

Math 2001**August 26, 2019****Homework 1**

Read section p1 of your text.

Do the following problems on this paper, then turn in this paper next class.

Solve for the variable, and graph the solution set on a real number line:

1. $8 - 3x \geq 5$

2. $\frac{6 - x}{4} < \frac{3x - 4}{2}$

3. $|y - 3| = 7$

4. $|x| \leq 2$

5. $|2x + 5| < 1$

6. $\left| \frac{3x}{5} - 1 \right| > \frac{2}{5}$

7. $4 < x^2$

8. $x^2 - x - 2 \geq 0$

9. $(x + 3)^2 < 2$

HINT: expand, collect all terms on one side with zero on the other, then solve for x using the quadratic formula, label solutions on the real number line, then test one point in each of the three intervals thus formed.