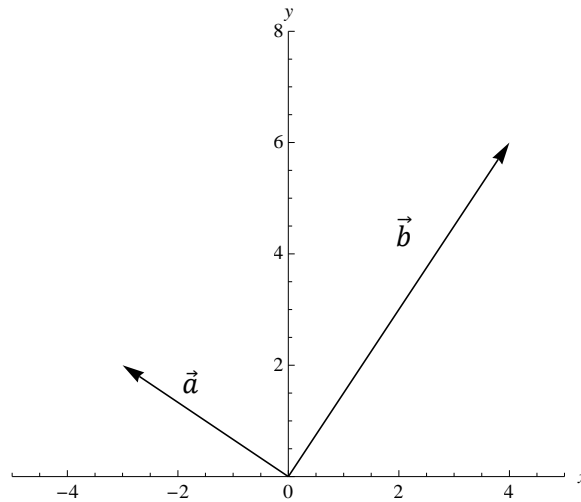


Homework #1

Problem 1. Add the vectors $\vec{a} = \begin{bmatrix} -3 \\ 2 \end{bmatrix}$ and $\vec{b} = \begin{bmatrix} 4 \\ 6 \end{bmatrix}$

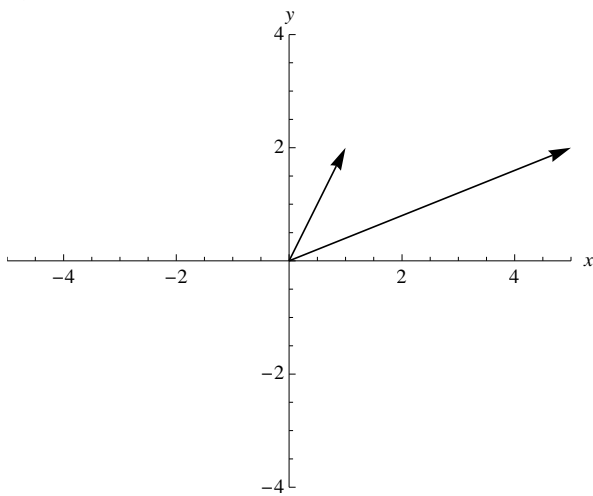


Answer :

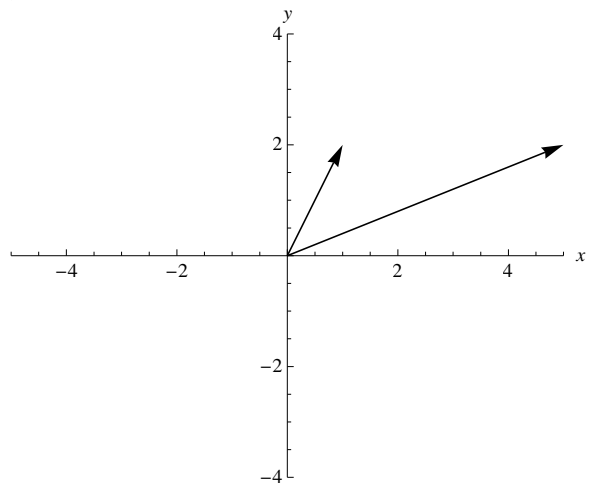
Problem 2. a) Subtract vector $\vec{k} = \begin{bmatrix} 5 \\ 2 \end{bmatrix}$ from vector $\vec{l} = \begin{bmatrix} 1 \\ 2 \end{bmatrix}$

b) Subtract vector $\vec{l} = \begin{bmatrix} 1 \\ 2 \end{bmatrix}$ from vector $\vec{k} = \begin{bmatrix} 5 \\ 2 \end{bmatrix}$

a)



b)



Answer :

