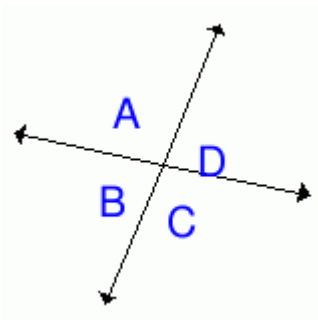


## GEOMETRY BASICS-1

[1] What is the complement of an angle that measures  $58^\circ$ ?

[2] In the figure below, two lines intersect to form  $\angle A$ ,  $\angle B$ ,  $\angle C$ , and  $\angle D$ .



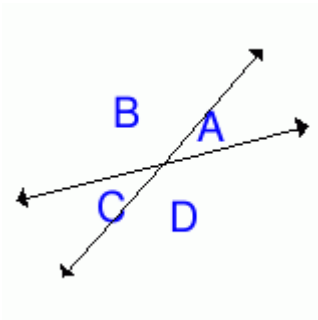
If  $\angle D = 82^\circ$ , find the missing angles.

$$\angle A = \text{}^\circ$$

$$\angle B = \text{}^\circ$$

$$\angle C = \text{}^\circ$$

[3] In the figure below, two lines intersect to form  $\angle A$ ,  $\angle B$ ,  $\angle C$ , and  $\angle D$ .



If  $\angle A = 31^\circ$ , what is  $\angle C$ ? °

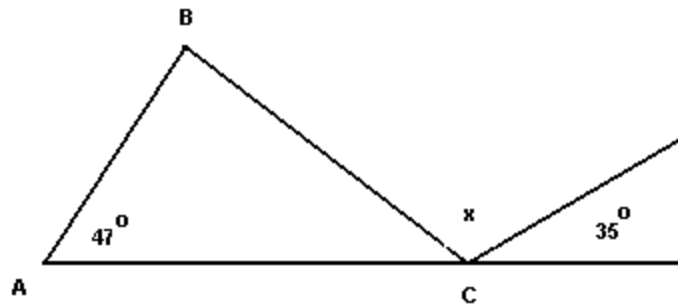
[4]  $\angle A$  and  $\angle B$  are supplementary angles. If  $\angle B = 97$ .

What is  $\angle A$ ? °

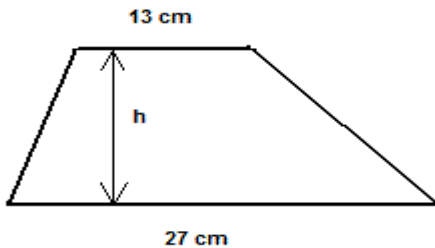
[5] What is the supplement of an angle that measures  $22^\circ$ ? °

**TIME-30 MINUTES**

[6] Find  $x$  if triangle ABC is a right triangle.



[7] Find the height  $h$  of the trapezoid so that its area is equal to 400 square cm.



[8] Define the following terms with an example:

- (i) Reflex Angle      (ii) Obtuse Angle      (iii) Scalene Triangle  
(iv) Rational Numbers      (v) B.O.D.M.A.S      (vi) Closed for division

[9] (i) Find the lowest common multiple of 24, 36 and 40.

(ii) 252 can be expressed as a product of primes as:-

(iii) Find the highest common factor of 36 and 84.

(iv) The greatest number of four digits which is divisible by 15, 25, 40 and 75 is:

[10] If  $a=7$ ,  $b=9$  and  $c=11$

Find  $(a^3+b^2c+c^2a^2+abc)$  of  $(abc^2)$

**TIME-30 MINUTES**