Very short answer questions

1. (a) [3 marks] What is the worth, after 9 months, of an investment of $200 with a nominal interest rate of 15% compounded quarterly?

   Answer:

(b) [2 marks] How fast is the investment (from part (a)) growing after 9 months?

   Answer:
2. Find the absolute maximum and minimum of $f(x) = x^{2/3} + x$ on $[-1, 1]$ (value and point).

Answer:

3. A kite is flying 40 meters above the ground when the wind starts to blow it away in a direction parallel to the ground at the rate of $4 \text{ m/sec}$. At what rate must the string be let out when the length of string already let out is 80 meters?

Answer: