

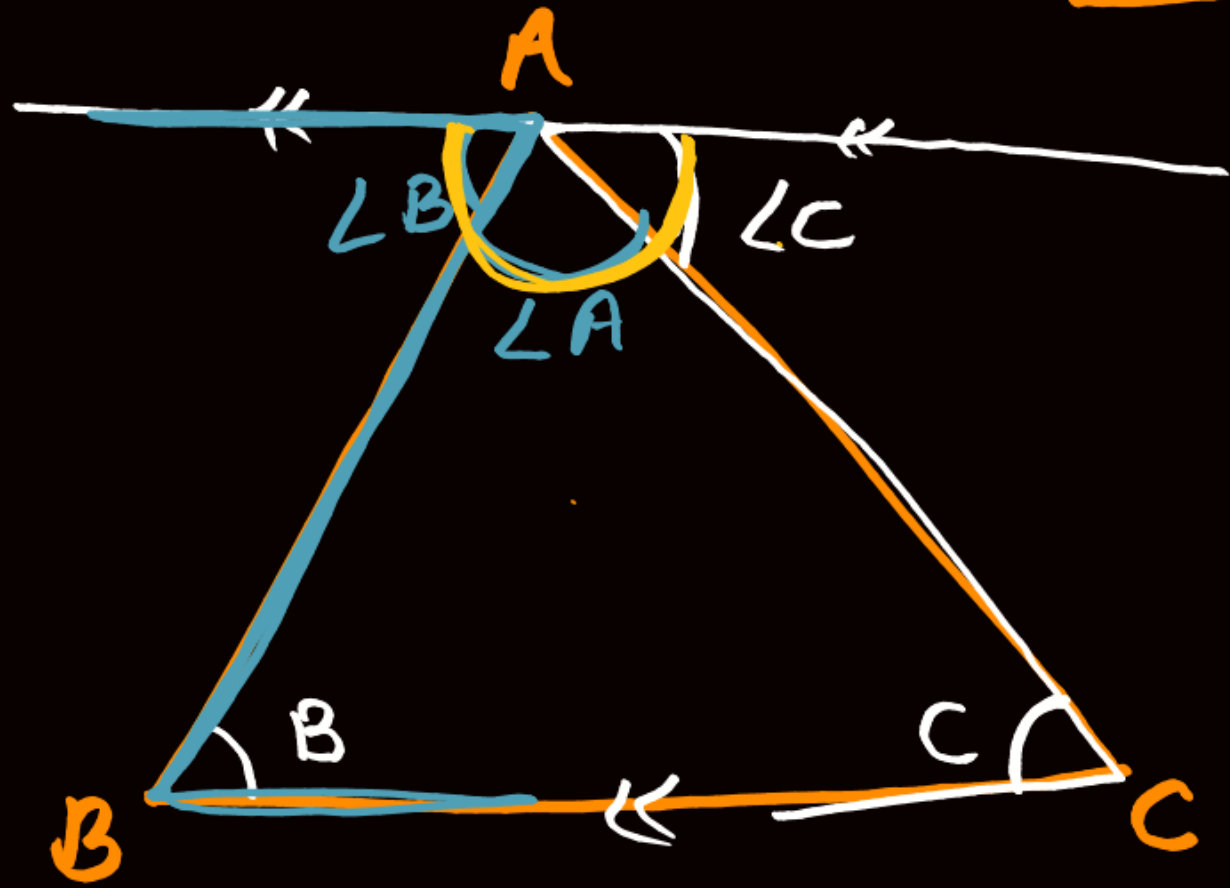
Daily live - 4pm

Maths Foundation Batch

for SSC, Railway, CDS & All other Exams  
(Pre + Mains)

Geometry (ज्यामिति)

