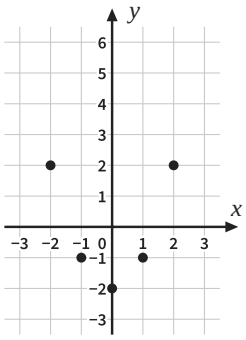
Graph transformations: translations *lesson handout*

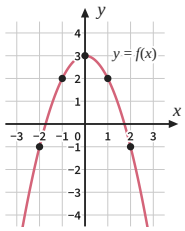
Turn and talk

Add 3 to the y coordinate of every point.
Plot the new points.



We do

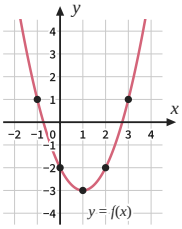
Sketch the graph of $y = f(x) - 2$.



x	−2	−1	0	1	2
$f(x)$	−1	2	3	2	−1
$f(x) - 2$					

You do

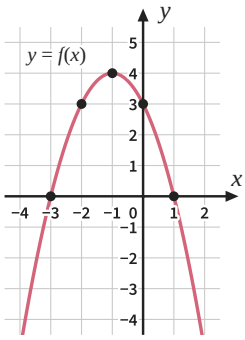
Sketch the graph of $y = f(x) + 2$.



x	−1	0	1	2	3
$f(x)$					
$f(x) + 2$					

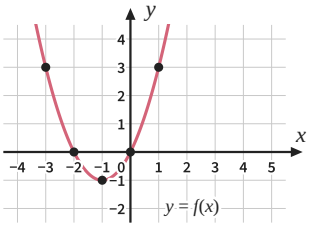
You do

Sketch the graph of $y = f(x) - 3$.



We do

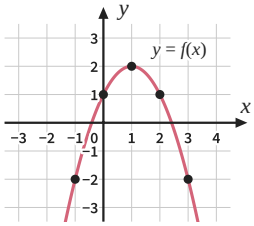
Sketch the graph of $y = f(x - 3)$.



x	0	1	2	3	4
$x - 3$	−3	−2	−1	0	1
$f(x - 3)$					

You do

Sketch the graph of $y = f(x + 1)$.



x	−2	−1	0	1	2
$x + 1$					
$f(x + 1)$					

You do

Sketch the graph of $y = f(x - 2)$.

