Unit 2 HW 11   **Name** _____

1. HyVee has gas prices set at $3.15 per gallon right now. How much is that per cup?

2. Mr. Belby decides to fill up his Dodge Dart while he can. She has a 12 gallon tank, and he's on empty. How much will it cost him to fill up (use $3.15 per gallon)?

3. Mrs. Pischke pulls in behind her with her matching Dodge Dart, but she's waving her HyVee fuelsaver card. Poor Mr. Belby didn't have one. Due to having the card, Mrs. Pischke only has to pay $1.89 per gallon for gas (she's also on empty). How much money did she SAVE by having the fuelsaver card?

After selling pies for $8 each and receiving a generous donation of $50, the PV Bowling Team has raised $250. They have decided to use that money to buy their team shirts and towels. Shirts are $6 each and towels are $2 each.

$$8p + 50 = 250 \qquad\qquad 6s + 2t \leq 250$$

4. Explain what VOCABULARY term best represents each part of the equation.

   8 _____   p _____

   8p _____   50 _____

5. Explain what each part of the equation means IN CONTEXT of the situation.

   6 _____   s _____

   2t _____   6s + 2t _____

6. Why did they choose to make 6s + 2t ≤ 250 an inequality instead of an equation?

7. Solve the system using all three methods.
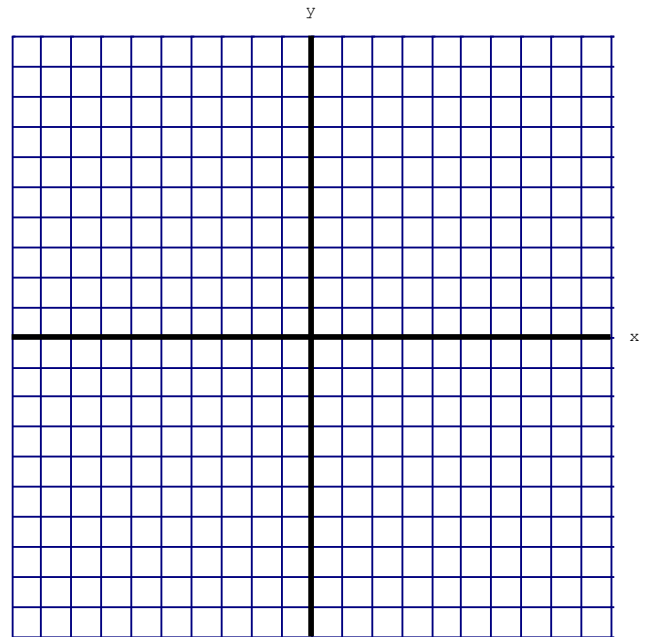
$$2x + 3y = -9$$

$$x - 3y = -18$$

Graphing

$2x + 3y = -9$

$x - 3y = -18$

Substitution

$2x + 3y = -9$

$x - 3y = -18$

Elimination

$2x + 3y = -9$

$x - 3y = -18$