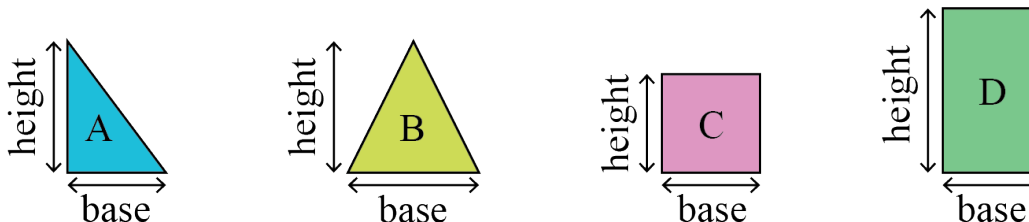# Problem of the Week
Problem B
Another Dimension

Kalle draws four shapes on grid paper. Shape A is a right-angled triangle, shape B is an isosceles triangle, shape C is a square, and shape D is a rectangle. Each shape has a horizontal base and a vertical height.

Using the following clues, determine the base and height for each shape.

1. The base of shape A is equal to the base of shape D.

2. The base of shape A is one unit less than the base of shape B.

3. The height of shape C is equal to the base of shape A.

4. The height of shape B, the height of shape A, and the base of shape B are all equal.

5. The area of shape C is 9 square units.

6. The total area of all four shapes is 38 square units.

THEMES: COMPUTATIONAL THINKING, GEOMETRY & MEASUREMENT