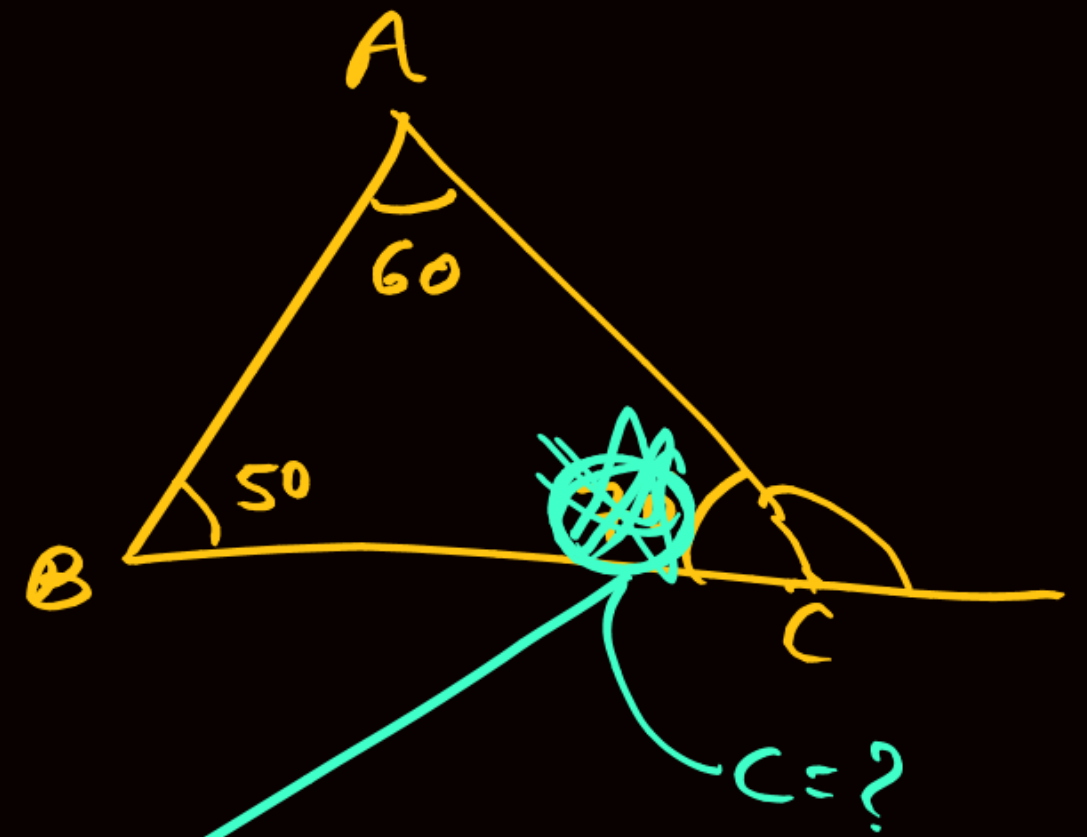
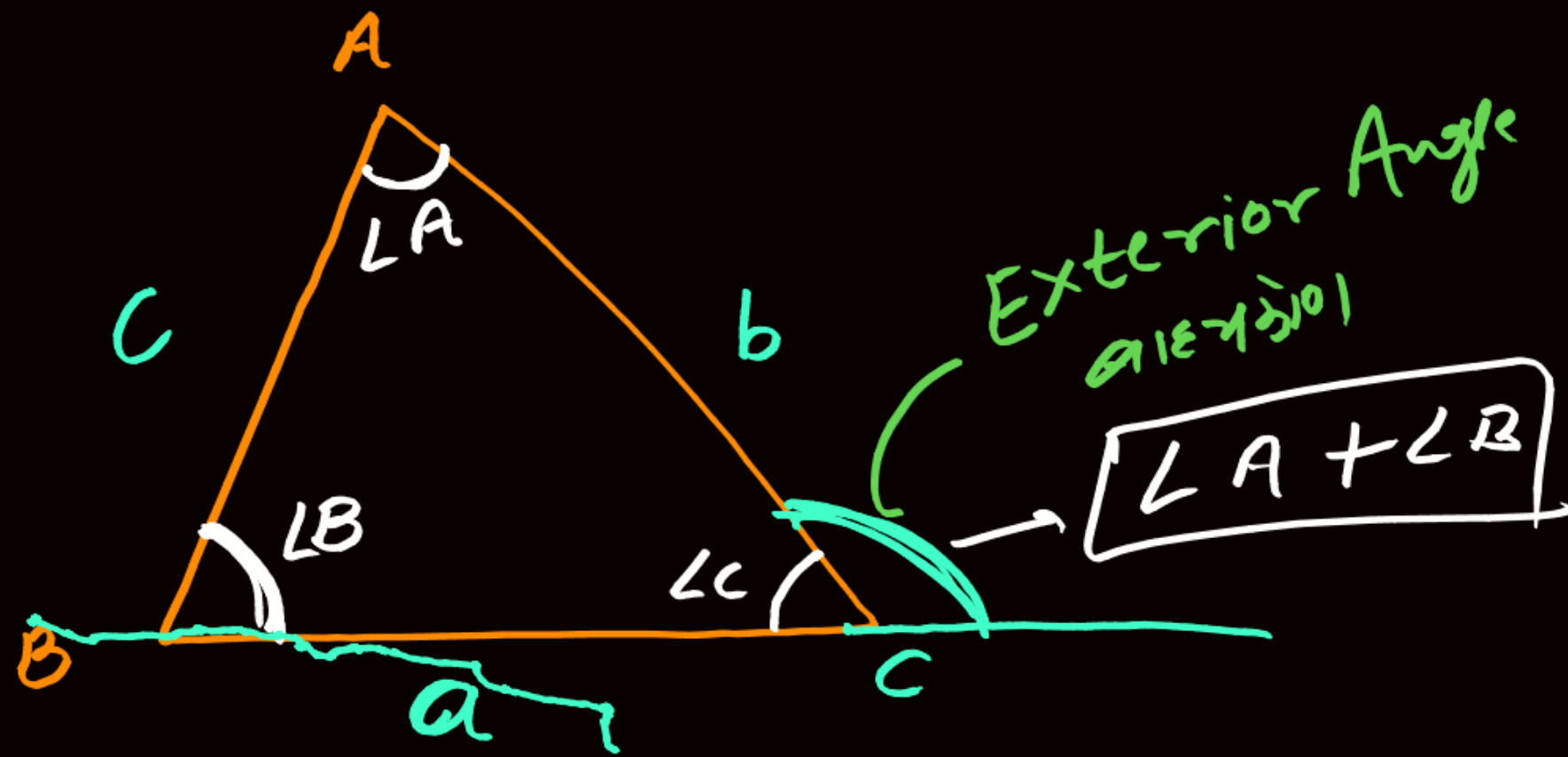
# Triangle (त्रिभुज)



