Name: _____

For each problem, set up a matrix equation. Then, use a calculator to solve the equation. Report solutions as ordered pairs, (x,y).

1)   -3x - 4y = -21
          4x + 6y = 30

2)   -7x + 7y = -21
          -2x + 4y = -14

ex: $\begin{bmatrix} -3 & -4 \\ 4 & 6 \end{bmatrix} \begin{bmatrix} x \\ y \end{bmatrix} = \begin{bmatrix} -21 \\ 30 \end{bmatrix}$

3)   3x - 4y = 1
          6x - 2y = -22

4)   -5x + 2y = 0
          -2x - y = 9

5)   5x - 5y = 30
          -8x + 6y = -40

6)   7x + 4y = -6
          -4x - 3y = 7

7)   -8y = -21 + x
          -5y – 4x = -3

8)   -3x = y + 6
          6x + 3y = -15

9) A Lillian used this method to solve a system of linear equations, like the systems above. However, her calculator informed her of an error. Reviewing the work, her and several other students encountered the same situation and had no errors. Explain on the other side of this sheet why their calculators are reporting an error.