# Factorising Non-Monics

### Vocabulary:

Coefficient

Quadratic

Expression

Factorise

Prime

### Activities:

Write what you know about these.

### Prior Knowledge:

To find different factorisations of a number

### Activities:

Find different factorisations of 12

Explain why some of your factorisations are not “complete” and why.

### Prior Knowledge:

To factorise expressions which require one or two sets of brackets.

### Activities:

<https://quizizz.com/admin/quiz/5a547074074a3c0f0043fa84/factorising-quadratics>

Factorise the following:

### Prior Knowledge:

To know when something is fully factorised, and link this to prime factorisation.

### Activities:

Factorise the following in 3 different ways:

Explain why two of them are not fully factorised.

### Aims:

To recognise why it’s harder to factorise a non-monic quadratic

To factorise non-monic quadratics

### Activities:

Class discussion and notes, including…

Definition of monic vs non-monic.

Example

Strategy:

List the possibilities.

Note that switching round the numbers / signs gives a different answer.

Try to eliminate options which seem to give a coefficient of x which is too high or the wrong sign.

Practice on Section A

<https://www.drfrostmaths.com/videos.php?skid=81>

<https://goformative.com/formatives/5e73790675767b354c507fee>

### Aims:

To spot common factors

### Activities:

Example solved in two / three different ways:

Note that most expressions cannot be factorised – we will learn a way to deal with these next year.

Section B

Further Extension: RISP