

R.A.  $\Sigma R E$

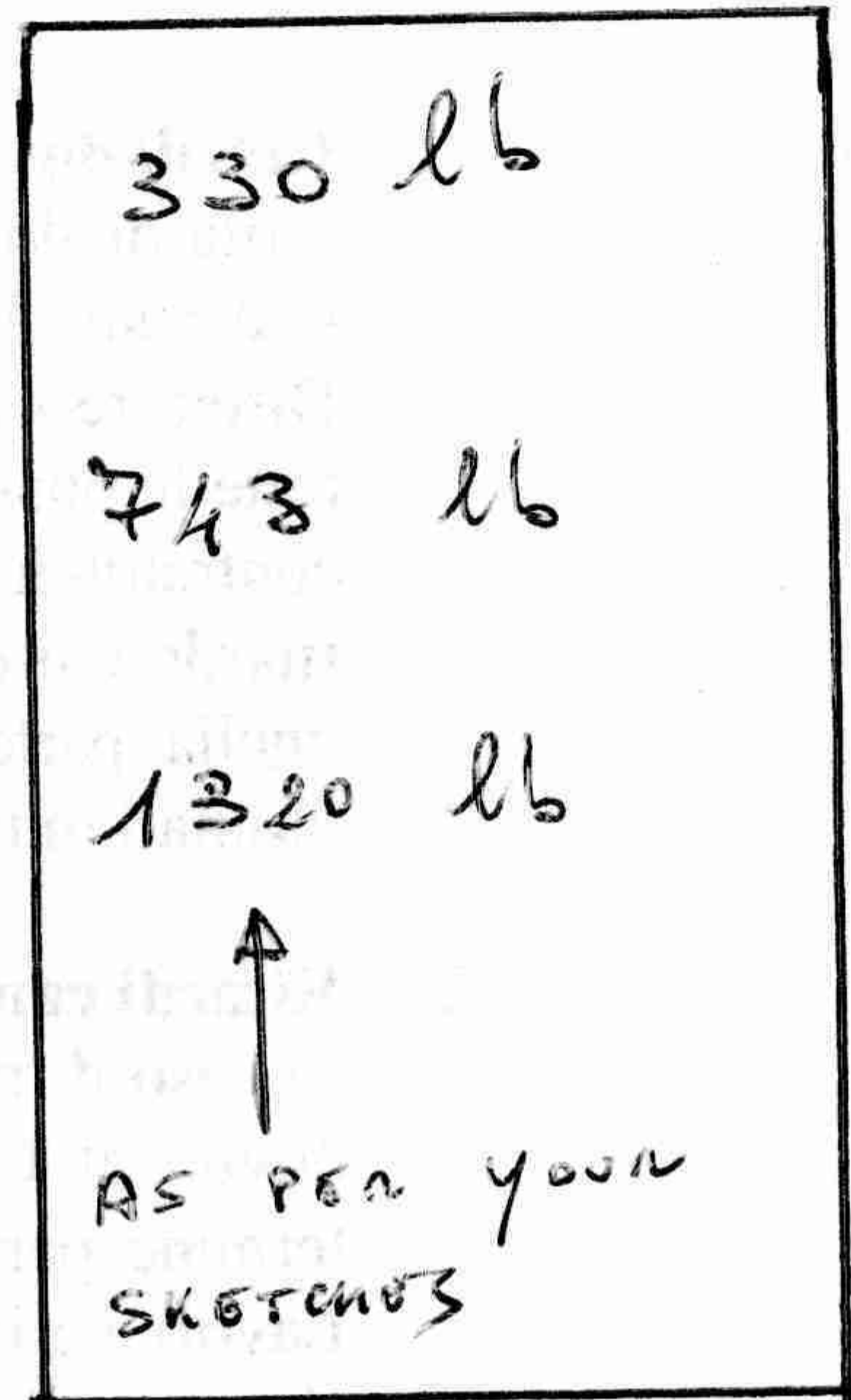
$$S = \frac{1}{2} \gamma h^2 \tan^2 \left( 45 - \frac{\phi}{2} \right)$$

where  $\gamma = 106 \frac{\text{lb}}{\text{ft}^3}$   
 $\phi = 33.7^\circ$

$h = 3' \Rightarrow S = 136 \text{ lb}$

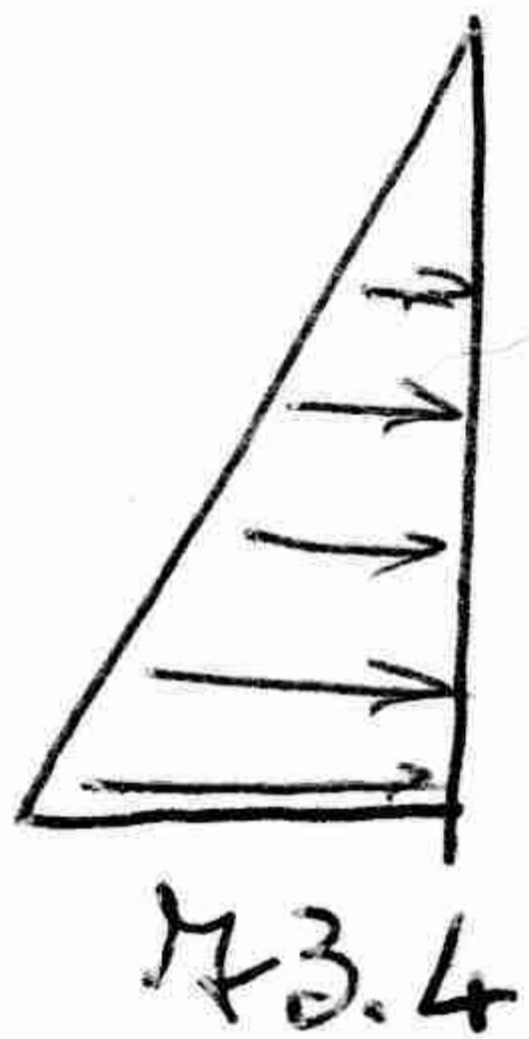
$h = 4.5' \Rightarrow S = 307 \text{ lb}$

