Algebraic Fractions Homework

6 Simplify each of these. Factorise and cancel where appropriate.

a $\frac{3x}{4} + \frac{x}{4}$

b $\frac{3x}{4} - \frac{x}{4}$

c $\frac{3x}{4} \times \frac{x}{4}$

d $\frac{3x}{4} \div \frac{x}{4}$

e $\frac{3x+1}{2} + \frac{x-2}{5}$

f $\frac{3x+1}{2} - \frac{x-2}{5}$

g $\frac{3x+1}{2} \times \frac{x-2}{5}$

h $\frac{x^2-9}{10} \times \frac{5}{x-3}$

i $\frac{2x+3}{5} \div \frac{6x+9}{10}$

j $\frac{2x^2}{9} - \frac{2y^2}{3}$

Please complete and hand in on Friday 4 March.