

Answer on Question #42437 - Math - Analytic Geometry

$$u = \{-5; -4\}$$

$$v = \{-4; -3\}$$

$$|u| = \sqrt{(-5)^2 + (-4)^2} = 6.4$$

$$|v| = \sqrt{(-4)^2 + (-3)^2} = 5$$

$$u * v = (-5) * (-4) + (-4) * (-3) = 32$$

$$u * v = |u| * |v| * \cos(\widehat{u,v})$$

$$\widehat{u,v} = \arccos\left(\frac{u * v}{|u| * |v|}\right) = \arccos\left(\frac{32}{5 * 6.4}\right) \approx 0$$