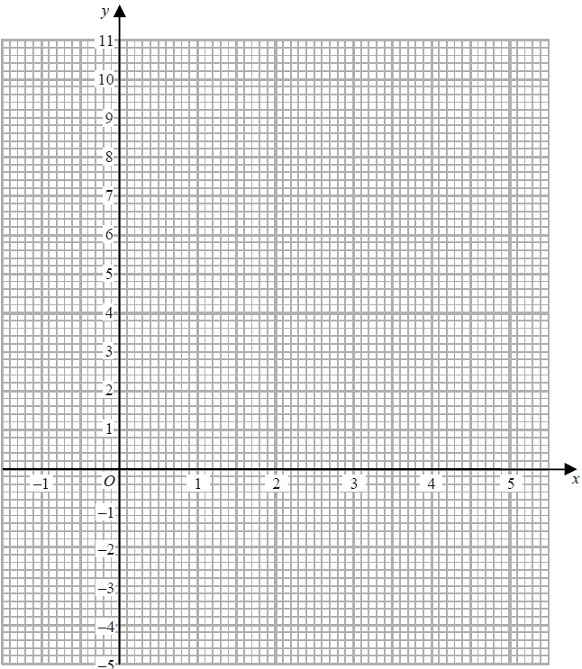
A picture containing drawing

Description automatically generated**Parabolas, Roots and Turning Points GREEN**

1. a)   Complete the table of values for

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |

b)   On the grid below, draw the graph of for values of from to



c)   Find estimates of the solutions of the equation

………………… or …………………

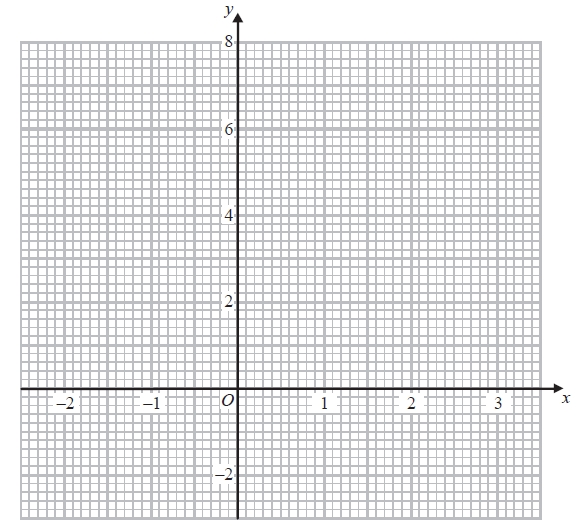
d) Identify the turning point of

(…………………, …………………)

2. a) Complete the table of values for

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |

b) On the grid, draw the graph of for values of from to



c) Find estimates for the solutions of the equation

………………… or …………………

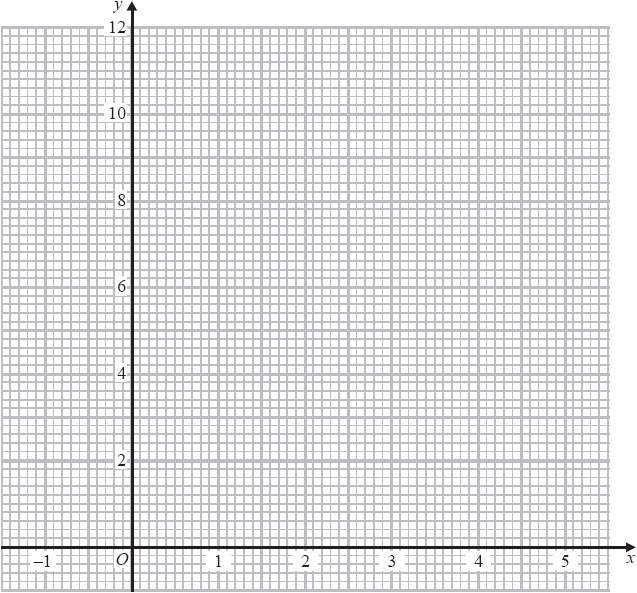
d) Identify the turning point of

(…………………, …………………)

