

LEVEL 6

MATHEMATICS

REVISION WORKSHEET 3

CHAPTER 7: NUMBER PATTERNS

1. Fill in the blanks:

(i) The general term of a sequence is given as $T_n = \underline{\hspace{2cm}}$

(ii) 2, 5, 8, 11, _____, _____,

2. For the following sequences, state a rule and write down the next two terms:

(i) 0, 10, 20, 30, 40,

(ii) -22, -18, -14, -10, -6, ...

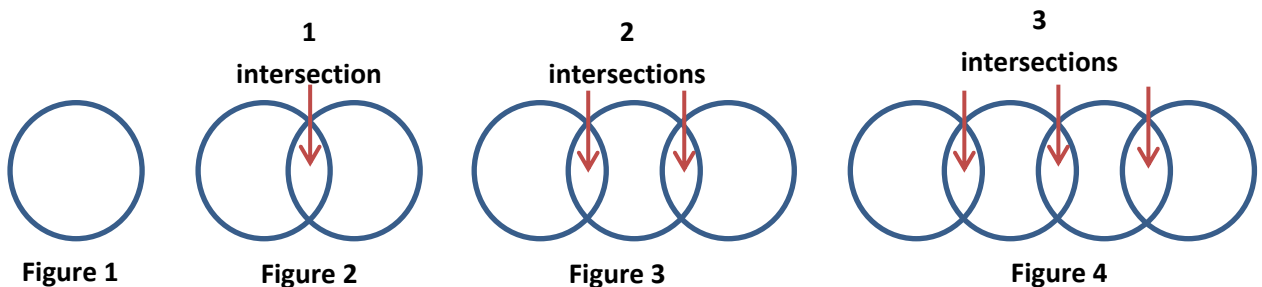
(iii) 100, 98, 95, 93, 90,

3. The n^{th} term T_n of a sequence is $T_n = 4n + 7$, find

(i) the 4th term

(ii) the sum of 4th and 7th term

4. The first four figures of a sequence are as shown:



(i) Draw the next two figures of the sequence.

(ii) Complete the table

| Figure Number | No : of intersection(s) between the circles |
|---------------|---|
| 1 | 0 |
| 2 | 1 |
| 3 | |
| 4 | |
| 5 | |
| 6 | |
| . | . |
| . | . |
| . | . |
| n | |

(iii) Find the value of n for which the circles in the figure have 28 intersections.