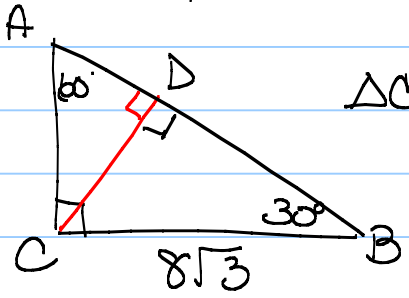
P8 Q8A

Note Title 2/16/2016

9.7: 8) G: $\overline{AB} \perp \overline{BC}$, $\overline{CD} \perp \overline{AB}$, $\angle B = 30°$, & $\overline{BC} = 8\sqrt{3}$



$\triangle CDB$ 30 60 90

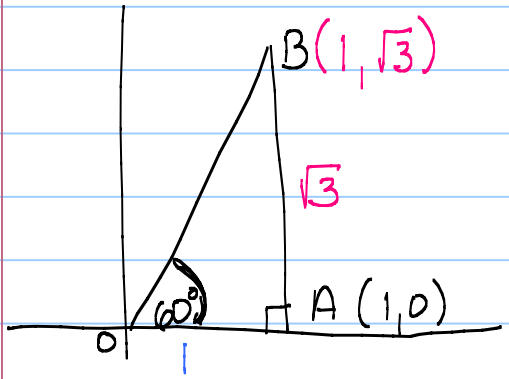
x $x\sqrt{3}$ 2x

CD $8\sqrt{3}$

If $\frac{8\sqrt{3}}{2} = \frac{2x}{2}$

Then $4\sqrt{3} = x$

12



a) B: $(1, \sqrt{3})$

b) slope $\overline{OB} = \frac{\Delta y}{\Delta x} \therefore \frac{\sqrt{3}-0}{1-0} = \frac{\sqrt{3}}{1}$ or $\sqrt{3}$

30 60 90

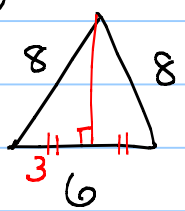
x $x\sqrt{3}$ 2x

1 AB $\sqrt{3}$

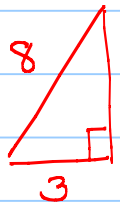
c) $\frac{AB}{OA} = \frac{\sqrt{3}}{1} \therefore \tan 60° = \sqrt{3}$

Rev

8



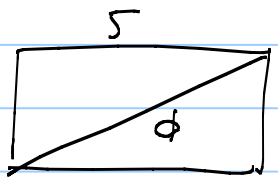
isos $\triangle \Rightarrow$ alt also med



(3 55 8)

$64 - 9 = 55$

10



(2 5 d)

