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Introduction

Math Mammoth Measuring 2 is a worktext that covers time, temperature, length, weight, and volume related lessons, aimed for 4th-6th grades. The focus in these lessons is no longer on the actual act of measuring (as was the case in earlier grades), but on calculations that involve conversions between different measuring units.

The first part of the book, up through the lesson *Review 1*, is fourth grade level material. This part includes lessons about time, where the students get to do fairly complex calculations concerning hours and minutes. In lessons about temperature, the students are introduced to negative numbers and even get to do a few simple calculations with them.

Then follow lessons about length, weight, and volume. Students review and learn more about the most common customary and metric units for length, weight, and volume. These lessons contain both hands-on activities and some easy conversion exercises.

After the lesson *Review 1*, the book contains lessons for 5th and 6th grade levels. These lessons focus on the metric system in more detail, and on measurement conversions, both within the customary system and the metric system, and also between customary and metric units. In these lessons, the symbol of a calculator next to a problem () means that students are allowed to use a basic calculator to solve the problem.

In this latter part of the book, the first lesson on the metric system mainly deals with very commonly used metric units, and we use the meaning of the prefix to do the conversion. For example, centimeter is a hundredth part of a meter, since the prefix “centi” means 1/100. Knowing that, gives us a means of converting between centimeters and meters.

The second lesson deals with more metric units, even those not commonly used, such as dekaliters and hectograms, and teaches a method for conversions using a chart. These two methods for converting measuring units within the metric system are sensible and intuitive, and help students not to rely on mechanical formulas.

After learning that, students practice measurement conversions within the customary system, rounding measurements, and conversions between metric and customary units. The last actual lesson of the book shows how to use ratios to convert measurements.

Recall that not all students need all the exercises; use your judgment in how many exercises you assign.

I wish you success in teaching math!

Maria Miller, the author