

Mathematics

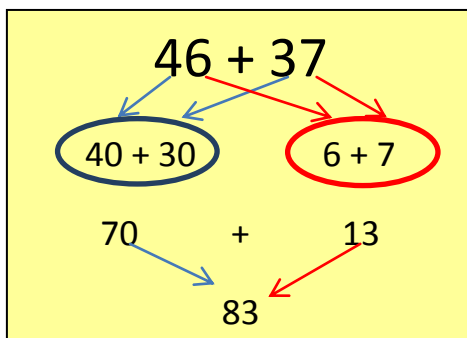
From Belinda Haley and Cheryl Barker, Mathematics Steering Committee

Understanding the strategies of Ann Baker's Secret Code

Chunking For Addition (ch)

The **Chunking** strategy is used to make mental addition easier. Numbers are broken down into smaller place value 'chunks', so having a good understanding of place value is necessary.

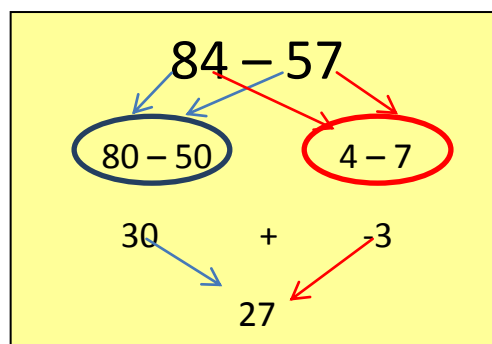
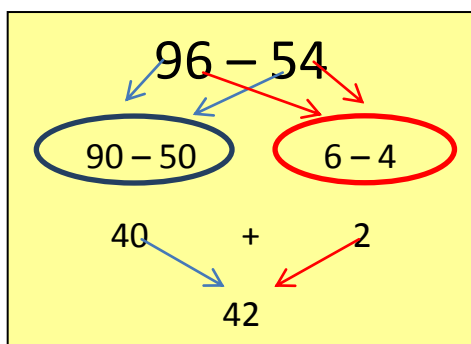
To add 46 and 37, separate the tens and ones, as shown below. Then, add the tens together and then the ones. Finally, add the tens total to the ones total to get the answer.



The process seems long when shown step-by-step, but when this is done mentally, it is quite efficient.

Chunking For Subtraction (ch)

The same **Chunking** strategy can be used to make mental subtraction easier, as shown below. The example in the second box shows what happens when you get a negative number. When you add a negative number, it is the same as subtracting.



Ideas to Use at Home

Choose a three-digit number without repeating any digit and without using zero, for example 381. You reverse the order of the digits to create a second number, in this case 183. The child subtracts the smaller number from the larger and records this as a number sentence. The answer is used to start another reversal subtraction. Play continues until zero is reached. The process could be repeated for other three-digit numbers. Encourage your child to use the chunking strategy throughout.

Use online maths games. In this world of technology kids are keen to learn online as the feedback can be instantaneous. There are numerous sights suitable for children learning subtraction at school with concepts being reinforced through games. This UK website is a great start

<http://resources.woodlands-junior.kent.sch.uk/maths/interactive/index.htm>

<http://resources.woodlands-junior.kent.sch.uk/maths/interactive/subtraction.htm>

<http://naturalmaths.com.au>