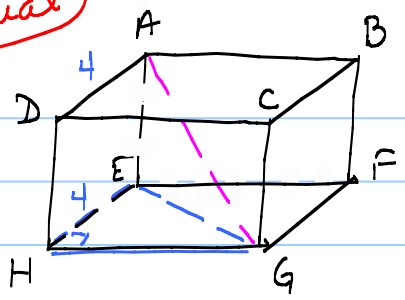
$leg^2 + leg^2 = hyp^2$

$2^2 + 5^2 = d^2$

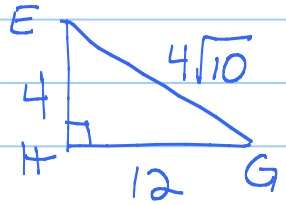
$4 + 25 = 29 \therefore d = \sqrt{29}$

9.8 material

15

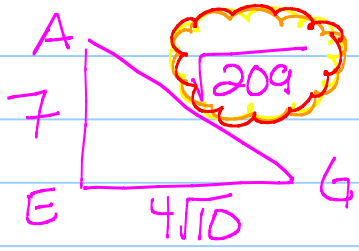


$HG = DC = 12$ $AE = CG = 7$ $EH = AD = 4$



$4(1\ 3\sqrt{10})$

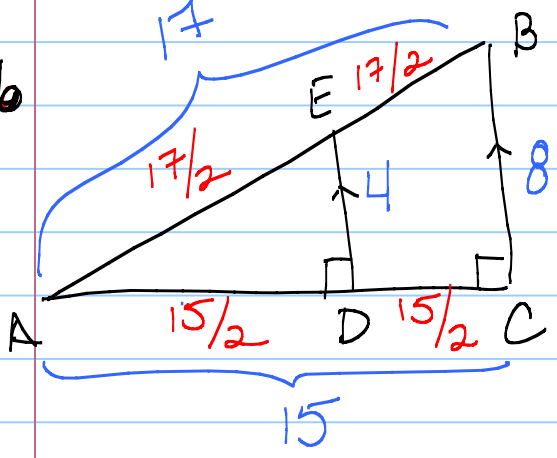
$1+9$



$7^2 + (4\sqrt{10})^2 =$

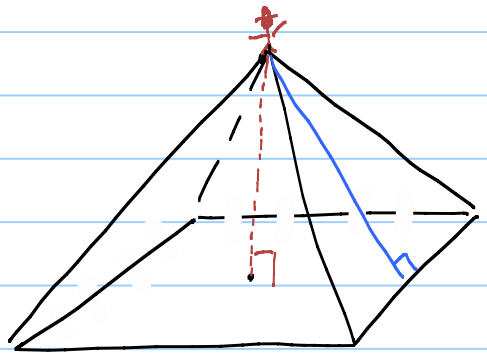
$49 + 160 = 209$

16



$DE = \frac{1}{2} BC$ ∴ DE is a midline & E & D are mdpts.

9.8: Pythm in Space 1–6, 14, 15

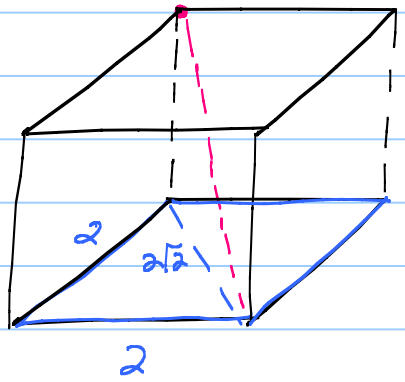


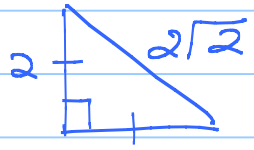
sq pyramid

Slant height ⇒ slide down side

altitude

9.8:15 find diag cube $\Rightarrow$ edge is 2





45	45	90
x	x	x√2
	2	2√2

$2(1, \sqrt{2}, \sqrt{3})$

$1 + 2 = 3$

HOMEWORK:

