Quiz 7 **Name:** _____
Week 9: 03/10/2020
Math 285: Spring 2020
Instructor: Garrett Hartshaw

Instructions:
Please answer the questions below. Show all your work. You may use a TI-84/85 (or equivalent) calculator.

Let $f(x) = 2x^3 - 3x^2 - 36x + 12$.

Problem 1. (5 points) On which intervals is $f(x)$ increasing or decreasing?

Problem 2. (5 points) For what values of x does $f(x)$ have a maximum or a minimum?

Problem 3. (5 points) On which intervals is $f(x)$ concave up or concave down?

Problem 4. (5 points) For what values of x does $f(x)$ have an inflection point?