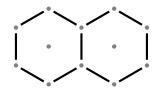
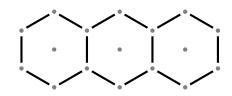
1. Here is part of a sequence of patterns made from sticks.





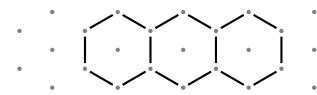


Pattern number 1

Pattern number 2

Pattern number 3

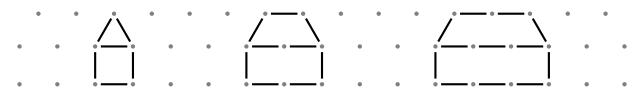
(a) In the space, below **complete** pattern number 4



Pattern number \dots

Pattern number	1	2	3	4	5
Number of sticks	6	11	16		

2. Here is part of a sequence of patterns made from sticks.



Pattern number 1

Pattern number 2

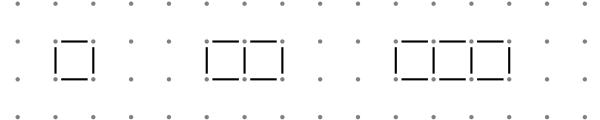
Pattern number 3

(a) In the space, below draw Pattern number 4

Pattern number 4

Pattern number	1	2	3	4	5
Number of sticks	6	9	12		

3. Here is part of a sequence of patterns made from sticks.

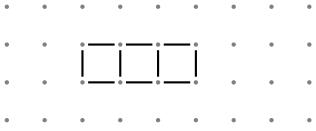


Pattern number 1

Pattern number 2

Pattern number 3

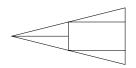
(a) In the space, below draw Pattern number $4\,$

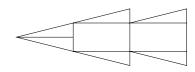


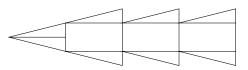
Pattern number ...

Pattern number	1	2	3	4	5
Number of sticks	4	7	10		

4. Here is part of a sequence of patterns made from rectangles and triangles.







Pattern number 1

Pattern number 2

Pattern number 3

(a) In the space, below draw Pattern number 4

Pattern number	1	2	3	4	5
Number of triangles	4	6	8		

Answers

- 1. (a) 4 hexagons joined together
 - (b) 21, 26
- 2. (a) "house" with 3 sticks on top of roof, 4 sticks in the middle and 4 sticks on the ground, one vertical stick either side for the "walls" and one sloping stick either side for the "roof" sides
 - (b) 15, 18
- 3. (a) 4 squares joined together
 - (b) 13, 16
- 4. (a) large "arrow head" with 3 "tail feathers" or 2small triangles with 4 "tail feathers"
 - (b) 10, 12