9.8: 413/1-6, 14, 15

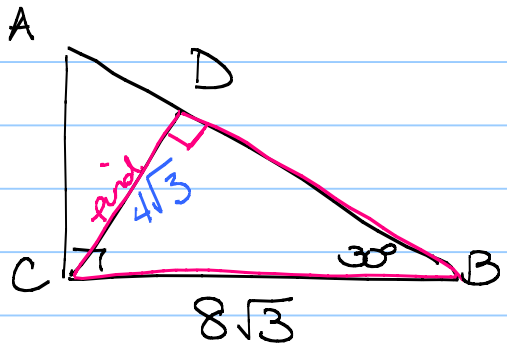
Chapter review (p 429) 24, 27, 29, 30

D7 2/16/16

1) QUIZ while I hand back papers
2) Q&A 9.7 & REVIEW
3) 9.8 & Review

9.7	R
96	2d
12	12
8	

9.7.18



30	60	90
x	$x\sqrt{3}$	2x
$4\sqrt{3}$		$8\sqrt{3}$

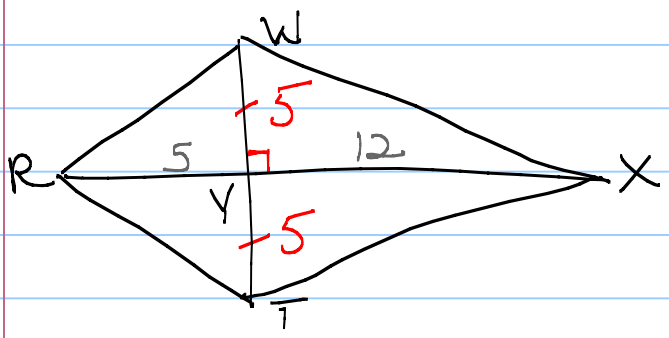
$\frac{2x}{2} = \frac{8\sqrt{3}}{2}$

$x = 4\sqrt{3}$

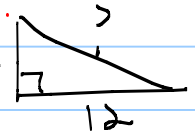
$\times\sqrt{3}$

$DB: (4\sqrt{3})\sqrt{3} = 4 \cdot 3 = 12$

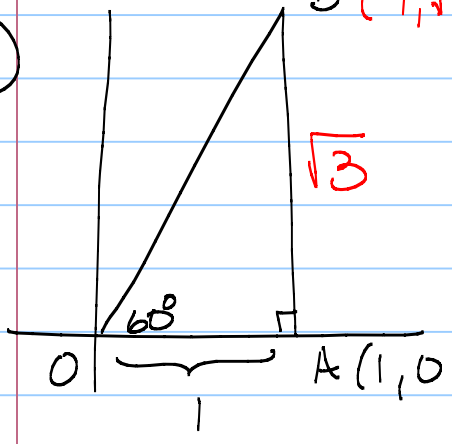
9



$TR = 5\sqrt{2}$

WX  $= 13$

12



30	60	90
x	$x\sqrt{3}$	2x
1	AB	
	$\sqrt{3}$	

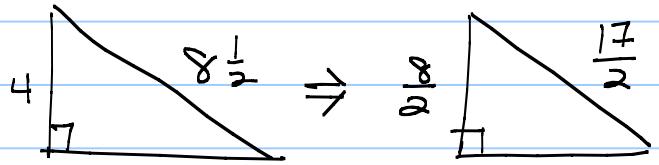
a $B: (1, \sqrt{3})$

b slope $\overline{OB}$: $\frac{\Delta y}{\Delta x} = \frac{\sqrt{3}}{1}$ or $\sqrt{3}$

c $\frac{AB}{OA}$ or $\tan 60° = \frac{\sqrt{3}}{1}$ or $\sqrt{3}$

Rev 2d & 12

2d

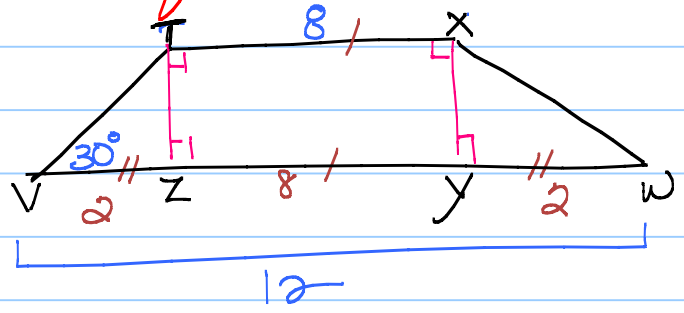


$\left(\frac{8}{2}, \_\_, \frac{17}{2}\right)$

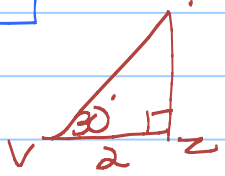
$\frac{1}{2}(8, 15, 17) \Rightarrow \frac{15}{2}$

