1. What are the 3 types of elementary row operations?

2. What conditions on a matrix define reduced row echelon form?

3. Define two matrices A and B by

$$A = \begin{bmatrix} 1 & 2 & 0 & 5 \\ 0 & 1 & 0 & 2 \\ 0 & 0 & 1 & 2 \end{bmatrix} \qquad B = \begin{bmatrix} 1 & 2 & 5 & 0 \\ 0 & 0 & 0 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}$$

Are these matrices in reduced row echelon form? Why or why not?