Common multiples



1 Shade all the multiples of 9

Circle all the multiples of 6

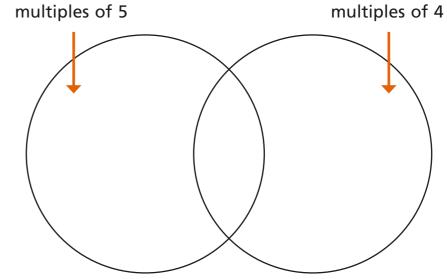
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 |
|----|----|----|----|----|----|----|----|----|-----|
| 11 | 12 | 13 | 14 | 15 | 16 | 17 | 18 | 19 | 20 |
| 21 | 22 | 23 | 24 | 25 | 26 | 27 | 28 | 29 | 30 |
| 31 | 32 | 33 | 34 | 35 | 36 | 37 | 38 | 39 | 40 |
| 41 | 42 | 43 | 44 | 45 | 46 | 47 | 48 | 49 | 50 |
| 51 | 52 | 53 | 54 | 55 | 56 | 57 | 58 | 59 | 60 |
| 61 | 62 | 63 | 64 | 65 | 66 | 67 | 68 | 69 | 70 |
| 71 | 72 | 73 | 74 | 75 | 76 | 77 | 78 | 79 | 80 |
| 81 | 82 | 83 | 84 | 85 | 86 | 87 | 88 | 89 | 90 |
| 91 | 92 | 93 | 94 | 95 | 96 | 97 | 98 | 99 | 100 |

List any common multiples of 9 and 6



2 a) Write the numbers in the sorting diagram.

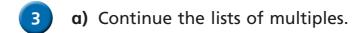
25 30 16 20 24 60 75 40



- b) Write all the common multiples of 4 and 5 from the list.
- c) Look at the common multiples of 4 and 5 from part b).
 What do you notice?

Describe how to find more common multiples to add to this list.

Would you ever run out of common multiples?



b) Circle the common multiples of 5 and 7







I worked out the common multiples of 4 and 6 by multiplying 4 and 6 together to get 24. Then I added on 24 again and again: 24, 48, 72 . . .

I think your method might miss some common multiples.





Jack

Who do you agree with and why?

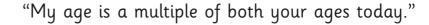
Write the first five common multiples of these numbers.

a) 2 and 3

b) 3 and 12

c) 15 and 10

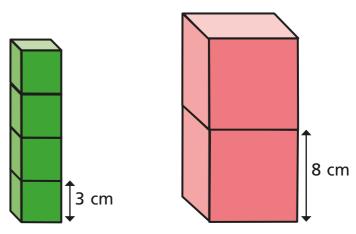
6 Rita has two grandchildren in different years at school.
On Rita's 90th birthday she says to her grandchildren,



How old could Rita's grandchildren be?

Describe two different solutions.

7



Scott is building a tower from blocks 3 cm tall.

Dora is building a tower from blocks 8 cm tall.

They each build a tower taller than 50 cm, but shorter than 1 m.

The towers are exactly the same height.

How tall could the towers be?