Ident fam: 8 - 15 - 17

12



30	60	90
x	$x\sqrt{3}$	$2x$
$+\frac{2\sqrt{3}}{3}$	2	$\frac{4\sqrt{3}}{3}$



If $\frac{x\sqrt{3}}{\sqrt{3}} = \frac{2}{\sqrt{3}}$

$x = \frac{2}{\sqrt{3}}\frac{\sqrt{3}}{\sqrt{3}}$

$x = \frac{2\sqrt{3}}{3}$

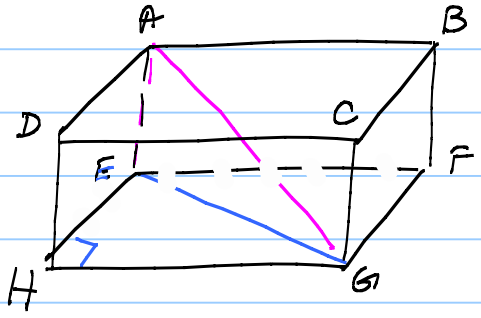
TZ: $\frac{2\sqrt{3}}{3}$

TV: $\frac{4\sqrt{3}}{3}$

9.8: Pythm in Space

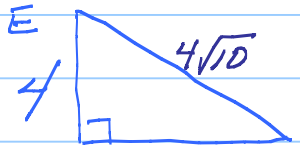
Vocab → tissue box

Rev 15)



$HG = DC = 12$ $\quad AE = CG = 7$

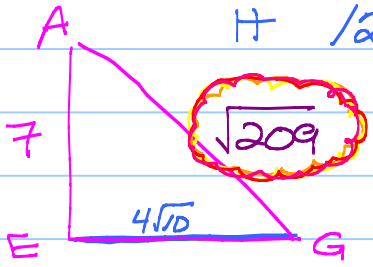
$EH = AD = 4$



(4, 12, EG)

$4(1, 3, \sqrt{10})$

$1 + 9$

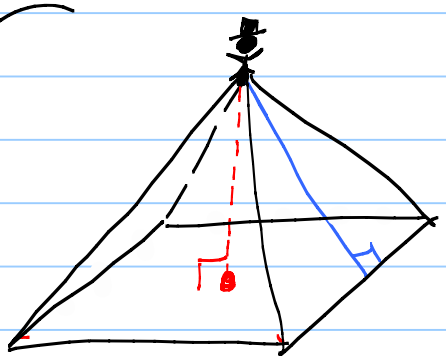


$7^2 + (4\sqrt{10})^2 =$

$49 + 160 = 209$

MOST MISTAKES

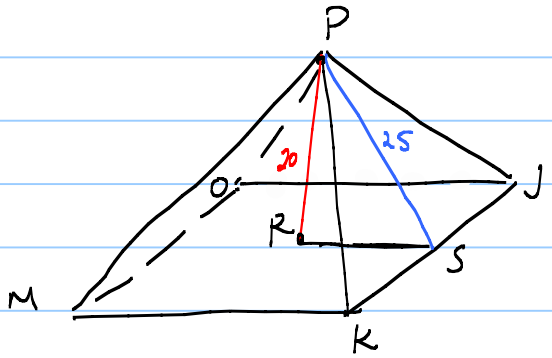
CONFUSE THESE



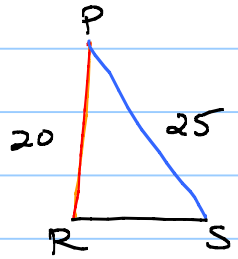
slant height ⇒ slide down side

altitude of pyramid ⇒ height pyramid

14:



$PR = 20$ $\quad PS = 25$ $\quad$ find P base JKMO:



$(20 \_ 25)$

$5(4 \; 3 \; 5)$

$RS = 15$

$MK = 30$

$JKMO = 4(30)$ or 120

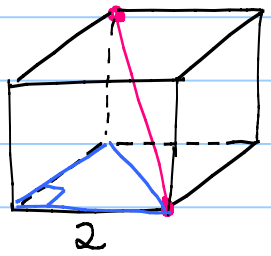
HOMEWORK:

