

6. Given the function $v(j)=j^2+j$,
the average rate of change from $j=2$ to $j=5$ is:

9

-8

8

7

Solution

Using the average rate of change formula:

$$\text{The average rate of change} = \frac{v(5)-v(2)}{5-2}$$

$$= \frac{(1(5)^2+1(5))-(1(2)^2+1(2))}{3}$$

$$= \frac{30-6}{3}$$

$$= 8$$