Answer all TEN questions.

Write your answers in the spaces provided.

You must write down all the stages in your working.

1 The *n*th term of an arithmetic series A is a_n The *n*th term of a geometric series G is t_n

For these two series

$$a_1 = t_1$$
 $a_{10} = t_3 = 48$ $a_{10} = 4t_2$

Find

- (i) the common ratio of G,
- (ii) the common difference of A.

(Total for Question 1 is 6 marks)



(6)