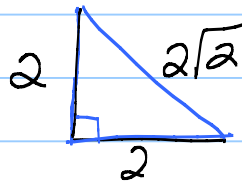
9.8: 413/1-6, 14, 15

Chapter review (p 429) 24, 27, 29, 30

9.8

15

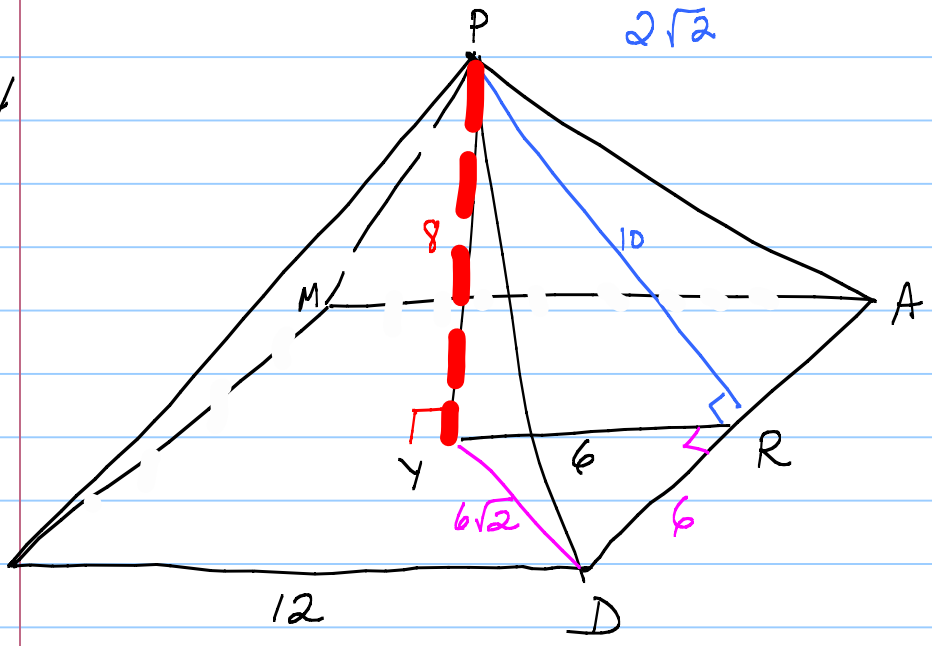




45 45 90
x x x√2

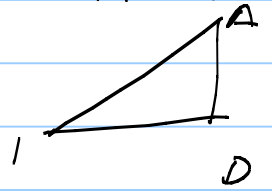
2(1, √2, √3)
1+2

14

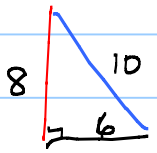


45 45 90
x x x√2
12√2

1A = 12√2



a) ID = 12 b) PY = 8 c) RD = 6 d) PD =



(6 — 10) ⇒ 2(3 4 5)

DS: 1) POP QUIZ

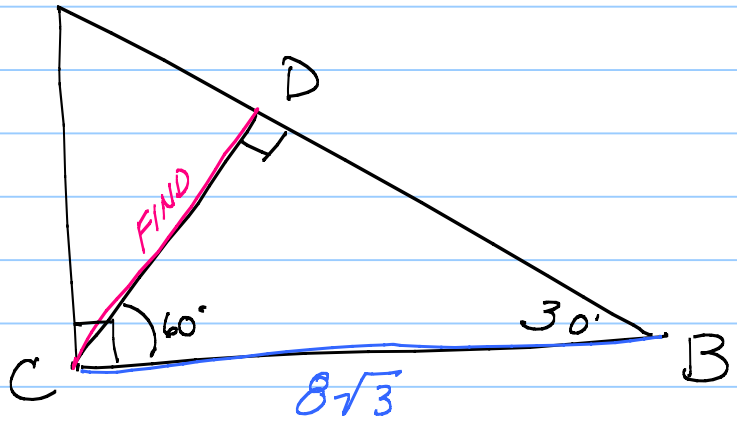
2) Q+A 9.7 + Rev

3) 9.8 + REV

9.7	Rev
8	13-15
9	
12	

9.7:

8.



