2-101. Draw the triangle below on graph paper. Then draw a square on $\overline{K M}$ and use it to find the length of $\overline{K M}$.


2-102. Examine the rectangle below.

a. What is the perimeter in terms of $x$ ? In other words, find the perimeter.
b. If the perimeter is 78 cm , find the dimensions of the rectangle. Show all your work.
c. Verify that the area of this rectangle is 360 sq. cm. Explain how you know this.

2-103. Examine the arrow diagram below.
Polygon is a parallelogram $\rightarrow$ area of the polygon equals base times height.
a. Write this conjecture as a conditional ("If, then") statement.
b. Write a similar conjecture about triangles, both as a conditional statement and as an arrow diagram.

2-110. Write the equation of each line described below in slope-intercept form $(y=m x+b)$.
a. $\quad m=\frac{6}{5}$ and $b=-3$
b. $m=-\frac{1}{4}$ and $b=4.5$
c. $m=\frac{1}{3}$ and the line passes through the origin $(0,0)$
d. $m=0$ and $b=2$

