Liberty PAP Algebra 2 **SYSTEMS OF EQUATIONS: GRAPHING METHOD**

Graph the following lines to find where they intersect each other.

This is the solution to the system of equations.

1. 

Answer: \_\_\_\_\_\_\_\_\_\_\_

2. 

Answer: \_\_\_\_\_\_\_\_\_\_\_

Use your calculator to find the solution to the following systems of equations.

Calculator Info:

Transform the following equations into y = mx + b form (slope-intercept form) **Show your work**, and then graph by hand to determine the solution.

3. $5x-4y=26$

$ 2x+y=7 $

**SYSTEMS OF EQUATIONS: SUBSTITUTION METHOD**

For each table write an equation in slope-intercept form. Then solve the system. (By Hand)

|  |  |
| --- | --- |
| x | y |
| 0 | -30 |
| 2 | -26 |
| 4 | -22 |

|  |  |
| --- | --- |
| x | y |
| -2 | 5 |
| 0 | 3 |
| 2 | 1 |

4.

y = \_\_\_\_\_\_\_\_\_\_\_\_

y = \_\_\_\_\_\_\_\_\_\_\_\_

Solution: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

|  |  |
| --- | --- |
| x | y |
| -2 | 0 |
| 0 | -2 |
| 2 | -4 |

|  |  |
| --- | --- |
| x | y |
| 0 | 5 |
| 2 | 7 |
| 4 | 9 |

5.

 y = \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

 y = \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

 Solution: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**SYSTEMS OF EQUATIONS: ELIMINATION METHOD**

6. Liam’s bookstore sold 40 notebooks and 20 newspapers for a total of $260. A day later, the bookstore sold 8 Notebooks and 2 Newspapers at the same prices for a total of $46. How much does a notebook and newspaper cost at Liam’s bookstore.

7. You are in a Parisian café with a friend. A local in front of you buys a cup of coffee and a croissant for 5.30 Euro. When you and your friend get 2 cups of coffee and 3 croissants, you are charged 13.60 Euro. What is the price for a cup of coffee and a croissant?