D

X	f	fx	x^2	$f \cdot x^2$
50	1	50	2500	2500
40	2	80	1600	3200
30	1	30	900	900
20	2	40	400	800
10	1	10	100	100
	7	210		7500

For table

$$S \text{ or } \sigma = \sqrt{\frac{\Sigma fx^2 - \frac{(\Sigma fx)^2}{n}}{n}} = \sqrt{\frac{7500 - \frac{210^2}{7}}{7}}$$

$$= \sqrt{\frac{7500 - \frac{44100}{7}}{7}} = \sqrt{\frac{7500 - 6300}{7}} = \sqrt{\frac{1200}{7}}$$

$$= \sqrt{171.43} = 13.09 \qquad S = 13.09$$

For table

$$\hat{S} = \sqrt{\frac{\Sigma fx^2 - \frac{(\Sigma fx)^2}{n}}{n-1}} = \sqrt{\frac{7500 - \frac{210^2}{7}}{7-1}}$$

$$= \sqrt{\frac{7500 - \frac{44100}{7}}{6}} = \sqrt{\frac{7500 - 6300}{6}} = \sqrt{\frac{1200}{6}}$$

$$= \sqrt{200} = 14.14 \qquad \hat{S} = 14.14$$