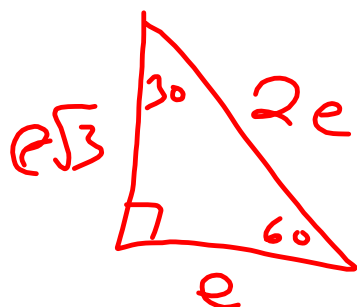
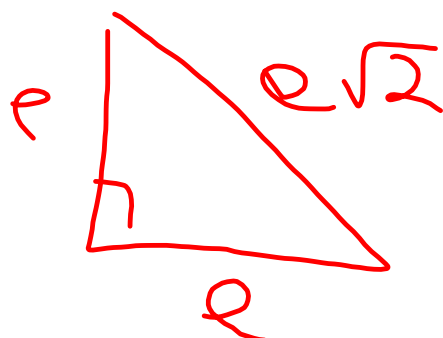


Review 

30-60



45-45



Simplify radicals



Prime factors

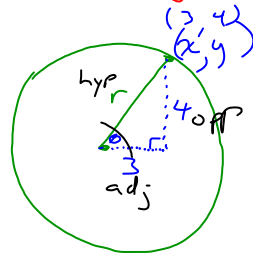
Groups of 2

Trig Ratios

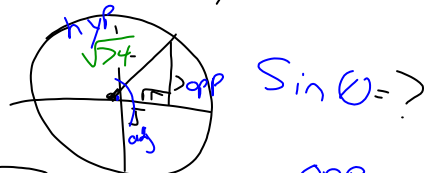
$\sin \theta = \frac{\text{opp.}}{\text{hyp.}}$ Sine

$\cos \theta = \frac{\text{adj}}{\text{hyp}}$ Cosine

$\tan \theta = \frac{\text{opp}}{\text{adj}}$ Tangent

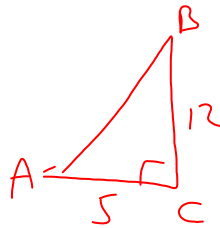


(5, 2)



$\sin \theta = ?$

$$\frac{2}{\sqrt{29}} = \frac{2 \cdot \sqrt{29}}{\sqrt{29} \cdot \sqrt{29}} = \frac{\text{opp}}{\text{hyp}}$$

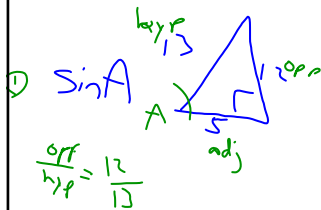


$\sin A$

$\cos B$

$\tan A$

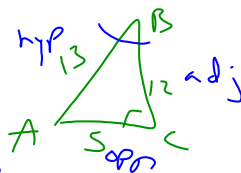
$\tan B$



$\frac{\text{opp}}{\text{hyp}} = \frac{12}{13}$

$5^2 + 12^2 = \text{hyp}^2 = 13^2$

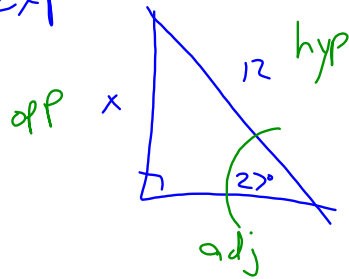
$\tan A = \frac{\text{opp}}{\text{adj}} = \frac{12}{5}$



$\cos B = \frac{\text{adj}}{\text{hyp}} = \frac{12}{13}$

$\tan B = \frac{\text{opp}}{\text{adj}} = \frac{5}{12}$

exp



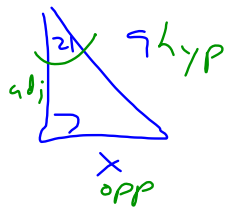
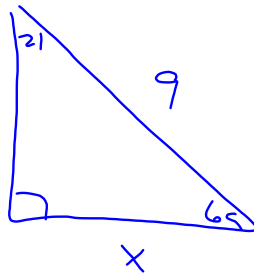
Given
 angle 27° want
 Side 12 hyp opp

$$\sin \theta = \frac{\text{opp}}{\text{hyp}}$$

$$\sin 27^\circ = \frac{x}{12}$$

go to
 table
 + .4540
 decimal

$$12 (.4540 = \frac{x}{12})$$



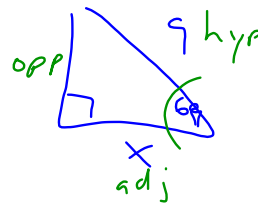
G: $\theta = 21^\circ$ want
 hyp = 9 opp = x

