17 Given that $8\sqrt{m} + \sqrt{49m} - \sqrt{9m} = k\sqrt{m}$

where k is an integer and m is a prime number,

(a) work out the value of k

$k =$ .....

(1)

(b) Show that $\dfrac{5 - \sqrt{18}}{1 - \sqrt{2}}$ can be written in the form $a + b\sqrt{2}$

where a and b are integers.
Show each stage of your working clearly.

(3)

(Total for Question 17 is 4 marks)

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