

Lesson3

word problem

1. The resale value of a certain industrial machine decreases at a rate that depends on its age. When the machine is t years old, the rate at which its value is changing is $-100 e^{-0.2t}$ dollars per year.
 - a. Express the value of the machine in terms of its age and initial value.
 - b. If the machine was originally worth \$4200, how much will it be worth when it is 5 years old?