# Reasoning and Problem Solving Step 8: Compare and Order More Than 1

## National Curriculum Objectives:

Mathematics Year 5: (5F3) <u>Compare and order fractions whose denominators are all multiples of the same number</u>

#### Differentiation:

Questions 1, 4 and 7 (Problem Solving)

Developing Use digit cards to complete the statement comparing fractions greater than 1 where the denominators are multiples of the same number (halving and doubling only). Expected Use digit cards to complete the statement comparing fractions greater than 1 where the denominators are multiples of the same number.

Greater Depth Use digit cards to complete the statement comparing fractions greater than 1 where the denominators share a common factor.

#### Questions 2, 5 and 8 (Reasoning)

Developing Identify and explain a mistake made when comparing and ordering fractions greater than 1 where the denominators are multiples of the same number (halving and doubling only).

Expected Identify and explain a mistake made when comparing and ordering fractions greater than 1 where the denominators are multiples of the same number.

Greater Depth Identify and explain a mistake made when comparing and ordering fractions greater than 1 where the denominators share a common factor.

#### Questions 3, 6 and 9 (Reasoning)

Developing Explain which statement is correct when ordering fractions greater than 1 where the denominators are multiples of the same number (halving and doubling only). Expected Explain which statement is correct when ordering fractions greater than 1 where the denominators are multiples of the same number.

Greater Depth Explain which statement is correct when ordering fractions greater than 1 where the denominators share a common factor.

More Year 4 and Year 5 Fractions resources.

Did you like this resource? Don't forget to <u>review</u> it on our website.



## Compare and Order More Than 1

## Compare and Order More Than 1

1a. Use the digit cards to complete the statement below with improper fractions.



12

10

1b. Use the digit cards to complete the statement below with improper fractions.

26

10



5 PS

5 PS

2a. Circle the mistake in the table below.

Less Than 2 $\frac{1}{2}$	More Than 2 $\frac{1}{2}$
$\frac{3}{2}$	11 4
1 3/4	3 1/2
7 2	13 4

2b. Circle the mistake in the table below.

Less Than 1 $\frac{4}{10}$	More Than 1 $\frac{4}{10}$
13	12
10	10
1 1/5	1 <del>4</del> 5
11	22
10	10

Explain why this is incorrect.

3a. Two children are ordering fractions.



Explain why this is incorrect.

Mo says,



The missing fraction could be -

Lily says,



Who is correct? Convince me.







3b. Two children are ordering fractions.



Oscar says,



The missing fraction could be

Sadia says,

The missing fraction could be



Who is correct? Convince me.



## **Compare and Order More Than 1**

## **Compare and Order More Than 1**

4a. Use the digit cards to complete the statement below with improper fractions.



30

32

80

5 PS

4b. Use the digit cards to complete the statement below with improper fractions.

25

18

95

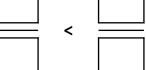
5

5 PS



> \_\_\_







5a. Circle the mistake in the table below.

Less Than 4 $\frac{1}{7}$	More Than 4 $\frac{1}{7}$
<u>22</u>	<u>51</u>
7	7
3 <del>30</del> 35	4 <del>10</del>
<u>28</u>	84
7	21

5b. Circle the mistake in the table below.

Less Than 5 $\frac{5}{6}$	More Than 5 $\frac{5}{6}$
<u>87</u>	<del>39</del>
18	6
5 <del>4</del> <del>24</del>	6 <del>8</del> 24
<u>35</u>	<u>80</u>
6	12

Explain why this is incorrect.



5 R

Explain why this is incorrect.

6a. Two children are ordering fractions.



<u>37</u>

6b. Two children are ordering fractions.



Archie says,



The missing fraction could be  $\frac{68}{10}$ .

Kaitlin says,



Imran says,

The missing fraction could be  $\frac{8}{2}$ 

Bella says,

The missing fraction could be  $\frac{60}{10}$ 



The missing fraction could be  $\frac{5}{2}$ 



Who is correct? Convince me.



