***Embedded Rectangles***

Figure 1 Figure 2 Figure 3 Figure 4

How many rectangles are there in figure 1? Figure 2? Figure 3? Figure 4?

Do you see a pattern in your answers above? Describe it in words or symbols. How do you know if works?

Without drawing the next figures in the sequence predict the number of rectangles in figure 7. Test your prediction.

What can you say about the total number of rectangles in a figure of any size?