

Week 1 - Monday: Equivalent Fractions & Mixed Numbers (Key)

Name: _____ Date: _____

Equivalent fractions: different name, same value!

Multiply or divide the top AND bottom by the SAME number. Adding or subtracting does not work!

Example: $\frac{1}{2} \times \frac{2}{2} = \frac{2}{4}$

$$\frac{1}{2} \times \frac{5}{5} = \frac{5}{10}$$

Improper fraction to mixed number: DIVIDE the top by the bottom.

Answer = whole number. Remainder = new top. Bottom stays the same. Simplify if you can.

Example: $\frac{17}{3}$ $17 \div 3 = 5$ remainder 2 $\rightarrow$ $5\frac{2}{3}$

Part A - Make equivalent fractions (multiply)

1) $\frac{1}{2} = \frac{?}{4}$

Answer: 2

2) $\frac{2}{3} = \frac{?}{9}$

Answer: 6

3) $\frac{1}{4} = \frac{?}{8} = \frac{?}{12}$

Answer: 2 and 3

Part B - Simplify (divide)

4) $\frac{5}{15} = \frac{?}{3}$

Answer: 1 ($\div 5$)

5) $\frac{6}{9} = \frac{?}{3}$

Answer: 2 ($\div 3$)

6) $\frac{12}{18} = \frac{?}{3}$

Answer: 2 ($\div 6$)

Part C - Missing numerator

7) $\frac{3}{4} = \frac{?}{16}$

Answer: 12 ($\times 4$)

8) $\frac{2}{5} = \frac{?}{20}$

Answer: 8 ($\times 4$)

9) $\frac{5}{6} = \frac{?}{18}$

Answer: 15 ($\times 3$)

Part D - Missing denominator

$$10) \quad \frac{18}{21} = \frac{6}{?}$$

Answer: 7 ($\div 3$)

$$11) \quad \frac{12}{16} = \frac{3}{?}$$

Answer: 4 ($\div 4$)

$$12) \quad \frac{10}{25} = \frac{2}{?}$$

Answer: 5 ($\div 5$)

Part E - Improper fractions to mixed numbers (divide!)

13) $\frac{17}{3} =$

Answer: $5\frac{2}{3}$

14) $\frac{21}{8} =$

Answer: $2\frac{5}{8}$

15) $\frac{36}{6} =$

Answer: 6

16) $\frac{51}{9} =$

Answer: $5\frac{6}{9} = 5\frac{2}{3}$

Part E (continued)

17) $\frac{7}{2} =$

Answer: $3\frac{1}{2}$

18) $\frac{11}{4} =$

Answer: $2\frac{3}{4}$

19) $\frac{20}{5} =$

Answer: 4

20) $\frac{14}{4} =$

Answer: $3\frac{2}{4} = 3\frac{1}{2}$

Explain: How do you change an improper fraction to a mixed number?

Divide top by bottom: quotient = whole number, remainder = new top, keep the bottom, simplify.