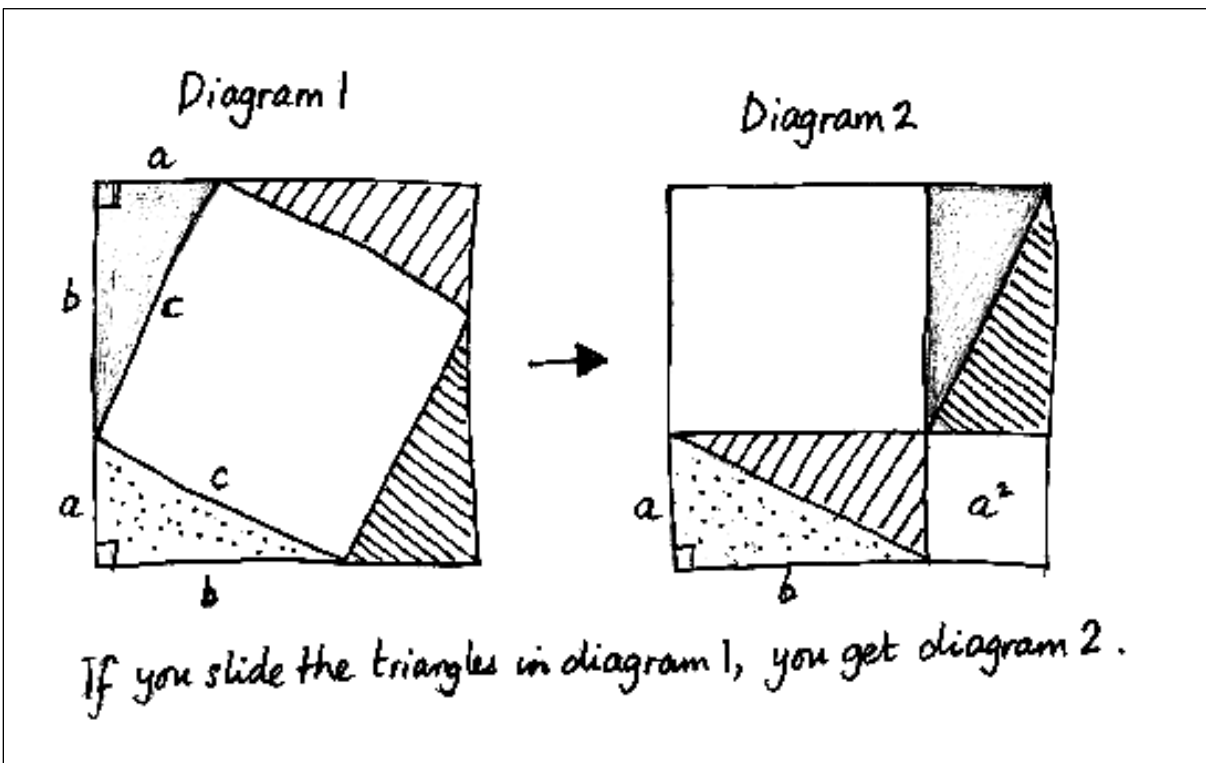# Proving the Pythagorean Theorem

Marty is trying to prove the Pythagorean theorem.

He draws a sketch.

1. Re-draw Marty's diagram so it is more accurate, using pencil and ruler.
   Label your diagram clearly.

2. Write down what you know about all the lengths, angles, shapes, and areas on the diagram.
   Give reasons for your statements.

3. Using the diagram, construct a proof to show that in any right triangle with sides a, b and
   hypotenuse c, $a^2+b^2=c^2$.

Student Materials   Proofs of the Pythagorean Theorem   S-1

Grid Paper