Directions: Please answer in the space provided. Please show all of your work and indicate your row operations. No calculators. Please put all phones, etc., away.

1. Use either *Gaussian Elimination* or *Gauss-Jordan Elimination* to solve the following system.

$$\begin{cases} 2w + 4x + y + 8z = 4 \\ w + 2x + 2z = 1 \\ w + 2x + y + 6z = 3 \end{cases}$$