$\qquad$

Performance Task - Graphing to find the vertices of a triangle

1. The equations of the three sides of a triangle are:

$$
y=2 x-4, \quad y=-\frac{1}{2} x+6 \text { and } y=-3 x+1
$$

Graph these lines of the grid below and determine the coordinates of the vertices of the triangle.


The coordinates of the vertices of the triangle are: $\qquad$ , $\qquad$ , $\qquad$ .
$\qquad$

## Performance Task - Math Contest Question

The area of the shaded region is 12 square units.

1. What is the slope of the line through $A B$ ?
2. What is the coordinate of point $B$ ?

Show using both graphical and algebraic methods.


