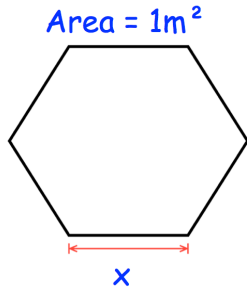




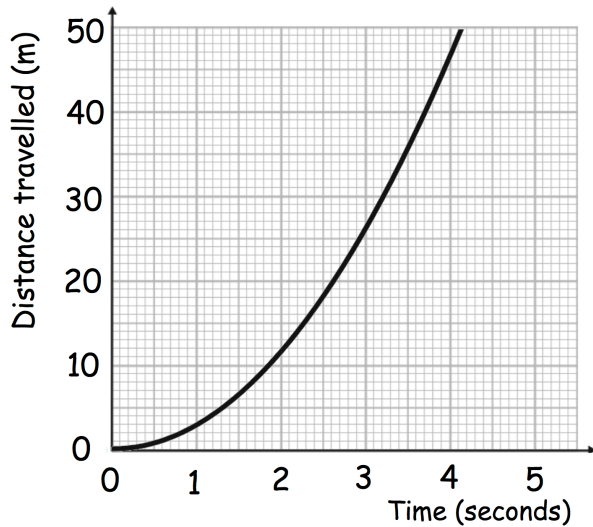
Factorise fully

$$(x + 2)^4 - (x - 3)(x + 2)^2$$



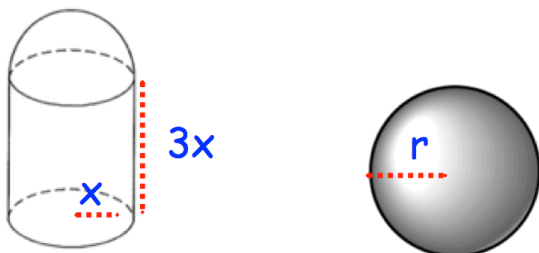
Shown is a regular hexagon.  
Find  $x$

The graph shows information about part of a dog's journey.



Work out an estimate of the distance travelled by the dog over the first 4 seconds.

Is your answer an underestimate or an overestimate?



Both shapes have the same volume.  
Express  $r$  in terms of  $x$ .