

Math 131 (Term 133) - Quiz 1

Student Name _____ Student ID: _____

Exercise 1

A small business predicts its revenue growth by a straight-line method with a slope of **10,000 SR** per year. In its tenth year, it had revenues of **110,000 SR**. Find an equation that describes the relationship between the revenue ***R*** and the number of years ***T*** since it opened for business.

Exercise 2

A marketing firm estimates that ***n*** months after the introduction of a client's new product, ***f(n)*** thousand households will use it, where

$$f(n) = \frac{6}{5}n(10 - n), 0 \leq n \leq 10.$$

Estimate the maximum number of households that will use the product.