3. a)   Complete the table of values for

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |

b)   On the grid, draw the graph of for values of from to



c)   Find estimates for the solutions of the equation

………………… or …………………

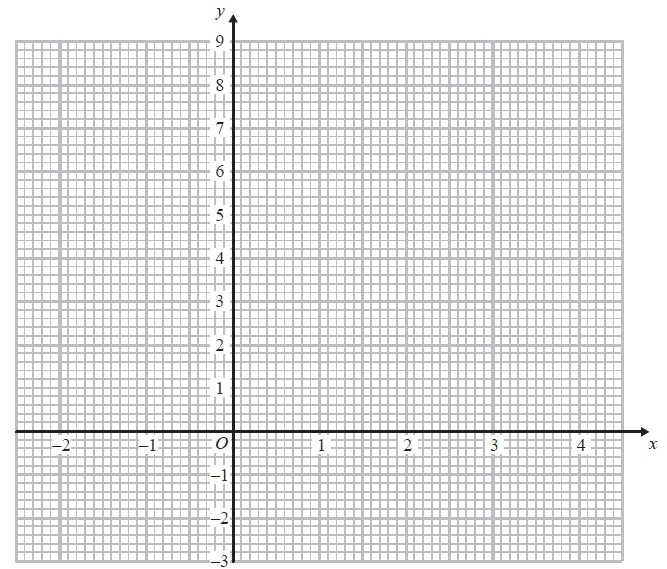
d) Identify the turning point of

(…………………, …………………)

4. a) Complete the table of values for

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |

b) On the grid, draw the graph of for values of from to



c) Solve

………………… or …………………

d) Identify the turning point of

(…………………, …………………)

A picture containing drawing

Description automatically generated**Parabolas, Roots and Turning Points AMBER**

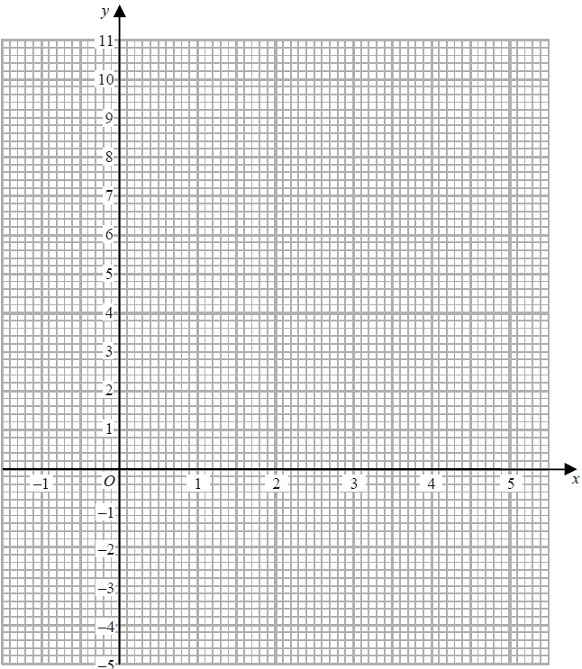
1. a)   Complete the table of values for

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |

Substitute the values into the equation to get the values

b)   On the grid below, draw the graph of for values of from to

Remember to join the coordinates with a single smooth curve



The equation is equal to 0 so identify the roots of the equation

c)   Find estimates of the solutions of the equation

………………… or …………………

d) Identify the turning point of

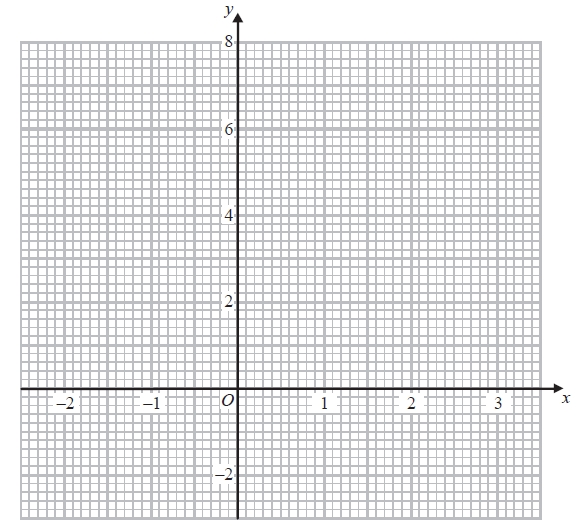
At which coordinate does the graph change direction?

