## Higher - Ratio, Proportion and Rates of Change

## Learn all the foundation key facts and remember these top tips

Direct and Inverse Proportion
If two amounts are directly proportional we write
$y \propto x$
a) $y$ is directly proportional to $x \quad y=k x$
b) $y$ is directly proportional to $x^{2} \quad y=k x^{2}$
c) $y$ is directly proportional to $\sqrt{x} \quad y=k \sqrt{x}$
d) $y$ is inversely proportional to $x \quad y=\frac{k}{x}$
e) $y$ is inversely proportional to $x^{2} \quad y=\frac{k}{x^{2}}$
f) $y$ is inversely proportional to $\sqrt{x} \quad y=\frac{k}{\sqrt{x}}$