$h = 6' \Rightarrow S = 546 \text{ lb}$



↑  
 WHERE ARE THEY COMING FROM??

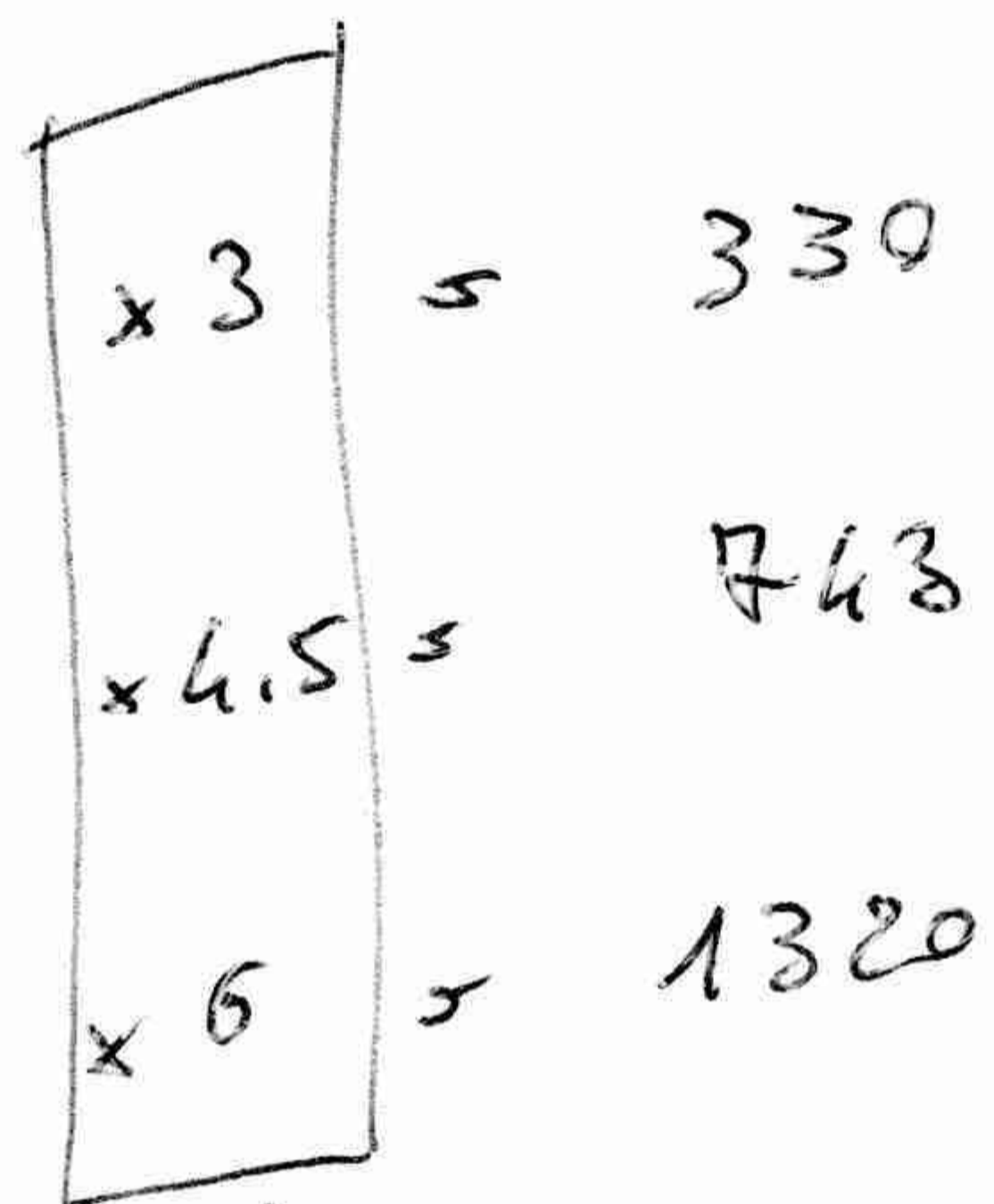
OR



$$\frac{73.4 \times 3'}{2} = 110 \text{ lb}$$

$$\frac{73.4 \times 4.5'}{2} = 165 \text{ lb}$$

$$\frac{73.4 \times 6'}{2} = 220 \text{ lb}$$



↑ why??

OR

$$73.4 \times 3' = 220 \text{ lb}$$

$$73.4 \times 4.5' = 330 \text{ lb}$$

$$73.4 \times 6' = 440 \text{ lb}$$

