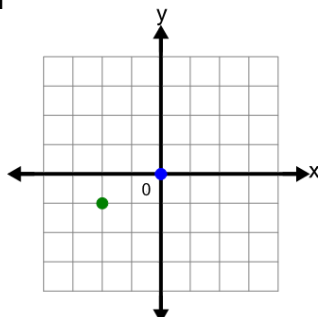


Cartesian Grid - Rotation of Point (Grid to Coordinates) around Point on Axis

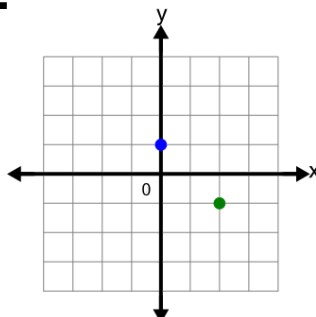
1

Rotate this point by 90°
counter-clockwise about the
origin

A

 $(-2, 1)$

B

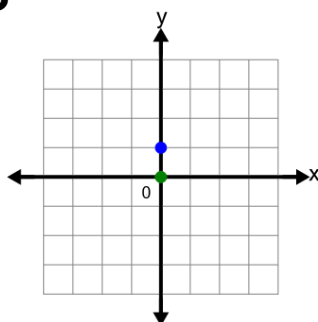
 $(1, -2)$ **2**

Rotate this point by 180°
counter-clockwise about point
 $(0, 1)$

A

 $(-2, 3)$

B

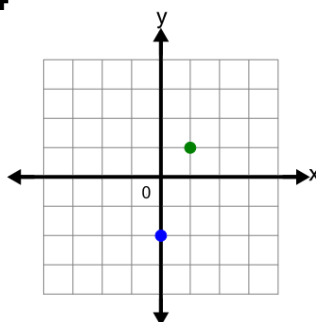
 $(2, -3)$ **3**

Rotate this point by 180°
clockwise about point $(0, 1)$

A

 $(0, 2)$

B

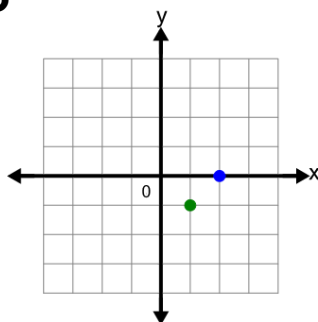
 $(0, -2)$ **4**

Rotate this point by 90°
counter-clockwise about point
 $(0, -2)$

A

 $(-3, -1)$

B

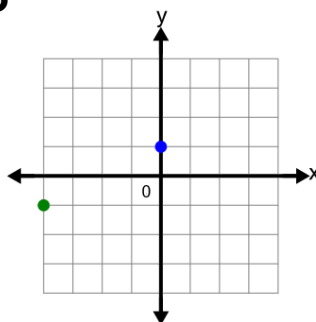
 $(3, -1)$ **5**

Rotate this point by 90°
counter-clockwise about point
 $(2, 0)$

A

 $(3, -1)$

B

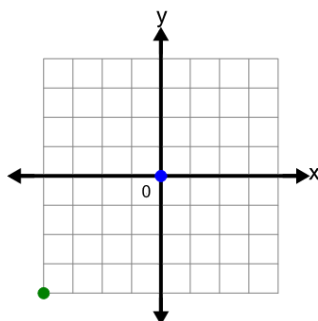
 $(-1, -3)$ **6**

Rotate this point by 180°
clockwise about point $(0, 1)$

A

 $(3, -4)$

B

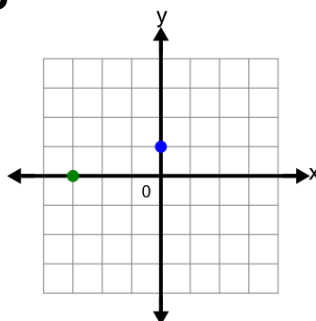
 $(4, 3)$ **7**

Rotate this point by 180°
counter-clockwise about the
origin

A

 $(-4, 4)$

B

 $(4, 4)$ **8**

Rotate this point by 180°
counter-clockwise about point
 $(0, 1)$

A

 $(3, 2)$

B

 $(-2, 3)$