(…………………, …………………)

2. a) Complete the table of values for

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |

b) On the grid, draw the graph of for values of from to



Sketch the graph of and identify the values of the intersection points

c) Find estimates for the solutions of the equation

………………… or …………………

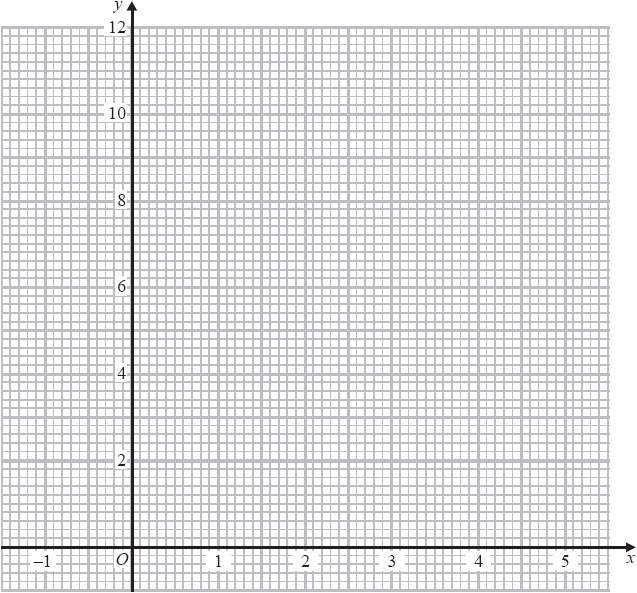
d) Identify the turning point of

(…………………, …………………)

3. a)   Complete the table of values for

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |

b)   On the grid, draw the graph of for values of from to



c)   Find estimates for the solutions of the equation

………………… or …………………

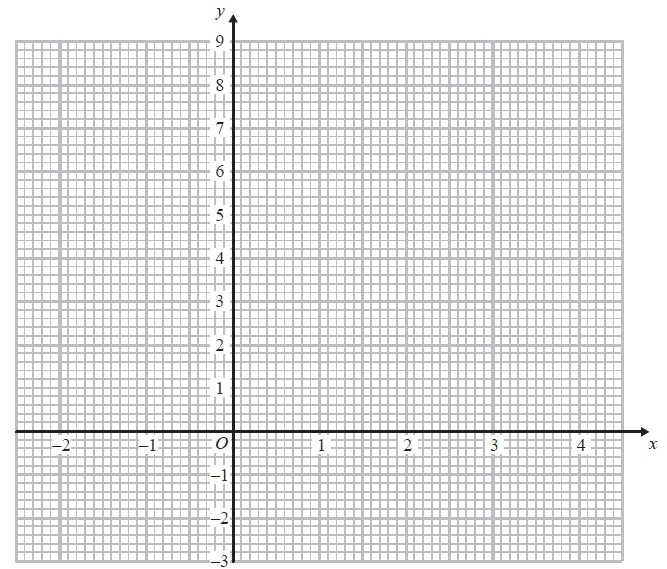
d) Identify the turning point of

(…………………, …………………)

4. a) Complete the table of values for

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |

b) On the grid, draw the graph of for values of from to



c) Solve

………………… or …………………

d) Identify the turning point of

(…………………, …………………)

A picture containing drawing

Description automatically generated**Parabolas, Roots and Turning Points RED**

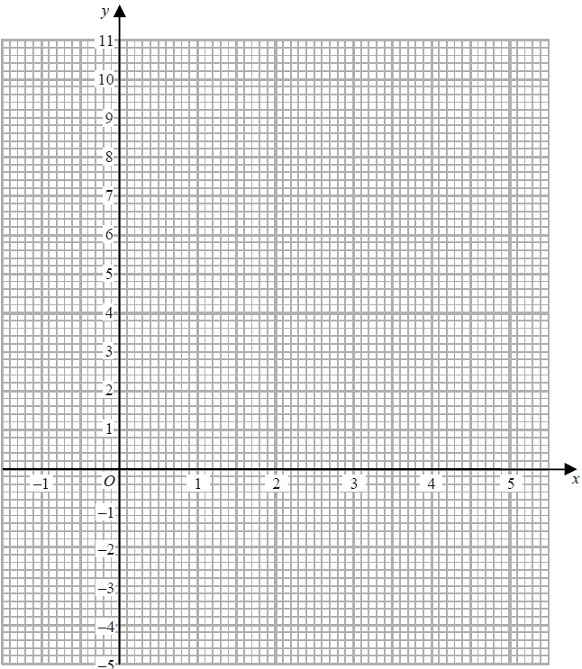
1. a)   Complete the table of values for

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |

Substitute the values into the equation to get the values

b)   On the grid below, draw the graph of for values of from to

Remember to join the coordinates with a single smooth curve



The equation is equal to 0 so identify the roots of the equation

c)   Find estimates of the solutions of the equation

………………… or …………………

d) Identify the turning point of

At which coordinate does the graph change direction?

