| Question | General Equation | Find $\boldsymbol{k}$ |  | New Equation |  | Find Value using Equation |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| $\boldsymbol{A}$ is directly proportional to $\boldsymbol{B}$, when $\boldsymbol{A}=\mathbf{1 0}, \boldsymbol{B}=\mathbf{2}$. <br> Find $\boldsymbol{A}$ when $\boldsymbol{B}=\mathbf{1 2}$. | $A=k B$ | $10=k \times 2$ so $k=5$ |  | $A=5 B$ |  | $A=5 \times 12=60$ |
| (a) $\boldsymbol{y}$ is directly proportional to $\boldsymbol{x}$, when $\boldsymbol{y}=55, \boldsymbol{x}=\mathbf{5}$. <br> Find $\boldsymbol{y}$ when $\boldsymbol{x}=\mathbf{9}$ |  |  |  |  |  |  |
| (b) $N$ is directly proportional to $L$, when $N=1.8, L=0.6$. Find $N$ when $L=2.5$ |  |  |  |  |  |  |
| (c) $y$ is directly proportional to $x$. If $y=5$ when $x=10$, find $\boldsymbol{y}$ when $\boldsymbol{x}=\mathbf{6 0}$ |  |  |  |  |  |  |
| (d) $A$ is directly proportional to $B$ and when $A=12, B=3$. Find $\boldsymbol{A}$ when $\boldsymbol{B}=\mathbf{2 0}$ | (e) $h$ is directly proportional to $V$ and $h=36$ when $V=8$. Find $h$ when $V=44$ |  | (f) $y$ is directly proportional to the $x$, and $y=250$ when $x=5$. Find $x$ when $y=7.5$ |  | (g) $y$ is directly proportional to <br> $x$. When $x=2, y=64$. <br> Find $x$ when $y=80$ |  |