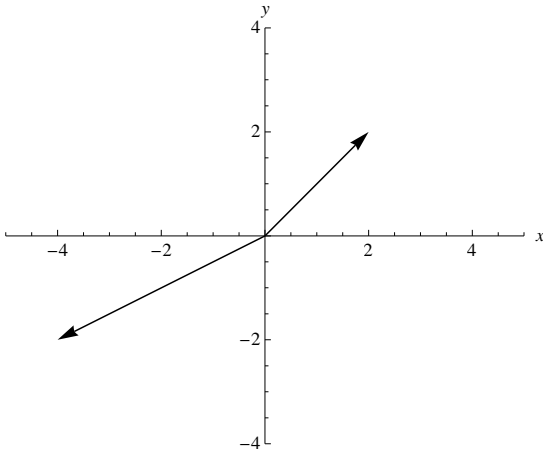
Answer :

Problem 3. a) Multiply the vector $\vec{q} = \begin{bmatrix} 2 \\ 2 \end{bmatrix}$ by 2 and add it to vector $\vec{w} = \begin{bmatrix} -4 \\ -2 \end{bmatrix}$

b) Multiply vector \vec{w} by 1.5 and add it to \vec{q} .

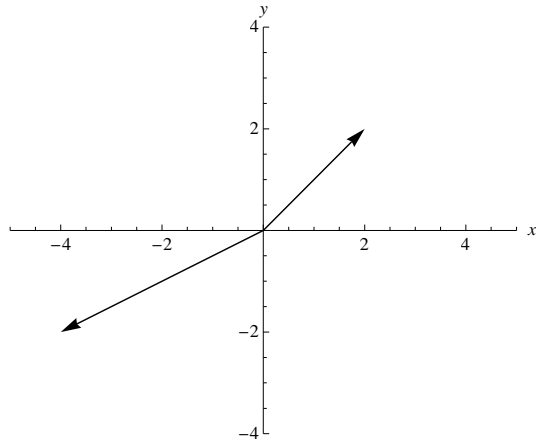
c) Multiply vector \vec{w} by -2 and subtract the vector \vec{q} .

a)



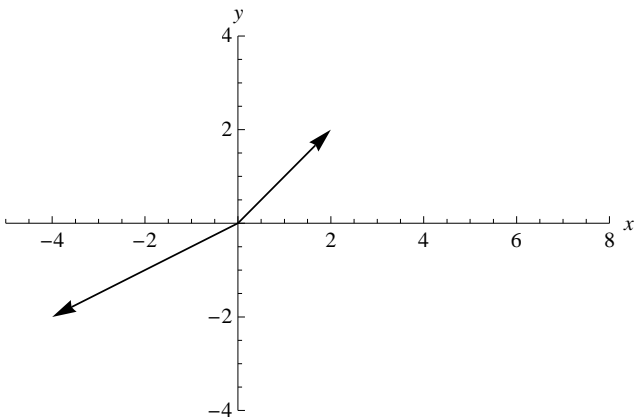
Answer :

b)



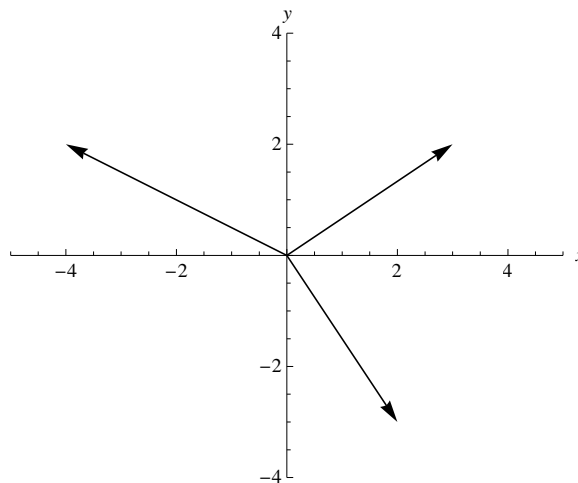
Answer :

c)



Answer :

Problem 4. Add all the vectors:



Answer :