30	60	90
CD	BD	CB
x	x√3	2x
4√3		8√3

EQUATION

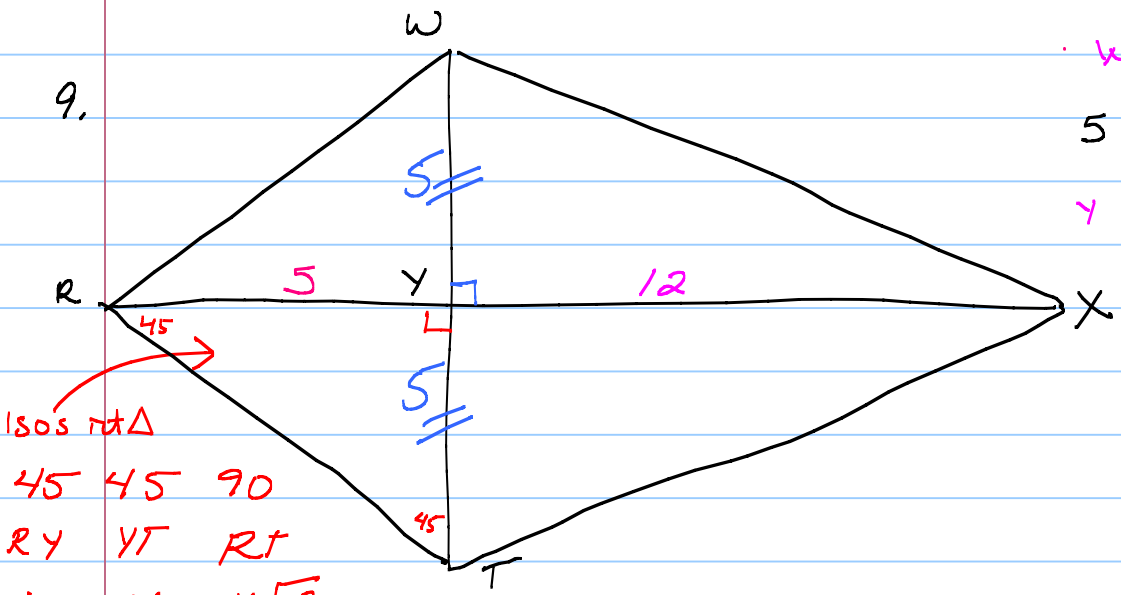
IF $\frac{2x}{2} = \frac{8\sqrt{3}}{2}$

THEN $x = 4\sqrt{3}$

BD : $x\sqrt{3}$

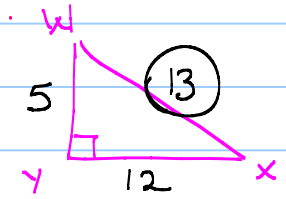
$(4\sqrt{3})\sqrt{3} = 4 \cdot 3 = 12$

9.

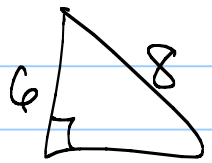


Isos rt Δ

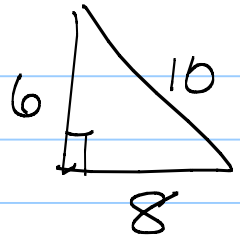
45	45	90
RY	YT	RT
x	x	x√2
5		5√2



Q:



not a py. trip.

