Math 104 90A[1] September, 22nd, 1999. Worksheet 4
http://www.math.ubc.ca/~ athreya/104

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1. Find the derivative of each of the following functions, using the rules of differentiation defined so far. For each question state the rules that you use.
   (a) $y = (6x^3 + 5)(7x^4 + 3)$
   (b) $f(x) = \frac{x^2+x-2}{x^3+6}$
   (c) $s = t^{-\frac{1}{3}}(1 - t)$
   (d) $c = \frac{16(2\sqrt{I}+3)}{I^2+3}$

2. Esso in a news release stated that the price (p) for producing q litres of oil was

$$p = \frac{q^2 - 3q^{-\frac{5}{3}}}{q(q+3)}$$

   (a) What is total revenue for producing q litres of oil ?
   (b) What is the marginal revenue ?

[1] **Office hours:** Monday: 1:45-3:15pm, Tuesday:3:30-5:30pm, Wednesday 2:15-3:15pm