**Summary:**

100000+ variations. Graphing quadratics. Turning point. Line of symmetry. Transformations of quadratics.

**Question: >100 000 Variations**

1. Complete the following table by matching each graph (A, B, C, D, E, F) with an equation below. Some graphs may not be matched.

 

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b) The graph of *y* = *x*2 is translated  units to the right and  units down. What is the equation of the new parabola?

[2]

c) (i) The graph of is reflected about the *x*- axis, then translated  units left and  units up. What is the equation of the new parabola?

[4]

 (ii) What is the turning point, *y* intercept and equation of line of symmetry of the new curve?

**Solution:**

a)

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| B | D | E | A |

b) 

c) 

d) 