

AP Calculus AB – Blackwell
Rubber Band – Chain Rule Practice – Lab 3

Name _____

Find the derivative of each of the following functions. *Please put your final answer on the blank line. Your work should be attached to this page in order to receive full credit.*

1. _____ $y = (x^2 + 4x + 6)^5$

2. _____ $f(x) = (x^3 - 5x)^4$

3. _____ $y = \cos(x^3)$

4. _____ $y = \cos^3 x$

5. _____ $y = (2x^2 - 6x + 1)^{-8}$

6. _____ $y = \sqrt{x^2 - 7x}$

7. _____ $y = \frac{1}{(x^2 - 2x - 5)^4}$

8. _____ $f(x) = \left(x - \frac{1}{x}\right)^{\frac{3}{2}}$

9. _____ $y = \sin^2(\cos(4x))$

10. _____ $y = \sin^3(2x + 3)$

