Algebra 2 Name_____

Finding the Inverse Matrix

Date_____ Period____

Find the inverse of each matrix.

1) $\begin{bmatrix} -1 & -3 \\ 5 & 10 \end{bmatrix}$

2) $\begin{bmatrix} -3 & -5 \\ 5 & -2 \end{bmatrix}$

3) $\begin{bmatrix} 0 & 5 \\ 0 & 0 \end{bmatrix}$

4) $\begin{bmatrix} -2 & 5 \\ -7 & -5 \end{bmatrix}$

5) $\begin{bmatrix} -12 & -4 \\ -8 & -5 \end{bmatrix}$

Find the inverse of each matrix. Use scalar multiplication to multiply the constant into the matrix.

6) $\begin{bmatrix} 8 & -5 \\ -10 & 5 \end{bmatrix}$

7) $\begin{bmatrix} 8 & 9 \\ 6 & 8 \end{bmatrix}$

8) $\begin{bmatrix} 2 & 6 \\ 1 & 7 \end{bmatrix}$

9) $\begin{bmatrix} 3 & -5 \\ 3 & -6 \end{bmatrix}$

10) $\begin{bmatrix} -3 & -2 \\ 0 & -3 \end{bmatrix}$

Find the inverse of each matrix using your calculator.

11) $\begin{bmatrix} -4 & 2 \\ 1 & 0 \end{bmatrix}$

12) $\begin{bmatrix} 0 & 1 \\ 0 & -2 \end{bmatrix}$

13) $\begin{bmatrix} -4 & -3 \\ 4 & 9 \end{bmatrix}$

14) $\begin{bmatrix} -7 & -12 \\ -9 & 4 \end{bmatrix}$

15) $\begin{bmatrix} 8 & 0 \\ -1 & -8 \end{bmatrix}$

16) $\begin{bmatrix} 3 & -5 \\ 1 & 0 \end{bmatrix}$

17) $\begin{bmatrix} -3 & -1 \\ -9 & -3 \end{bmatrix}$

18) $\begin{bmatrix} -6 & 3 \\ 8 & -7 \end{bmatrix}$

19) $\begin{bmatrix} 5 & -5 \\ 2 & -2 \end{bmatrix}$

20) $\begin{bmatrix} -9 & 9 \\ 9 & -10 \end{bmatrix}$