Main_10

Red Text → Given Fact

Useful Information

- All sides of a square are of equal length.
- **Area of a square**: length * length

Helping Ino

Ino can first check if the object is a square by saying $x = length + length$. If x is equal to Length + Width

We can confirm that the object **IS** a square.

We are also able to say that if x IS NOT equal to Length + Width then the object **is** a rectangle.

Since this is a decision to be made we should use an if, else, then statement in our algorithm/ program.

Ino may implement the algorithm below.

```
PROGRAM squaresAndRectangles
BEGIN

length <- 0
lengthPlusWidth <- 0
perimeter <- 0
RecArea <- 0

PRINT "Enter a length: "
READ_INT length

PRINT "Enter the sum of length and width: "
READ_INT lengthPlusWidth

PRINT "What is the perimeter of the shape: "
READ_INT perimeter

recArea <- (lengthPlusWidth - length) * length

IF length * 2 == lengthPlusWidth THEN
    PRINT "This shape is a Square with a perimeter of", perimeter "and area" length * length
ELSE THEN
    PRINT "This shape is a Rectangle with a perimeter of", perimeter "and area" recArea
ENDIF

END
```