

1. Write as a single fraction in its simplest form

$$\frac{x}{3} + \frac{x-1}{2}.$$

2. Write as a single fraction
$$\frac{3a}{8} + \frac{4}{5}$$
.

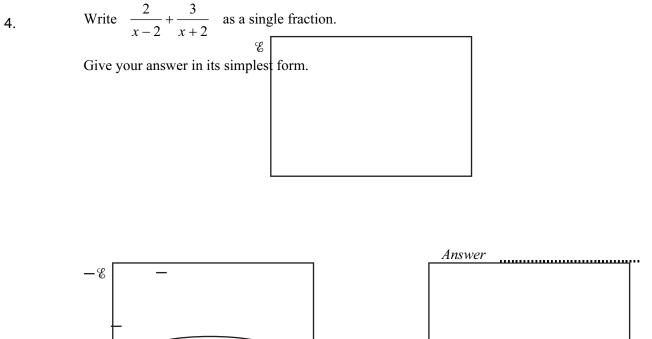
Answer [2]

3. Write the following as a single fraction in its simplest form.

$$\frac{x+1}{x+5} - \frac{x}{x+1}$$

Answer	 [4]

[3]



5. Without using your calculator, work out $1\frac{5}{6} + \frac{9}{10}$. You must show your working and give your answer as a mixed number in its simplest form.

Answer [3]

6.

$$1\frac{1}{2} + \frac{1}{3} + \frac{1}{4} = \frac{p}{12}$$

Work out the value of *p*.

Show all your working.

Answer p = [2]

7.

Write down all the working to show that $\frac{\frac{3}{5} + \frac{2}{3}}{\frac{3}{5} \times \frac{2}{3}} = 3\frac{1}{6}.$

8. Without using your calculator, work out the following. Show all the steps of your working and give each answer as a fraction in its simplest form.

(a) $\frac{11}{12} - \frac{1}{3}$

Answer(a) [2]

(b)
$$\frac{1}{4} \div \frac{11}{13}$$

Answer(b) [2]

9. Jiwan incorrectly wrote $1 + \frac{1}{2} + \frac{1}{3} + \frac{1}{4} = 1\frac{3}{9}$. Show the correct working and write down the answer as a mixed number.

Answer [3]

10. Write as a single fraction in its simplest form.

$$\frac{3}{x+10} - \frac{1}{x+4}$$

Answer [3]

11. Write as a single fraction, in its simplest form.

$$\frac{1-x}{x} - \frac{2+x}{1-2x}$$

Answer [4]

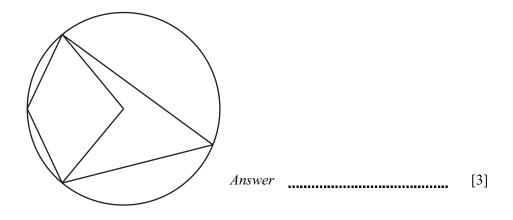
12. Write down all your working to show that the following statement is correct.

$$\frac{1+\frac{8}{9}}{2+\frac{1}{2}} = \frac{34}{45}$$

Answer

13. Write the following as a single fraction in its simplest form.

$$\frac{x+2}{3} - \frac{2x-1}{4} + 1$$



14. Write as a single fraction in its simplest form.

$$- \frac{2}{x} + \frac{1}{2x} + \frac{1}{2}$$

Answer

15. Show that
$$\frac{7}{27} + 1\frac{7}{9} = 2\frac{1}{27}$$
.

Write down all the steps in your working.

Answer

[2]

[2]

16. Write as a single fraction, in its simplest form.

$$\frac{3}{x+2} - \frac{2}{x-1}$$

17. (a) Write
$$\frac{1}{y} - \frac{2}{x}$$
 as a single fraction in its lowest terms.

(b) Write
$$\frac{x^2 + x}{3x + 3}$$
 in its lowest terms.

Answer(b)

x

[3]

[2]