

# Eureka Math

## 4th Grade Module 5 Lesson 38

At the request of elementary teachers, a team of Bethel & Sumner educators met as a committee to create Eureka slideshow presentations. These presentations are not meant as a script, nor are they required to be used. Please customize as needed. Thank you to the many educators who contributed to this project!

Directions for customizing presentations are available on the next slide.



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# Icons



Read, Draw, Write



Learning Target



Personal White Board



Problem Set



Manipulatives Needed



Fluency



Think Pair Share



Whole Class



Individual



Partner



Small Group



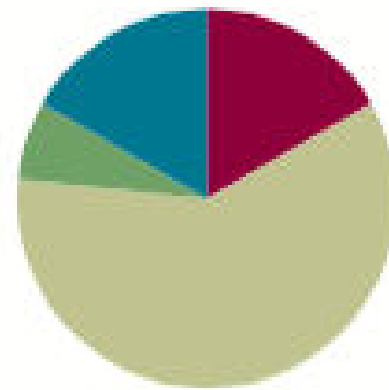
Small Group Time

## Lesson 38

**Objective:** Find the product of a whole number and a mixed number using the distributive property.

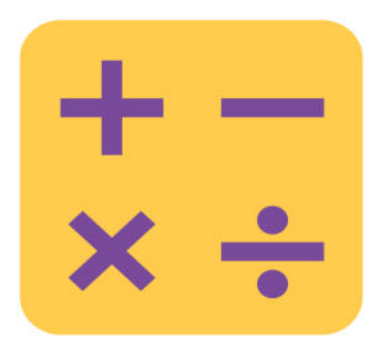
### Suggested Lesson Structure

■ Fluency Practice	(10 minutes)
■ Application Problem	(4 minutes)
■ Concept Development	(36 minutes)
■ Student Debrief	(10 minutes)
<b>Total Time</b>	<b>(60 minutes)</b>





I can find the product of a whole number and a mixed number using the distributive property.



# Multiply fractions

$$3 \times \frac{3}{10}$$

$$7 \times \frac{2}{15}$$

$$2 \times \frac{3}{8}$$

$$4 \times \frac{2}{5}$$

$$5 \times \frac{3}{8}$$



# X fractions

Use the distributive property to solve.

$$2 \times 4 \frac{3}{5}$$

$$3 \times 2 \frac{2}{3}$$

$$4 \times 2 \frac{3}{8}$$



# Application Problem

Eight students are on a relay team. Each runs  $1\frac{3}{4}$  kilometers. How many total kilometers does their team run?





# Identify unknown factors

$$5 \times 8 \frac{1}{5} = (\underline{\quad} \times 8) + (\underline{\quad} \times \frac{1}{5})$$

Use the distributive property fill in the blanks.

How did you decide to fill in the blanks?





# Your choice of strategy

Take 2-4 minutes to solve this problem on your whiteboard.

$$4 \times 9 \frac{3}{4}$$

Share your work strategy with your partner.



# Partner work time!

$$5 \frac{6}{8} \times 4$$

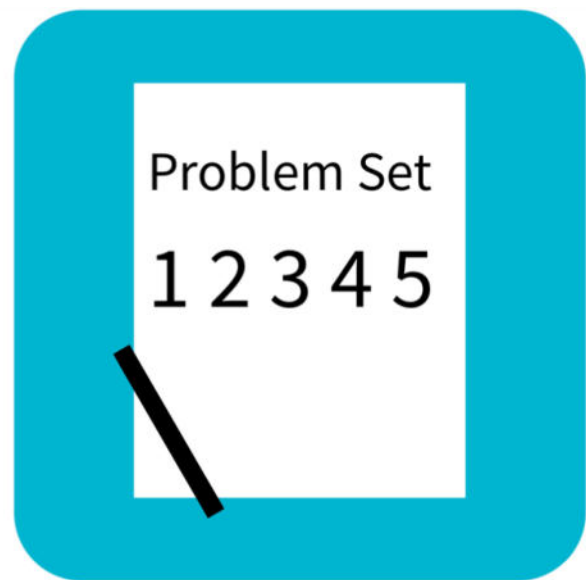
$$12 \frac{2}{6} \times 3$$

$$9 \times 7 \frac{5}{7}$$



# Use the distributive property

Robin rides for  $3\frac{1}{2}$  miles round-trip to get to and from school. How many miles would Robin ride in 5 days?



# Problem Set

A STORY OF UNITS

Lesson 38 Problem Set

4•5

Name \_\_\_\_\_

Date \_\_\_\_\_

1. Fill in the unknown factors.

a.  $7 \times 3\frac{4}{5} = (\underline{\quad} \times 3) + (\underline{\quad} \times \frac{4}{5})$

b.  $3 \times 12\frac{7}{8} = (3 \times \underline{\quad}) + (3 \times \underline{\quad})$



# Debrief

- Explain how you knew what number was unknown from Problem 1.
- What method for solving did you use in Problem 2? Use a specific example from your Problem Set to explain.
- What did you do to solve the problems when the first factor was a mixed number?
- How did you solve Problem 2(e)? Turn and share with your partner.
- Why is it sometimes useful to see both a tape diagram and the numbers?
- How might you improve your work from today's Application Problem?

# Exit Ticket

Name \_\_\_\_\_

Date \_\_\_\_\_

1. Fill in the unknown factors.

$$8 \times 5\frac{2}{3} = (\underline{\quad} \times 5) + (\underline{\quad} \times \frac{2}{3})$$