$$\sin 21^\circ = \frac{x}{9}$$

$$9 (.3584 = \frac{x}{9})$$

$$9 \cdot .3584 = x$$

$$3.2256 = x$$



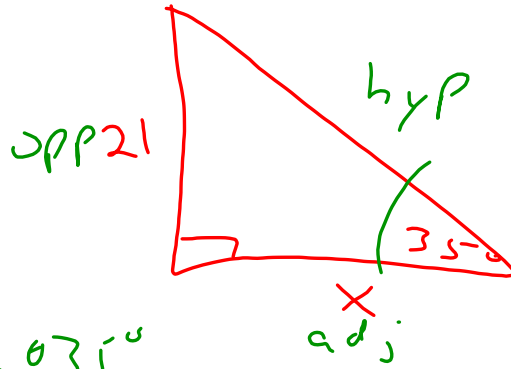
G: $\theta = 65^\circ$
 hyp = 9

want
 adj = x

$$\cos 65^\circ = \frac{x}{9}$$

$$9 (.3584 = \frac{x}{9})$$

$$3.2256 = x$$



G. $\theta = 35^\circ$
 opp = 21

adj
 want
 adj

$$\tan 35 = \frac{21}{x}$$

$$x \left(.7002 = \frac{21}{x} \right)$$

$$.7002 x = 21$$

$$.7002$$

$$x = 29.9914$$

Same problem

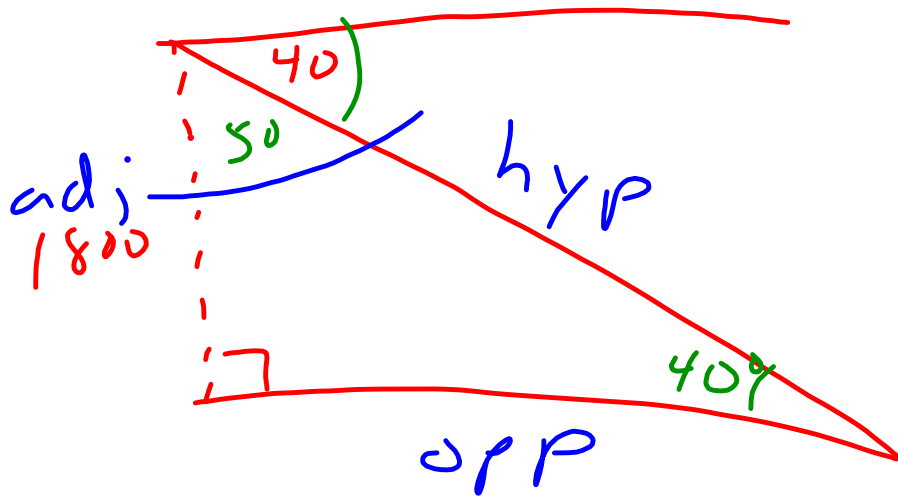


G. $\theta = 55^\circ$ opp
 adj = 21 want
 opp = x

$$\tan 55 = \frac{x}{21}$$

$$21(1.4281 = \frac{x}{21})$$

$$29.9901 = x$$



G: adj = 1800
 $\theta = 50^\circ$

want
 opp = X

$$\tan \theta = \frac{\text{opp}}{\text{adj}}$$

$$\tan 50^\circ = \frac{X}{1800}$$

$$1800 \left(1.1918 = \frac{X}{1800} \right)$$

$$2145.24 = X$$

$$2145 \text{ ft} = X$$

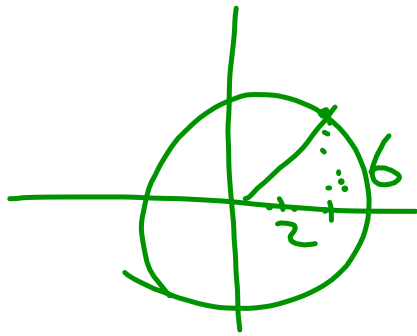
S=O/H | C=A/H | T=O/A

Some $\frac{\text{Old}}{\text{Hen}}$

Caught $\frac{\text{A}}{\text{Horse}}$

Taking $\frac{\text{Oats}}{\text{Away}}$

$(2, 4)$

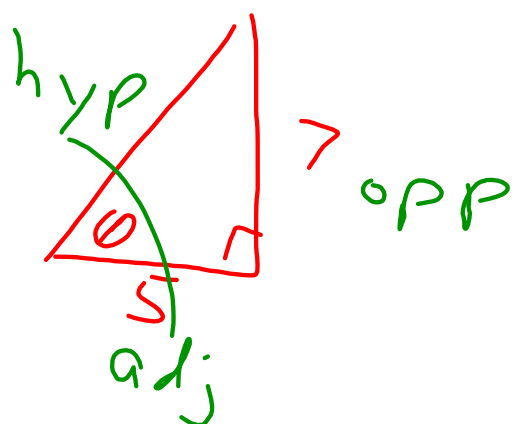
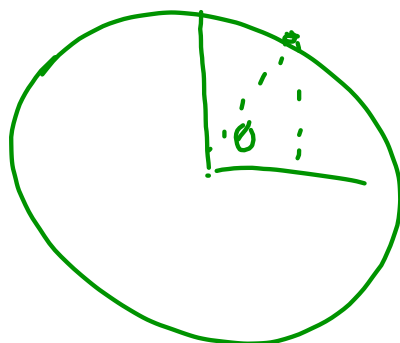


- Draw \triangle
- make \perp
- name side
- write G: W:
- write equation
- subst. in given

$(5, 7)$

point is

find ref. \angle



G: $\text{adj} = 5$ want θ
 $\text{opp} = 7$

$$\tan \theta = \frac{\text{opp}}{\text{adj}}$$

$$\tan \theta = \frac{7}{5}$$