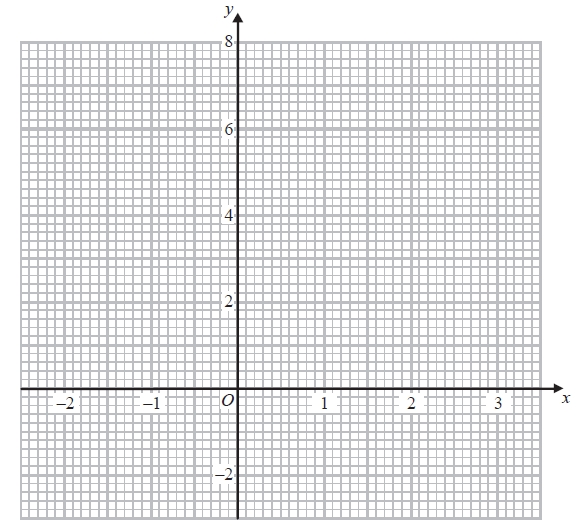
(…………………, …………………)

2. a) Complete the table of values for

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |

b) On the grid, draw the graph of for values of from to

Remember to join the coordinates with a single smooth curve



Sketch the graph of and identify the values of the intersection points

c) Find estimates for the solutions of the equation

………………… or …………………

d) Identify the turning point of

At which coordinate does the graph change direction?

(…………………, …………………)

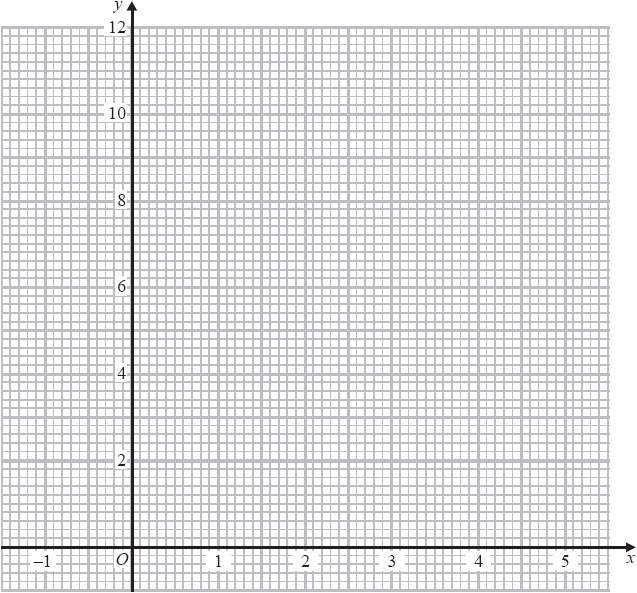
3. a)   Complete the table of values for

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |

Substitute the values into the equation to get the values

b)   On the grid, draw the graph of for values of from to

Remember to join the coordinates with a single smooth curve



Sketch the graph of and identify the values of the intersection points

c)   Find estimates for the solutions of the equation

………………… or …………………

d) Identify the turning point of

At which coordinate does the graph change direction?

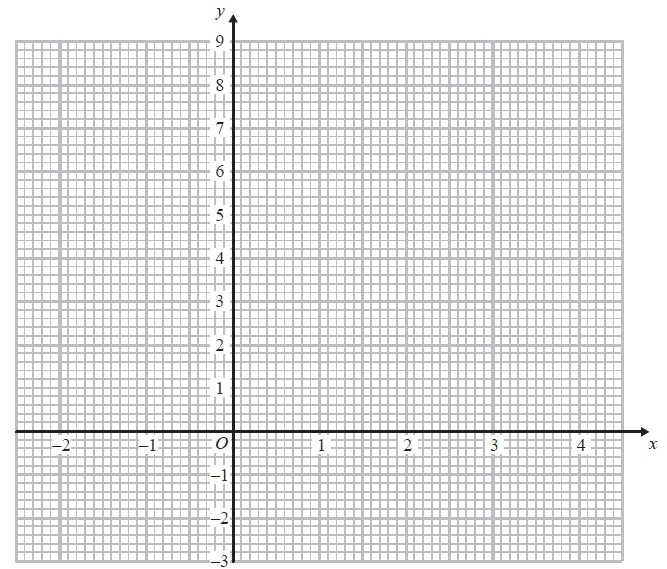
(…………………, …………………)

4. a) Complete the table of values for

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
|  |  |  |  |  |  |  |  |

b) On the grid, draw the graph of for values of from to

Remember to join the coordinates with a single smooth curve



Sketch the graph of and identify the values of the intersection points

c) Solve

………………… or …………………

d) Identify the turning point of

At which coordinate does the graph change direction?

(…………………, …………………)