

## MATH 335 Quiz 2

Name: \_\_\_\_\_

---

---

Show all work. 10 points each.

1. Let  $A = \begin{bmatrix} 0 & -8 & 5 \\ 3 & -7 & 4 \\ -1 & 5 & -4 \\ 1 & -3 & 2 \end{bmatrix}$ . Give the reduced echelon form of  $A$  and determine if the columns of  $A$  form a linearly independent set. Why or why not?

2. Find the matrix of the linear transformation  $T(x_1, x_2, x_3) = (x_1 - 5x_2 + 4x_3, x_2 - 6x_3)$ . Then determine if the transformation is 1-1 or onto. Explain.