Introducing Surds

(a)	(b)	(c)	(d)
True or false: $\sqrt{17}$ is a surd $True$	True or false: $\sqrt{9}$ is a surd $False$	Calculate $\sqrt{7} \times \sqrt{3}$ $\sqrt{21}$	Calculate $\sqrt{39} \div \sqrt{3}$ $\sqrt{13}$
(e)	**(f)**	**(g)**	**(h)**
Calculate $(\sqrt{5})^2$ 5	Calculate $\frac{\sqrt{18}}{\sqrt{2}}$ 3	Calculate $\sqrt{7} \times \sqrt{3} \times \sqrt{2}$ $\sqrt{42}$	Calculate $\frac{\sqrt{12} \times \sqrt{6}}{\sqrt{2}}$ 6
(i)	**(j)**	**(k)**	**(l)**
Show that $\sqrt{40} = 2\sqrt{10}$ $\sqrt{40} = \sqrt{4} \times \sqrt{10}$ $= 2 \times \sqrt{10}$ $= 2\sqrt{10}$	Show that $\sqrt{75} = 5\sqrt{3}$ $\sqrt{75} = \sqrt{25} \times \sqrt{3}$ $= 5 \times \sqrt{3}$ $= 5\sqrt{3}$	Show that $\sqrt{96} = 4\sqrt{6}$ $\sqrt{96} = \sqrt{16} \times \sqrt{6}$ $= 4 \times \sqrt{6}$ $= 4\sqrt{6}$	Show that $\sqrt{245} = 7\sqrt{5}$ $\sqrt{245} = \sqrt{49} \times \sqrt{5}$ $= 7 \times \sqrt{5}$ $= 7\sqrt{5}$