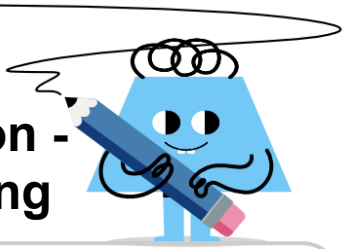
Name

Exponential Function Solution Equation - Decay (Continuous) Equation to Starting Value



1 Rearrange this equation to solve for the starting population given this model of a a continuously declining bacteria population?

$$171 = P_0 \cdot e^{(-0.07 \cdot 8)}$$

A	$P_0 = \frac{e^{(-0.07 \cdot 8)}}{171}$	B	$P_0 = \frac{171}{e^{(\frac{-0.07}{8})}}$
C	$P_0 = \frac{171}{e^{(-0.07 \cdot 8)}}$		

2 Rearrange this equation to solve for the starting concentration given this model of a continuous reduction of a toxin concentration?

$$798 = C_0 \cdot e^{(-0.04 \cdot 3)}$$

A	$C_0 = \frac{798}{e^{(-0.04 \cdot 3)}}$	B	$C_0 = \frac{798}{e^{(\frac{-0.04}{3})}}$
C	$C_0 = \frac{e^{(-0.04 \cdot 3)}}{798}$		

3 Rearrange this equation to solve for the starting population given this model of a continuous decline of a bird population?

$$157 = P_0 \cdot e^{(-0.06 \cdot 4)}$$

A	$P_0 = \frac{157}{e^{(\frac{-0.06}{4})}}$	B	$P_0 = \frac{157}{e^{(-0.06 \cdot 4)}}$
C	$P_0 = \frac{e^{(-0.06 \cdot 4)}}{157}$		

4 Rearrange this equation to solve for the starting concentration given this model of a continuous reduction of a toxin concentration?

$$488 = C_0 \cdot e^{(-0.04 \cdot 9)}$$

A	$C_0 = \frac{488}{e^{(\frac{-0.04}{9})}}$	B	$C_0 = \frac{488}{e^{(-0.04 \cdot 9)}}$
C	$C_0 = \frac{e^{(-0.04 \cdot 9)}}{488}$		

5 Rearrange this equation to solve for the starting concentration given this model of a continuous decay of a radioactive material?

$$511 = R_0 \cdot e^{(-0.02 \cdot 8)}$$

A	$R_0 = \frac{511}{e^{(\frac{-0.02}{8})}}$	B	$R_0 = \frac{e^{(-0.02 \cdot 8)}}{511}$
C	$R_0 = \frac{511}{e^{(-0.02 \cdot 8)}}$		

6 Rearrange this equation to solve for the starting population given this model of a continuous decline of a whale population?

$$157 = P_0 \cdot e^{(-0.03 \cdot 8)}$$

A	$P_0 = \frac{157}{e^{(-0.03 \cdot 8)}}$	B	$P_0 = \frac{157}{e^{(\frac{-0.03}{8})}}$

7 Rearrange this equation to solve for the starting population given this model of a a continuously declining bacteria population?

$$736 = P_0 \cdot e^{(-0.04 \cdot 5)}$$

A	$P_0 = \frac{736}{e^{(-0.04 \cdot 5)}}$	B	$P_0 = \frac{736}{e^{(\frac{-0.04}{5})}}$
C	$P_0 = \frac{e^{(-0.04 \cdot 5)}}{736}$		

8 Rearrange this equation to solve for the starting population given this model of a continuous decline of a whale population?

$$709 = P_0 \cdot e^{(-0.04 \cdot 3)}$$

A	$P_0 = \frac{709}{e^{(\frac{-0.04}{3})}}$	B	$P_0 = \frac{e^{(-0.04 \cdot 3)}}{709}$
C	$P_0 = \frac{709}{e^{(-0.04 \cdot 3)}}$		