## QUIZ 6 - MATH 111 YOUR NAME:

Read each problem **very carefully** before starting to solve it. Each problem is worth 5 points. It is necessary to show **all** your work. Correct answers without explanations are worth 0 points. GOOD LUCK!!

- 1. A school is taking a busload of students to a science fair. It costs \$350 to drive the bus to the fair and back and the admission fee is \$4.50 per student.
  - (a) Write a formula for the total cost C of the trip as a function of the number n of students attending the trip.
  - (b) Identify the slope and the initial value of your model and explain what they mean.

(c) Explain the meaning of C(25) precisely and then calculate its value.

(d) Solve the equation C(n) = 606.50 showing all steps and explain what the answer represents.

2. Suppose that the vertices of a given triangle are at the points A = (-53, 12), B = (750, -810)and C = (102, 120) on the Cartesian plane. Please, **show all your work** in answering the following question: Is the triangle *ABC* a right triangle?