Diagrams and fractions – lesson 2.3 – Adding fractions

Summary

In this lesson, we move on to sums with the other denominators discussed in the previous set of lessons: 3, 6, 9, 12, 5, 10 and 15. The lesson is very similar to the previous one.

Material: video (optional), worksheets, notebook with the diagrams and one pack of grids for each student.

Outline of the lesson

Starter

The starter is based on the previous lesson, but it goes further by posing a word problem.

The solution of the word problem involves the calculation presented in question 1. We want to see if the students will approach the problem differently to what they were doing with the calculation questions.

Task 1, 2, 3 and 4

Similar to the main tasks of the last lesson, but now with the other fractions that they have on their notebooks.

You may decide to use the video before posing this task. We are leaving this resource as optional because the students may not need it after the previous lesson.

All the items are similar to each other in terms of difficulty. The fractions on each sum are represented in the same page of their notebooks and can be built on the same blank grid.
Emphasize that they can and should use their notebooks and the black grids.

Task 5

The goal is to push the students towards cases that could be challenging for them.

The first sum is a subtraction, the second is bigger than 1 and the third is mixing denominators that they have not combined so far.
The challenge is similar in terms of goal, but goes even further by posing a sum with fractions whose denominators are not multiples of each other.

Extension

The sums below are exploring cases very similar to those on Task 5.

$$\frac{1}{3}+\frac{5}{6}$$

$$\frac{1}{5}+\frac{3}{10}+\frac{2}{15}$$

$$1-\frac{1}{3}-\frac{1}{9}$$

$$\frac{2}{10}+\frac{6}{15}$$