

**Instructions:** You must show all work to receive full credit for the problems below. You may use Excel where appropriate. Any datasets needed will be posted on Blackboard with the quiz file, and you should submit such work along with your quiz. Round answers to two decimal places unless other instructions are given in the problem.

- In the file 154quiz3data.xlsx, Sheet 1 contains data on blue (B) and white (W) color workers, and their preference for the left (L) and right (R) options. Construct a pivot table that displays the counts of job type (blue or white) in the rows, and preference (left or right) in the columns. Copy your table below.

	L	N	R	Totals
B	111	17	122	250
W	79	12	59	150
Totals	190	29	181	400

- On Sheet 2 is a table of values: one percent, one decimal, one fraction, and one number in scientific notation. Convert each of these numbers to the other formats to fill out the table. Copy the resulting table below.

Percents	Decimals	Fractions	Scientific Notation
54%	0.54	$\frac{27}{50}$	$5.40 \times 10^{-1}$
3%	0.03	$\frac{3}{100}$	$3 \times 10^{-2}$
47.03%	0.4703	$\frac{341}{725}$	$4.7 \times 10^{-1}$
0.24%	0.0024	$\frac{2}{819}$	2.44E-03

or 5.4E-01  
 or 3E-02  
 or 4.7E-01

- On Sheet 3 is a list of 10 values that are increasing. In cells B2 through B10, calculate the percent change from the previous value in column A to the current value in column A (i.e. in Cell B2 will be the percent change from cell A1 to A2, etc.). Report your 9 values, in order, below.

- 300%
- 250%
- 7%
- 67%
- 24%
- 3%
- 16%
- 27%
- 15%