

Mathematics Post-test #2
Arithmetic of fractions

1. Prime factor 231.

- a. $3 \cdot 7 \cdot 11$ b. $3 \cdot 7^2$ c. $3 \cdot 11^2$ d. it is prime

2. Simplify the fraction $\frac{60}{105}$

- a. $\frac{4}{15}$ b. $\frac{15}{7}$ c. $\frac{4}{7}$ d. $\frac{60}{105}$

3. Subtract and simplify, if possible: $\frac{17}{42} - \frac{5}{42}$

- a. $\frac{45}{42}$ b. $\frac{12}{21}$ c. $\frac{2}{7}$ d. $\frac{13}{42}$

4. Add and simplify, if possible:

$$\begin{array}{r} 6\frac{5}{21} \\ + 1\frac{20}{21} \\ \hline \end{array}$$

- a. $8\frac{5}{12}$ b. $8\frac{4}{21}$ c. $7\frac{4}{21}$ d. $8\frac{15}{21}$

5. Multiply and write the product in simplest form: $\frac{18}{24} \cdot \frac{3}{4}$

- a. $\frac{9}{16}$ b. $\frac{27}{64}$ c. $\frac{21}{28}$ d. $\frac{54}{96}$

6. Build up the following fraction: $\frac{5}{4} = \frac{\quad}{24}$

a. $\frac{5}{24}$

b. $\frac{6}{24}$

c. $\frac{20}{24}$

d. $\frac{30}{24}$

7. Find the Lowest Common Denominator of the following fractions:

$\frac{7}{40}$ and $\frac{8}{15}$

a. 5

b. 600

c. 55

d. 120

8. Subtract and simplify, if possible:

$$\begin{array}{r} 13\frac{1}{9} \\ - 2\frac{5}{36} \\ \hline \end{array}$$

a. $10\frac{35}{36}$

b. $11\frac{4}{9}$

c. $11\frac{1}{36}$

d. $10\frac{11}{12}$

9. Add and simplify, if possible: $12\frac{3}{10} + 4\frac{13}{15}$

a. $17\frac{1}{30}$

b. $17\frac{1}{6}$

c. $17\frac{19}{30}$

d. $18\frac{1}{15}$