5 F



Who is correct? Convince me.



## Compare and Order More Than 1

## Compare and Order More Than 1

7a. Use the digit cards to complete the statement below with improper fractions.

**72** 

28

27

7b. Use the digit cards to complete the statement below with improper fractions.

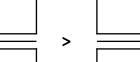
16

50

24

51





5 PS

5 PS

5 R

8a. Circle the mistake in the table below.

Less Than 3 $\frac{6}{15}$	More Than 3 $\frac{6}{15}$
<u>28</u>	<u>63</u>
10	15
3 <del>5</del> 25	3 <del>6</del> 10
36	80
15	25

8b. Circle the mistake in the table below.

Less Than 2 $\frac{12}{18}$	More Than 2 $\frac{12}{18}$
<u>26</u>	<del>90</del>
12	<del>30</del>
$2\frac{10}{30}$	3 \frac{8}{12}
<u>56</u>	<del>70</del>
42	42

Explain why this is incorrect.

9a. Two children are ordering fractions.



Explain why this is incorrect.

Jason says,



The missing fraction could be

Rachel says,





Who is correct? Convince me.



9b. Two children are ordering fractions.



Alex says,



The missing fraction could be

Kyra says,

The missing fraction could be



Who is correct? Convince me.



# Reasoning and Problem Solving Compare and Order More Than 1

## Reasoning and Problem Solving Compare and Order More Than 1

#### **Developing**

1a. Various answers; for example:



2a.  $\frac{7}{2}$  is the mistake because it is equivalent to  $3\frac{1}{2}$  which is more than  $2\frac{1}{2}$ .

3a. Mo is correct because the numbers are ordered from smallest  $(3\frac{1}{3})$  to largest  $(4\frac{1}{3})$  and his number  $(3\frac{2}{3})$  comes in between the two numbers.

#### **Expected**

4a. <u>Various ans</u>wers; for example:



5a.  $\frac{84}{21}$  is the mistake because it is equivalent to 4 which is less than  $4\frac{1}{7}$ .

6a. Archie is correct because the numbers are ordered from smallest (6  $\frac{2}{5}$ ) to largest (7  $\frac{2}{5}$ ) and his number (6  $\frac{4}{5}$ ) comes in between the two numbers.

## **Greater Depth**

7a. Various answers; for example:

8a.  $\frac{80}{25}$  is the mistake because it is equivalent to 3  $\frac{1}{5}$  which is less than 3  $\frac{2}{5}$ .

9a. Jason is correct because the numbers are ordered from smallest  $(2 \frac{1}{4})$  to largest  $(3 \frac{1}{4})$  and his number  $(2 \frac{1}{2})$  comes in between the two numbers.

#### **Developing**

1b. Various answers; for example:

2b.  $\frac{12}{10}$  is the mistake because it is equivalent to 1  $\frac{2}{10}$  which is less than 1  $\frac{4}{10}$ .

3b. Sadia is correct because the numbers

are ordered from largest  $(2 \frac{1}{4})$  to smallest  $(1 \frac{1}{4})$  and her number  $(1 \frac{3}{4})$  comes in between the two numbers.

#### **Expected**

4b. Various answers; for example:

5b.  $\frac{35}{6}$  is the mistake because it is equivalent to  $5\frac{5}{6}$ .

6b. Bella is correct because the numbers are ordered from largest  $(3 \frac{1}{4})$  to smallest  $(2 \frac{1}{4})$  and her number  $(2 \frac{3}{4})$  comes in between the two numbers.

## <u>Greater Depth</u>

7b. <u>Various answers</u>; for example:

8b.  $\frac{70}{42}$  is the mistake because it is

equivalent to  $1 \frac{2}{3}$  which is less than  $2 \frac{2}{3}$ .

9b. Kyra is correct because the numbers are ordered from largest  $(2 \frac{3}{5})$  to smallest  $(1 \frac{3}{5})$  and her number  $(2 \frac{1}{5})$  comes in between the two numbers.



classroomsecrets.co.uk