

Calculus II. Quiz 9. Name \_\_\_\_\_ Time \_\_\_\_\_

Show all work for full or partial credit. Put a box around your final answer in each part.

1. Find a Maclaurin series for the following functions, by starting with a known fact from the list of known Maclaurin series. You don't need to simplify.

(a)  $f(x) = e^{3x^2}$

(b)  $f(x) = x \cos(3x)$

2. Find the  $n = 3$  term of the Taylor series for  $f(x) = x^3 + e^{2x}$  centered at  $a = 5$ .