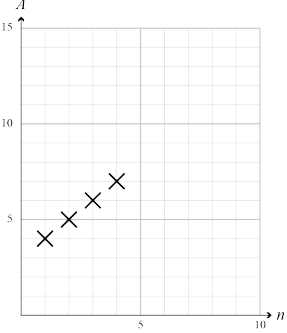
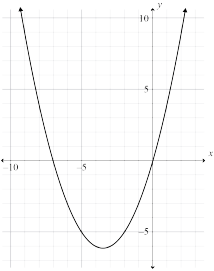


Assessment Schedule – 2014

Mathematics and Statistics: Investigate relationships between tables, equations and graphs (91028)

Evidence Statement

Q	Evidence	Achievement	Achievement with Merit	Achievement with Excellence												
ONE (a)(i)	Table completed <table border="1" style="margin-left: auto; margin-right: auto;"> <tr><td style="padding: 5px;">1</td><td style="padding: 5px;">4</td></tr> <tr><td style="padding: 5px;">2</td><td style="padding: 5px;">5</td></tr> <tr><td style="padding: 5px;">3</td><td style="padding: 5px;">6</td></tr> <tr><td style="padding: 5px;">4</td><td style="padding: 5px;">7</td></tr> <tr><td colspan="2" style="padding: 10px 0 10px 20px;"> </td></tr> <tr><td style="padding: 5px;">7</td><td style="padding: 5px;">10</td></tr> </table>	1	4	2	5	3	6	4	7			7	10	Table correct.		
1	4															
2	5															
3	6															
4	7															
7	10															
(ii)	Graph of $A = n + 3$ 	Correct graph with points joined.	Correct graph with discrete points.													
(iii)	$A = 3n + 9$	Correct.														
(iv)	54	Correct.														
(b)(i)	Graph $y = (x^2 + 7x) / 2$ 	Graph of $x^2 + 7x$	Some errors.	Correct graph.												
(ii)	Discrete points – you cannot have fractional number of cans. First point is (1,4) or No points for $n < 1$. There would be no display if you didn't have any cans, and the number of cans cannot be negative.	One reason.	Either ONE reason with explanation. OR TWO reasons without explanation.	Full explanation.												

NØ	N1	N2	A3	A4	M5	M6	E7	E8
No response; no relevant evidence.	Some evidence.	1 of u	2 of u	3 of u	1 of r	2 of r	1 of t	2 of t

Q	Evidence	Achievement	Achievement with Merit	Achievement with Excellence
TWO (a)(i)	$y = (x - 2)(x + 4)$	Some errors in equation.	Equation correct.	
(ii)	$-4 < x < 2$	ONE section correct OR correct with minor errors.	BOTH sections identified.	
(b)	y intercept. The value of the function when $x = 0$	Correct.		
(c)(i)	(0.5, -0.25)	ONE coordinate correct.	Correct coordinates.	
(ii)	All points would be twice as high as they are now, then reflected in the x -axis. The parabola would be twice as steep and it would be upside-down.	Some aspect correctly identified.	Incomplete description.	Full description.
(iii)	$y = (x - 5)^2 - (x - 5) + 15$ $= x^2 - 11x + 45$	15 added.	-5 and 15 in equation.	Simplified equation.

NØ	N1	N2	A3	A4	M5	M6	E7	E8
No response; no relevant evidence.	Some evidence.	1 of u	2 of u	3 of u	1 of r	2 of r	1 of t	2 of t

Question	Evidence	Achievement	Achievement with Merit	Achievement with Excellence
THREE (a)(i)	Graph of $A = 450 - 15w$ <i>As a step function (end points do not need to be open / closed correctly).</i>	Drawn as continuous line.	Discrete graph with dots.	Step function.
(ii)	$A = 450 - 15w$	Gradient correct.	Equation correct.	
(iii)	Graph $A = 500 - 20w$ drawn from $w = 10$	Drawn as continuous line.	Discrete graph with dots.	
(iv)	10	Correct solution.		
(v)	$y = -20w + 500$	Gradient correct.	Correct equation.	
(b)	$y = 2^{(x+1)} - 3$		ONE error in equation.	Correct equation.

NØ	N1	N2	A3	A4	M5	M6	E7	E8
No response; no relevant evidence.	Some evidence.	1 of u	2 of u	3 of u	1 of r	2 of r	1 of t	2 of t

Cut Scores

	Not Achieved	Achievement	Achievement with Merit	Achievement with Excellence
Score range	0 – 6	7 – 13	14 – 18	19 – 24