**Accelerated Math Extra Practice**
(Section 3.1 and 3.2)

Name_____

Block _____          Date_____
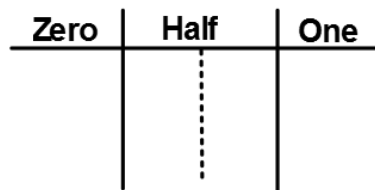
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|---|---|---|---|---|
| **1)** Write 0.4 as a fraction in simplest form. | **2)** Write the decimal for $\frac{9}{50}$ | **3)** < > or = ?<br><br>$0.\overline{3}$ ◯ 0.3 | **4)** Write the decimal for $\frac{5}{6}$ | **5)** Write 0.002 as a fraction in simplest form. |
| **6)** Write the decimal for $\frac{24}{32}$ | **7)** < > or = ?<br><br>-0.2 ◯ $-\frac{3}{5}$ | **8)** < > or = ?<br><br>7.12 ◯ $7.\overline{1}$ | **9)** < > or = ?<br><br>$\frac{12}{18}$ ◯ $0.\overline{6}$ | **10)** Write the decimal for $\frac{1}{8}$ |
| **11)** Write a <u>terminating decimal</u> that is more than $0.\overline{7}$ and less than $0.\overline{8}$ | **12)** Write this decimal using bar notation: 0.934444... | **13)** Circle the <u>largest</u> number.<br><br>0.07   $0.\overline{6}$   $\frac{65}{100}$ | **14)** In the definition of a rational number find the values of **a** and **b** to prove 3.2 is a rational number.<br><br>a =<br><br>b = | **15)** Place these numbers in the best place on the chart. $\frac{22}{23}$ $0.\overline{5}$ $\frac{11}{24}$<br>0.08<br><br><u>Zero│ Half │One</u> |
| **16)** Which set(s) of numbers include $\pi$ ?<br>Q  Rational<br>I   Integers<br>W  Whole<br>N  Natural  ⟨Answer⟩<br>Z  Irrational | **17)** Write the decimal for $\frac{20}{40}$ | **18)** Which set(s) of numbers include -9 ?<br>Q  Rational<br>I   Integers<br>W  Whole<br>N  Natural  ⟨Answer⟩<br>Z  Irrational | **19)** Circle the numbers that are integers.<br><br>1.5   -7      4<br>$\frac{12}{6}$   $\frac{2}{3}$   $-17\frac{1}{2}$<br>0      $\sqrt{36}$ | **20)** Which set(s) of numbers include $1\frac{2}{3}$ ?<br>Q  Rational<br>I   Integers<br>W  Whole<br>N  Natural  ⟨Answer⟩<br>Z  Irrational |

**21)** Show algebraic steps to convert $0.4\overline{8}$ into a fraction in simplest form.

**22)** Write the fraction $\frac{11}{30}$ as a decimal.

**\*23)** Place these numbers in the BEST place on the chart below. __Then__ order them from smallest to largest. Remember to show additional work when needed.

| Zero | Half | One |
|------|------|-----|

**A** 0.78

**B** $\frac{9}{17}$

**C** $\frac{3}{4}$

**D** $0.\overline{87}$

**E** $\frac{7}{8}$

Use the letters to give your answer

**24)** Show algebraic steps to convert $0.0\overline{26}$ into a fraction in simplest form.

**25)  Order these numbers from smallest to greatest.**

A  -0.3

B  $-\frac{7}{20}$

C  $-0.\overline{29}$

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

E  $-0.2\overline{9}$

**26)  Which of these fractions are between 0.1 and 0.25 ?  Show how you know.**

A  $\frac{3}{50}$

B  $\frac{1}{1000}$

C  $\frac{2}{25}$

D  $\frac{3}{100}$

E  $\frac{1}{6}$

F  $\frac{2}{9}$

**\*27) Circle the numbers that are rational and prove they are rational based on the definition.  Find the values of a and b for each rational number.**

-9

$4\frac{4}{7}$

$\sqrt{3}$

1.3

0.25

0

$\frac{1.1}{5}$

$-0.8$

$\sqrt{25}$