Name: _____

Student ID: _____

Quiz 3

This quiz is graded out of 10 marks. No books, calculators, notes or cell phones are allowed. You must show all your work, the correct answer is worth 1 mark the remaining marks are given for the work. If you need more space for your answer use the back of the page.

Question 1. *(5 marks)* §5.1 #5c Estimate the area under the graph of $f(x) = 1 + x^2$ from $x = -1$ to $x = 2$ using three rectangles and the midpoints. Sketch the curve and the approximating rectangles.

Question 2. *(5 marks)* §5.2 #21 Use the form of the definition of the integral given to evaluate the integral.

$$\int_{-2}^{0} (x^2 + x)\, dx$$