

parameters	values	description
$\mathbf{m}_1$	$\begin{pmatrix} -2 \\ -4 \end{pmatrix}$	slope of $AB$
$\mathbf{m}_2$	$\begin{pmatrix} 3 \\ 1 \end{pmatrix}$	slope of $BC$
$\mathbf{m}_3$	$\begin{pmatrix} -1 \\ 3 \end{pmatrix}$	slope of $CA$
$\ A - B\ $	4.47	length of $AB$
$\ B - C\ $	3.16	length of $BC$
$\ C - A\ $	3.16	length of $CA$
$\text{rank}\begin{pmatrix} 1 & 1 & 1 \\ \mathbf{A} & \mathbf{B} & \mathbf{C} \end{pmatrix}$	3	non-collinear
$\mathbf{n}_1$	$\begin{pmatrix} -4 \\ 2 \end{pmatrix}$	$AB$
$c_1$	10	
$\mathbf{n}_2$	$\begin{pmatrix} 1 \\ -3 \end{pmatrix}$	$BC$
$c_2$	5	
$\mathbf{n}_3$	$\begin{pmatrix} 3 \\ 1 \end{pmatrix}$	CA
$c_3$	-5	
Area	5	Area of Triangle
$\angle A$	$45^\circ$	Angles
$\angle B$	$45^\circ$	
$\angle C$	$90^\circ$	