

MATH NEWS

Grade 2 Module 8 Topic D

2nd Grade Math

Module 8: Time, Shapes, and Fractions as Equal Parts of Shapes

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 8 of Eureka Math (Engage New York) allows students to develop an understanding of unit fractions as equal parts of a whole. This newsletter will discuss Module 8, Topic D.

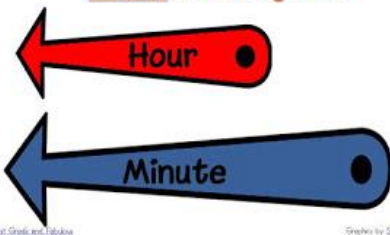
Topic D: *Application of Fractions to Tell Time*

Words to Know:

Partition: to divide into parts

Elapsed Time or Interval: the period of time from beginning to end

Hour is the short word.
Hour is the short hand.
Minute is the long word.
Minute is the long hand.



OBJECTIVES OF TOPIC D

Construct a paper clock by partitioning a circle into halves and quarters, and tell time to the half hour or quarter hour.

Tell time to the nearest five minutes.

Tell time to the nearest five minutes; relate a.m. and p.m. to time of day.

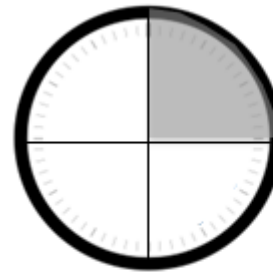
Solve elapsed time problems involving whole hours and a half hour.

Focus Area– Topic D

Time, Intervals

Students apply their understanding of partitioning the whole into halves and fourths to tell time to the nearest five minutes, using both analog and digital clocks. They construct simple clocks and see the relationship to partitioning a circle into quarters and halves, thereby decomposing 60 minutes. They also use their understanding of skip-counting by fives and tens to tell time on an analog clock. Finally, they apply their learning by calculating time intervals of hours and half hours and determining the time interval in days.

Fractions of the Clock



1 quarter



1 half or
2 quarters



Quarter to 4



Half past 8

Examples of Elapsed Time

How much time has passed?

$$\begin{array}{r} \text{a. } 3:30 \text{ a.m.} \rightarrow 10:00 \text{ a.m.} \quad \underline{\mathbf{6 \text{ hours } 30 \text{ minutes}}} \\ \quad \quad \quad +6 \text{ hours} \quad \quad +30 \text{ minutes} \\ 3:30 \text{ a.m.} \rightarrow 9:30 \text{ a.m.} \rightarrow 10:00 \text{ a.m.} \end{array}$$

$$\begin{array}{r} \text{b. } 7:00 \text{ p.m.} \rightarrow 1:30 \text{ a.m.} \quad \underline{\mathbf{6 \text{ hours } 30 \text{ minutes}}} \\ \quad \quad \quad +5 \text{ hours} \quad \quad +1 \text{ hour } 30 \text{ minutes} \\ 7:00 \text{ p.m.} \rightarrow 12:00 \text{ a.m.} \rightarrow 1:30 \text{ a.m.} \end{array}$$



Tracy arrives at school at 7:30 a.m. She leaves school at 3:30 p.m. How long is Tracy at school?

Tracy is at school 8 hours.

$$\begin{array}{r} 7:30 \text{ a.m.} \rightarrow 3:30 \text{ p.m.} \\ \quad \quad \quad +5 \text{ hours} \quad \quad +3 \text{ hours} \\ 7:30 \text{ a.m.} \rightarrow 12:30 \text{ p.m.} \rightarrow 3:30 \text{ p.m.} \end{array}$$

