## Math 01, Homework 6 on Sections 3.11 - 3.13

Write all your working out and answers on your own notepaper - no need to write the questions. Please use lots of space.

It is very important that you show clearly any work you had to do to get your answers. Just writing the answer down with no work shown is not enough. All 18 questions are worth 2 points each.

Do these first 10 questions and *check that your answers match the solutions on page* 2. If you don't get the same answers then try to fix them by looking at your notes or the book or asking me. Only do the last eight questions when you are sure you understand the first ten.

- (1) Find:  $10\frac{1}{5} + 6\frac{2}{5}$
- (2) Compute:  $2\frac{3}{4} + 4\frac{2}{3}$
- (3) Calculate:  $8 3\frac{4}{7}$
- **(4)** A carpenter cuts a 3 feet 8 inch piece of board from a 9 feet 3 inch piece. What is the length of the leftover piece?
- (5) Subtract  $3\frac{4}{5}$  from  $1\frac{1}{3}$ . Write your answer as a mixed number.
- (6) Find:  $\left(1\frac{2}{3}\right)\left(-3\frac{4}{7}\right)$
- (7) Compute:  $\left(-4\frac{3}{5}\right) \div \left(-\frac{2}{5}\right)$
- **(8)** Evaluate:  $\left(-\frac{3}{4}\right)^2 1\frac{1}{4}$
- **(9)** Calculate:  $\frac{1}{6} \frac{1}{7} + \frac{20}{21}$
- **(10)** Find:  $5 \left(1\frac{2}{3} + \frac{3}{2} \cdot \frac{1}{2}\right)$

Eight more questions on the next page. Show clearly all your working out and reasoning.

- (11) Compute:  $8\frac{7}{9} + 1\frac{1}{3}$
- **(12)** Calculate:  $5-4\frac{2}{9}$
- **(13)** A carpenter cuts a 5 feet 11 inch piece of board from a 10 feet 9 inch piece. What is the length of the leftover piece?
- (14) Subtract  $4\frac{5}{6}$  from  $2\frac{1}{4}$ . Write your answer as a mixed number.
- (15) Find:  $\left(-2\frac{2}{5}\right)\left(2\frac{4}{5}\right)$
- (16) Compute:  $\left(-3\frac{1}{7}\right) \div \left(-\frac{4}{5}\right)$
- **(17)** Evaluate:  $\left(\frac{3}{5}\right)^2 2\frac{1}{5}$
- **(18)** Find:  $6 \left(3\frac{1}{2} + \frac{2}{3} \cdot \frac{1}{3}\right)$

## Answers to questions (1)-(10):

- (1)  $16\frac{3}{5}$
- (2)  $7\frac{5}{12}$
- (3)  $4\frac{3}{7}$
- (4) A 5 feet 7 inch piece is left.
- (5)  $-2\frac{7}{15}$
- (6)  $-5\frac{20}{21}$
- (7)  $11\frac{1}{2}$
- (8)  $-\frac{11}{16}$
- (9)  $\frac{41}{42}$
- (10)  $2\frac{7}{12}$