## Level 3 Types of Numbers

Answer the following questions, showing all your working. No calculator allowed.

1. Calculate
(a) $8-3 \times 2$
(b) $4+2 \times 3^{2}$
2. Calculate the area and perimeter of the rectangle below, with length 12 cm and breadth 5 cm .

3. Create a shape with rotational symmetry of order 4.
4. Write down the first 10 square numbers.
5. The temperature one day rose from $-15^{\circ} \mathrm{C}$ to $12^{\circ} \mathrm{C}$. By how much had it risen?
6. Excluding zero, list the first 6 multiples of:-
(a) 6
(b) 8
(c) 11
(d) 20
7. Find the l.c.m of each of the following sets of numbers.
(a) 6 and 2
(b) 7 and 9
(c) 3,5 and 10
8. Find the h.c.f for each of the following:-
(a) 24 and 36
(b) 13 and 26
(c) 12 and 42
9. There is only one number which is both a multiple and a factor of 12. What is the number?
10. List all the prime numbers between 50 and 100 .
11. List each of the following numbers as a product of primes:-(Hint:- construct a "Prime factor tree")
(a) 36
(b) 64
(c) 98
