

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

**Quiz 427J**

1. Let

$$A = \begin{bmatrix} 1 & -4 \\ 1 & -3 \end{bmatrix}$$

(a) What is the general solution to the system

$$\frac{d}{dt}\vec{x} = A\vec{x} ?$$

(b) What is  $e^{At}$ ?