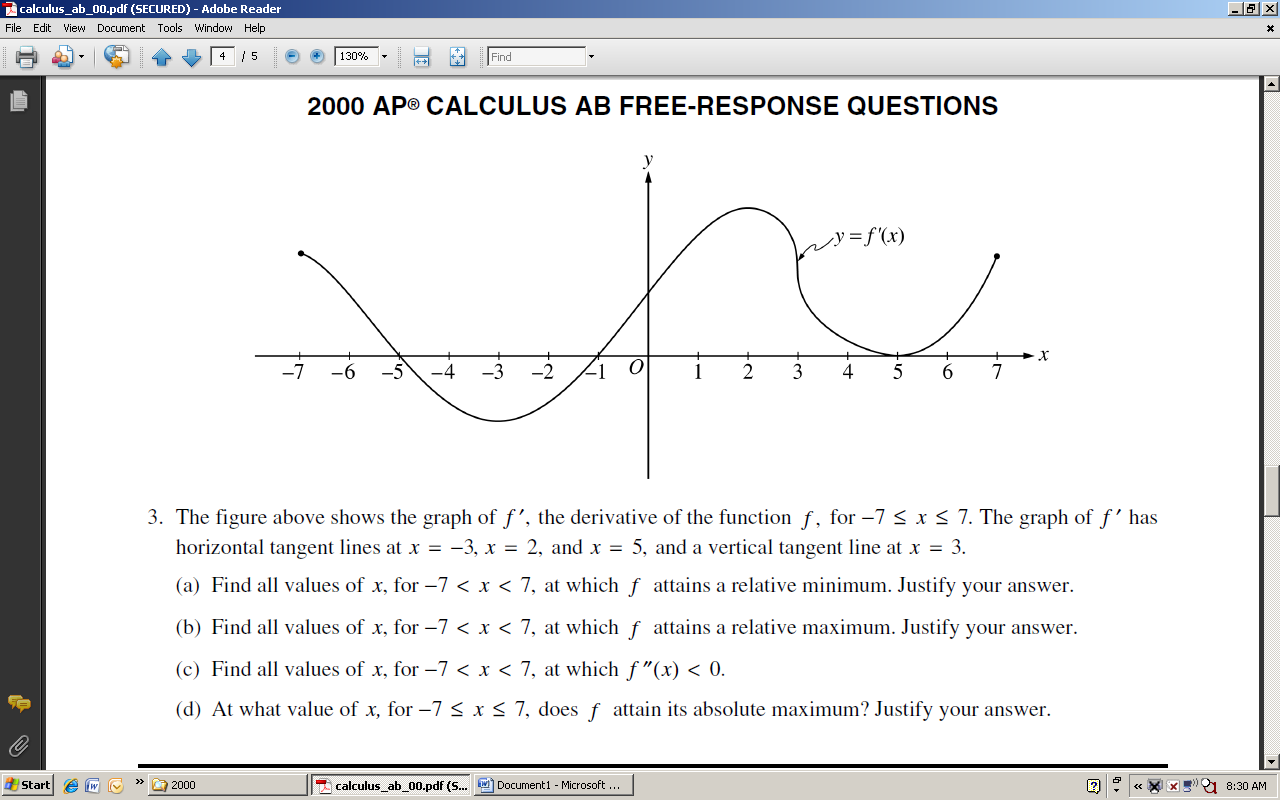
**Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**

**April 16th, 2012**

**AP Calculus 1, Mrs. Sulkes**



**1971 AB3**

Consider  over one complete period beginning with .

1. Find all values of in this period at which .
2. Find all values of in this period at which the function has a minimum. Justify your answer.
3. Over what intervals in this period is the curve concave up? Explain your answer.