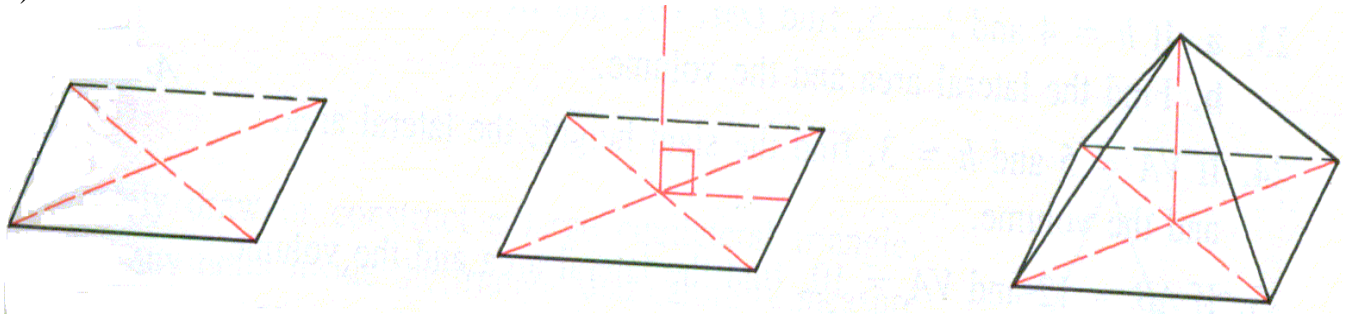
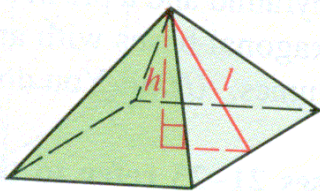


To draw a square pyramid:

- 1) Draw a parallelogram and sketch the diagonals
- 2) Draw a vertical segment at the point where the diagonals intersect
- 3) Join the vertex to the base vertices



Complete the table below for the regular square pyramid shown.



	1	2	3	4	5	6
height, h	4	12	24	$3\sqrt{7}$	3	6
slant height, l	5	13	25	12	5	$2\sqrt{17}$
base edge	6	10	14	18	8	$8\sqrt{2}$
lateral edge	$\sqrt{34}$	$\sqrt{194}$	$\sqrt{674}$	15	$\sqrt{41}$	10

Sketch each pyramid. Then find its lateral area.

7. A regular triangular pyramid with base edge 4 and slant height 6.

36

8. A regular square pyramid with base edge 12 and lateral edge 10.

192

9. A regular hexagonal pyramid with base edge 10 and lateral edge 13.

360

Sketch each square pyramid. Then find its lateral area, total area, and volume.

10. base edge = 6; height = 4

$$L.A. = 60$$

$$S.A. = 96$$

$$V = 48$$

11. base edge = 16; slant height = 10

$$L.A. = 320$$

$$S.A. = 576$$

$$V = 512$$

12. height = 12; slant height = 13

$$L.A. = 260$$

$$S.A. = 360$$

$$V = 400$$

13. base edge = 16; lateral edge = 17

$$L.A. = 480$$

$$S.A. = 736$$

$$V = \frac{256\sqrt{161}}{3}$$