Example #2a p. 3 Ch. 9

Let **u** = <6, -3> and **v** = <–14, 8>. Find

b) $^{-1}/_{2}$ **v**

Multiplying a vector by a scalar is multiplying the components by the scalar

- Multiply the horizontal component by -½

$$-\frac{1}{2}\, v_a = -\frac{1}{2} \bullet -14 = 7$$

- Multiply the vertical component by -½

$$-\frac{1}{2}\, v_b = -\frac{1}{2} \bullet 8 = -4$$

Thus, -½ v is

$-\frac{1}{2}\,\mathbf{v} = \langle 7, -4 \rangle$