

17p239

1. $f(x) = (2x - 1)(x + 4)$
 $u = (2x - 1)v = (x + 4)$
 $u' = 2v' = 1$
 $f'(x) = 2x + 8 + 2x - 1$
 $f'(x) = 4x + 7$

2. $g(x) = x(5 - 3x)$
 $u = xv = (5 - 3x)$
 $u' = 1v' = -3$
 $f'(x) = 5 - 3x + (-3x)$
 $f'(x) = 5 - 6x$

34p240

1. $h(x) = x^2(3x + 2)$
 $u = x^2v = (3x + 2)$
 $u' = 2xv' = 3$
 $f'(x) = 6x^2 + 4x + 3x^2$
 $f'(x) = 9x^2 + 4x$

2. $u(x) = (3x^2 + 2x - 1)(2x - 5)$
 $u = (3x^2 + 2x - 1)v = (2x - 5)$
 $u' = (6x^2 + 2)v' = 2$
 $u'(x) = 12x^3 - 30x^2 + 4x - 10 + (6x^2 + 10x - 2)$
 $u'(x) = 12x^3 - 24x^2 + 14x - 12$