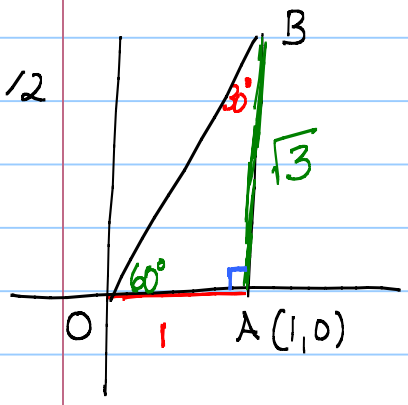


Two △s most often on stand. tests.

$2\left(3\ \sqrt{7}\ 4\right)$

$9+x^2=16$

$x^2=7$



30	60	90
x	$x\sqrt{3}$	2x
OA	BA	OB
1	$\sqrt{3}$	2

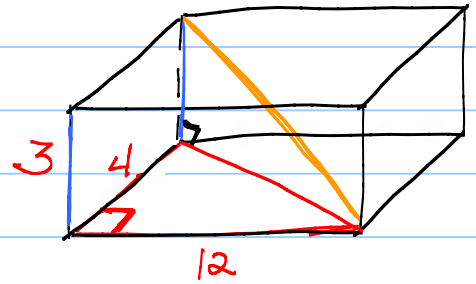
a) B: $(1,\sqrt{3})$

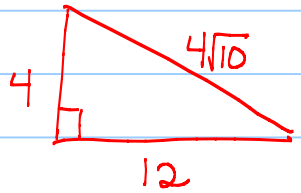
b) slope $\overline{OB} = \frac{\Delta Y}{\Delta X}$ or $\frac{\sqrt{3}}{1}$ or $\sqrt{3}$

c) $\tan 60^\circ = \frac{AB}{OA}$ or $\frac{\sqrt{3}}{1}$ or $\sqrt{3}$

Hw 13-15 (9.8 material)

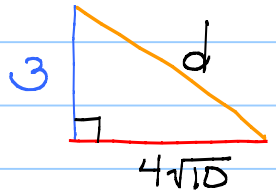
13.





$4\left(1,3,\sqrt{10}\right)$

$1+9$



$3^2+(4\sqrt{10})^2=d^2$

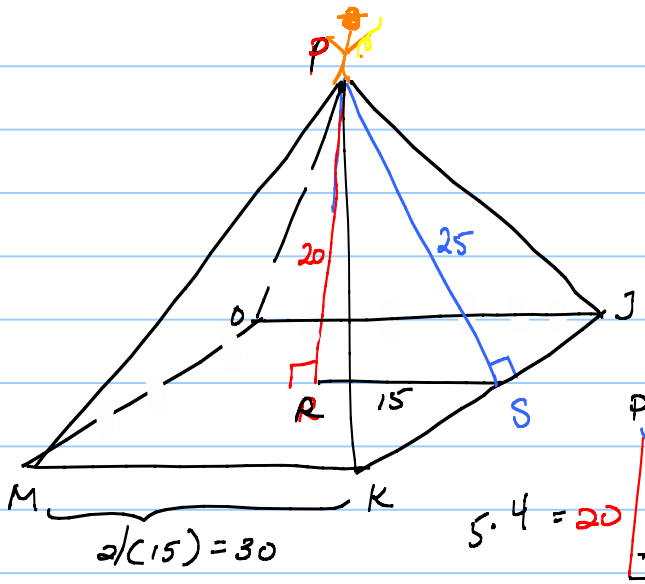
$9+160=$

$169=d^2$

$13=d$

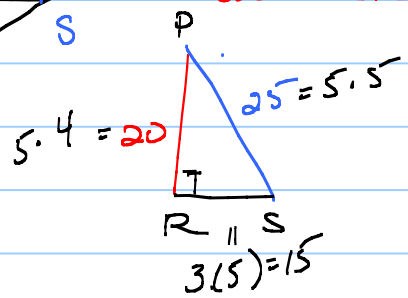
14.

FIRE DRILL



slide down side ⇒ slant height

altitude ⇒ height of pyramid



Peri of JKMO = 4(30) = 120

15.