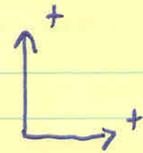
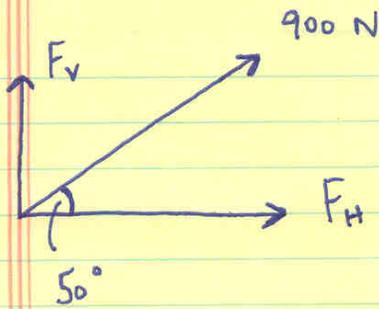


PRACTICE TrG
PROBLEMS

(#1)



$$\cos 50^\circ = \frac{F_H}{900 \text{ N}}$$

$$\sin 50^\circ = \frac{F_V}{900 \text{ N}}$$

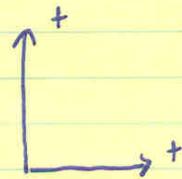
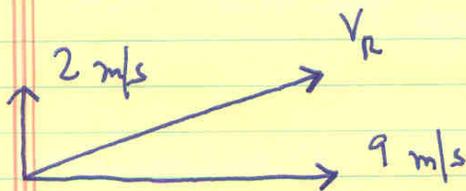
$$(\cos 50^\circ)(900 \text{ N}) = F_H$$

$$(\sin 50^\circ)(900 \text{ N}) = F_V$$

$$= 579 \text{ N}$$

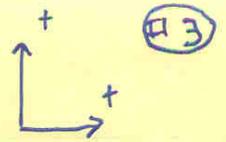
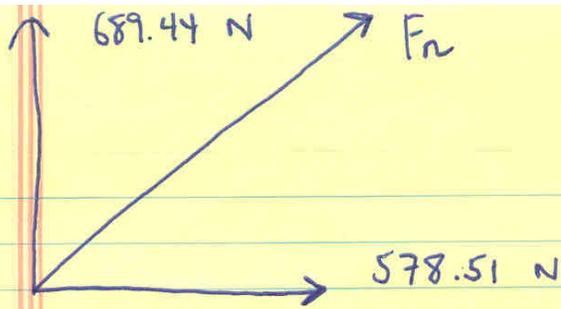
$$= 689 \text{ N}$$

(#2)



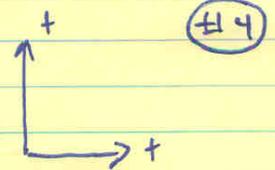
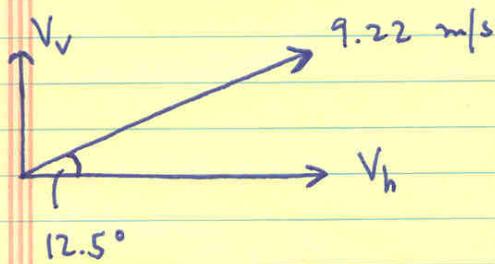
$$V_R^2 = (2 \text{ m/s})^2 + (9 \text{ m/s})^2$$

$$V_R = 9.22 \text{ m/s}$$



$$F_n^2 = (578.51 \text{ N})^2 + (689.44 \text{ N})^2$$

$$F_n = 900 \text{ N}$$



$$\cos 12.5^\circ = \frac{V_h}{9.22 \text{ m/s}}$$

$$\sin 12.5^\circ = \frac{V_v}{9.22 \text{ m/s}}$$

$$(\cos 12.5^\circ)(9.22 \text{ m/s}) = V_h$$

$$V_h = 9 \text{ m/s}$$

$$(\sin 12.5^\circ)(9.22 \text{ m/s}) = V_v$$

$$V_v = 2 \text{ m/s}$$