

# MATH NEWS

Grade 3, Module 4, Topic A

## 3<sup>rd</sup> Grade Math

Module 4: Multiplication and Area

### Math Parent Letter

This document is created to give parents and students a better understanding of the math concepts found in Eureka Math (© 2013 Common Core, Inc.) that is also posted as the Engage New York material which is taught in the classroom. Module 4 of Eureka Math (Engage New York) covers understanding concepts of area and relating area to multiplication and addition. This newsletter will discuss Module 4, Topic A.

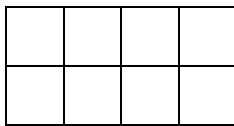
Topic A: Foundations for Understanding Area

#### Vocabulary Words

- array
- area
- attribute
- commutative property
- decompose
- length
- rows and columns
- square unit
- tile
- unit square

#### Things to Remember!!

When we are “tiling” we want to make sure there are no gaps or overlaps. We are also looking for the space **INSIDE** the polygon. The units for **AREA** are **ALWAYS** square units (square inches, square centimeters, etc.)



## OBJECTIVE OF TOPIC A

- 1 Understand area as an attribute of plane figures.
- 2 Decompose and recompose shapes to compare areas.
- 3 Model tiling with centimeter and inch unit squares as a strategy to measure area.
- 4 Relate side lengths with the number of tiles on a side.

## Focus Area- Topic A

*Foundations for Understanding Area*

Students will be introduced to area. They will use pattern blocks to tile given polygons without gaps or overlaps to determine the amount of two-dimensional space is within a region or shape.

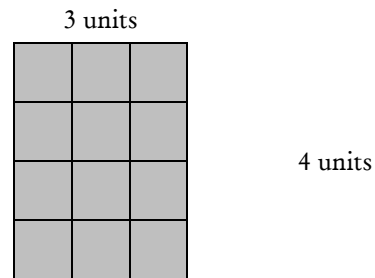


Shape A: 6 Triangles

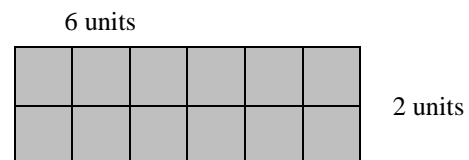


Shape B: 6 Triangles

Through exploration students will work with square units (square centimeters and square inches) to create rectangular arrays with the same area, but different side lengths. By the end of Topic A, students will begin to relate total area with multiplication of side lengths.



Area = 12 square units



Area = 12 square units