Provide both a clear and organized presentation. Solve the $\operatorname{VDE} \bar{x}^{\prime}=A \bar{x}$ if:

$$
A=\left[\begin{array}{lll}
1 & 1 & 0 \\
0 & 1 & 0 \\
1 & 1 & 2
\end{array}\right]
$$

