## Real Life Applications of Applied Measure

• Perimeter and area are used a lot in making measurements. Remember that the Perimeter is the distance around the outside of a particular shape and Area is the amount of flat space enclosed within the boundaries of a shape.

1) Perimeter and Area can be used a lot in simple home decorating problems. For example, before laying carpet in a particular room in the house, you would need an estimate of the area of the room to see how much carpet you need. If you were putting up a border or coving on the walls, you would need to calculate the perimeter of the room instead however. If you wanted to fence off the back garden, you would need to know the perimeter of the garden, whereas if you wanted to put in a swimming pool in the back garden, you might want to know how big an area you can fit in the space you have!

2) When constructing a house, an engineer would need to know the ground floor area, to know how much concrete would be needed for the foundations. If a footpath was to be built around the house, the perimeter would need to be calculated.

3) A soccer club might want to put up a fence to stop spectators encroaching on the pitch at the end of games. In order to calculate the cost of building the fence, they would need to calculate the perimeter and figure out how much wire they would need. If they wanted to build an astro-turf pitch for training alongside the main pitch, they would need to know the area of the pitch in order to buy the correct amount of "carpet" for it.

4) In order to build a run for your dog at home, you would need to calculate what area of a run you need, to give the dog as much space as possible to move around in. You would also need to calculate the perimeter of the run to figure out how much fencing you're going to need to keep them in!

5) You might have learned in Science that pressure depends on two things: the force being applied and the area that the force is applied over. Simply put...the bigger the area, the less the pressure. The ability to calculate area is needed in the design of hydraulic pistons, which are used in car jacks, JCB/excavator arms, gas and oil drilling, cranes and fire engine ladders for example. You can read about some other interesting uses of hydraulic pistons here:

http://www.hydrauliccylindergroup.com/index.htm

