

NAME: \_\_\_\_\_ EID: \_\_\_\_\_

**Exam 2 Question 1 427J**

1. Let

$$\vec{v} = \begin{bmatrix} -17 \\ -7 \\ -10 \\ 15 \end{bmatrix} \text{ and } S = \left\{ \begin{bmatrix} 5 \\ 2 \\ 3 \\ -4 \end{bmatrix}, \begin{bmatrix} 2 \\ 1 \\ 1 \\ -3 \end{bmatrix}, \begin{bmatrix} -8 \\ -3 \\ -5 \\ 5 \end{bmatrix} \right\}.$$

Use parametric form to show  $\vec{v} \in \text{Span}(S)$ .