Lesson 7: Drawing Parallelograms

Classwork

**Example 1**

Use what you know about drawing parallel lines with a setsquare to draw rectangle with dimensions of your choice. State the steps you used to draw your rectangle, and compare those steps to those of a partner’s.

**Example 2**

Use what you know about drawing parallel lines with a setsquare to draw rectangle with cm and cm. Write a plan for the steps you will take to draw .



Example 3

Use a setsquare, ruler and protractor to draw parallelogram so that the measurement of , cm, the measurement of , and the altitude to is cm.

Exercise 1

Use a setsquare, ruler, and protractor to draw parallelogram so that the measurement of , cm, the measurement of , and the altitude to is cm.

Example 4

Use a setsquare, ruler and protractor to draw rhombus so that the measurement of , the measurement of , and each side of the rhombus measures cm.

Problem Set

1. Draw rectangle with cm and cm.
2. Use a setsquare, ruler and protractor to draw parallelogram so that the measurement of , cm, , and the altitude to is cm.
3. Use a setsquare, ruler and protractor to draw rhombus so that the measurement of , and each side of the rhombus measures cm.

The following table contains partial information for a parallelogram . Using no tools, make a sketch of the parallelogram. Then use a ruler, protractor, and setsquare to draw an accurate picture.

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
|  |  |  | Altitude to  |  | Altitude to  |
|  |  | cm |  |  cm |  |
|  |  |  cm |  |  cm |  |
|  |  |  cm |  cm |  |  |

1. Use what you know about drawing parallel lines with a setsquare to draw trapezoid with parallel sides and . The length of is cm and the length of cm; the height between the parallel sides is cm. Write a plan for the steps you will take to draw .
2. Draw rectangle with cm and cm using appropriate tools.
3. Challenge: Determine the area of the largest rectangle that will fit inside an equilateral triangle with side length cm.