

Pencils and Erasers Only – No Calculators Needed.

- 1 Factor and simplify the expression and eliminate any negative exponents:

$$-2(x - 2)(x + 3)^{-3/2} + (x + 3)^{-1/2}$$

- 2 Part of finding the difference quotient for

$$f(x) = 52 - 2x - 3x^2$$

is to find  $f(x + h)$ . Find  $f(x + h)$  and carry out all the operations indicated therein.