group C                               Group D**

14                                           17                                           14                                           8

12                                           15                                           12                                           6

10                                           12                                           12                                           5

10                                           9                                              11                                           4

9                                              9                                              11                                           2

6                                              7                                              10                                           2

6                                              7                                              10                                           2

**Special Instructions**:  Calculate manually with the assistance of adding machine, but not graph pad, and make sure you show your work in a sequence as depicted by each letter  (#1- a to h and #2 a-j), under the two questions above.   No need to show formula.