

## UNIT QUEST

Today you will be asked to solve unit rate problems using ratios of whole numbers.

You will have 45 minutes to complete all parts of the assessment. There are three assessment problems on pages 3-5 in your booklet. You will work through them on your own.

The Teacher Scoring Rubric that will be used to evaluate your calculations and reasoning is shown below. Be sure to review the Exceeding Expectations column.

Teacher Scoring Rubric—Student Version			
Dimensions	Not Yet Meeting Expectations	Meeting Expectations	Exceeding Expectations
<b>Concepts and Procedures</b>	I can solve part of the problem, but I am confused in some places and have calculation mistakes.	I can solve the problem using strategies that make sense with few calculation mistakes.	I can solve the problem efficiently and accurately without any calculation mistakes.
<b>Reasoning and Explaining</b>	I can explain some of how I solved the problem.	I can explain the thinking I used to solve the problem using some math vocabulary.	I can explain the thinking I used to solve the problem using precise math vocabulary in a way that another person can easily understand my math reasoning.

You will have the remainder of this class as well to complete this assessment.

Do you have any questions about what you are expected to do?

You may now begin. Remember, you have the rest of this class period to complete this assessment.

When time is up, please pass your Student Booklet to your teacher.

**STUDENT MATERIALS**  
**PROBLEM 1 – UNIT QUEST**

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Filipe makes bread and it takes him 2 hours to knead the dough. The dough is 3 lbs.

How long will it take him to knead 12 lbs. of dough?

*Fill in and show how to use the following ratio to solve this problem.*

$$\frac{\text{hrs.}}{\text{lbs.}} = \frac{\text{hrs.}}{\text{lbs.}}$$

$$3 \text{ lbs} = 2 \text{ hrs}$$

$$\begin{array}{r} 3 \\ \times 4 \\ \hline \end{array} \quad \begin{array}{r} 2 \\ \times 4 \\ \hline \end{array}$$

12 lbs 8 hr to knead 12 lbs  
of dough

**PROBLEM 2 – UNIT QUEST**


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Sonia runs a mile in 9 minutes.

How long would it take her to run 3 miles?

*Fill in and show how to use a ratio to solve this problem.*

$$\frac{9 \text{ min}}{1 \text{ mi}} = \frac{x \text{ min}}{3 \text{ mi}}$$

$$\begin{array}{r} 1 \\ \times 3 \\ \hline 3 \end{array} \quad \begin{array}{r} 9 \\ \times 3 \\ \hline 27 \end{array}$$

3 mi 27 min to run 3 mi

**PROBLEM 3 – UNIT QUEST**

Priya is looking to buy gummy bears. Bulk Barn sells bags of 3 lbs. for \$1.25. Fortino's sells bags of 2 lbs. for \$0.75.

Which store has the better deal?

*Show how to use ratios to solve this problem.*

$$\begin{array}{r} 0.75 \\ \div 2 \\ \hline 0.375 \end{array} \quad \begin{array}{r} 1.25 \\ \div 3 \\ \hline 0.4166 \end{array}$$

inter means that Fortino's bags were less dollars per pound. With means he had the better deal.