①  $\angle A + \angle B + \angle C \Rightarrow 180^\circ$



2

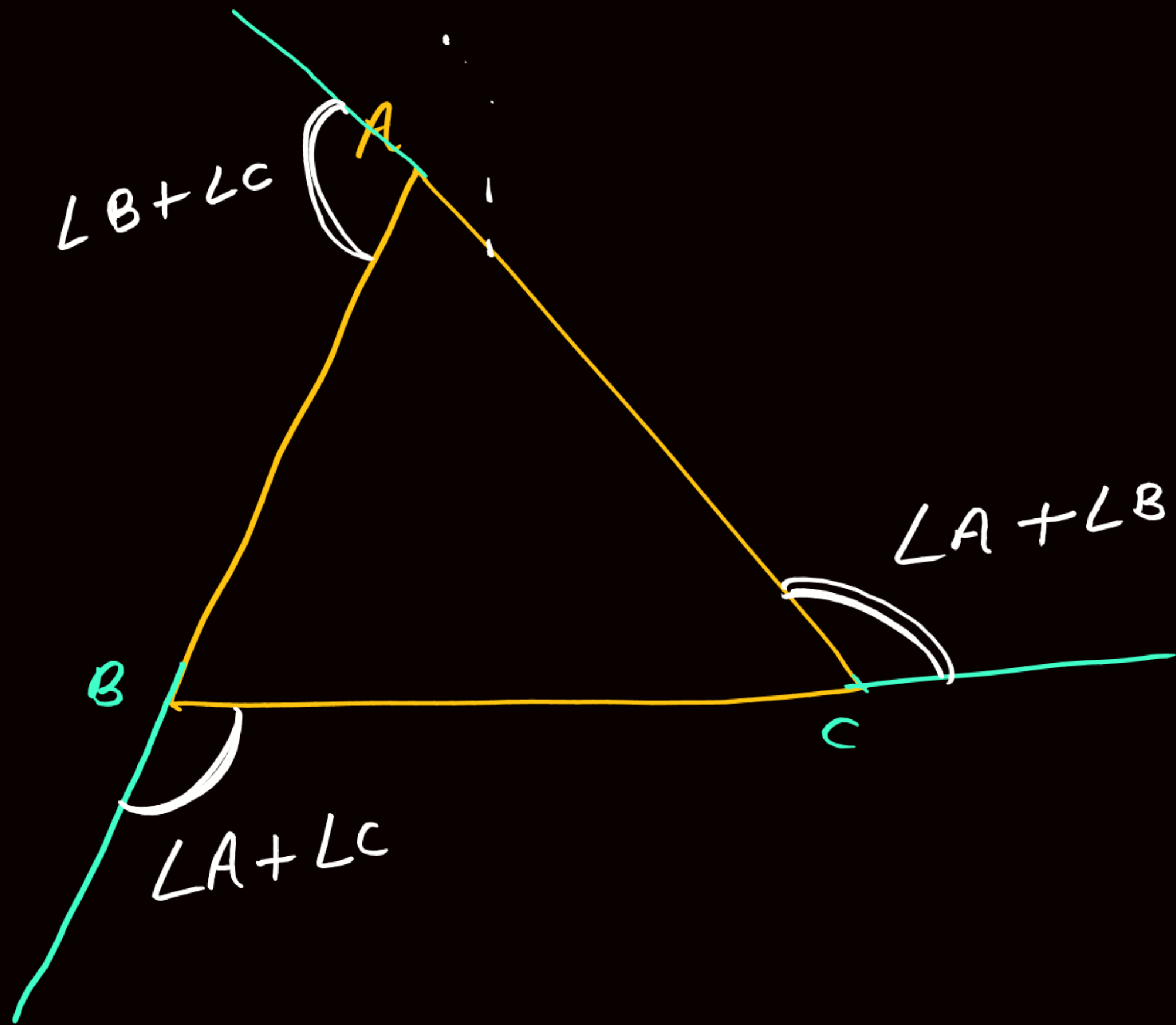


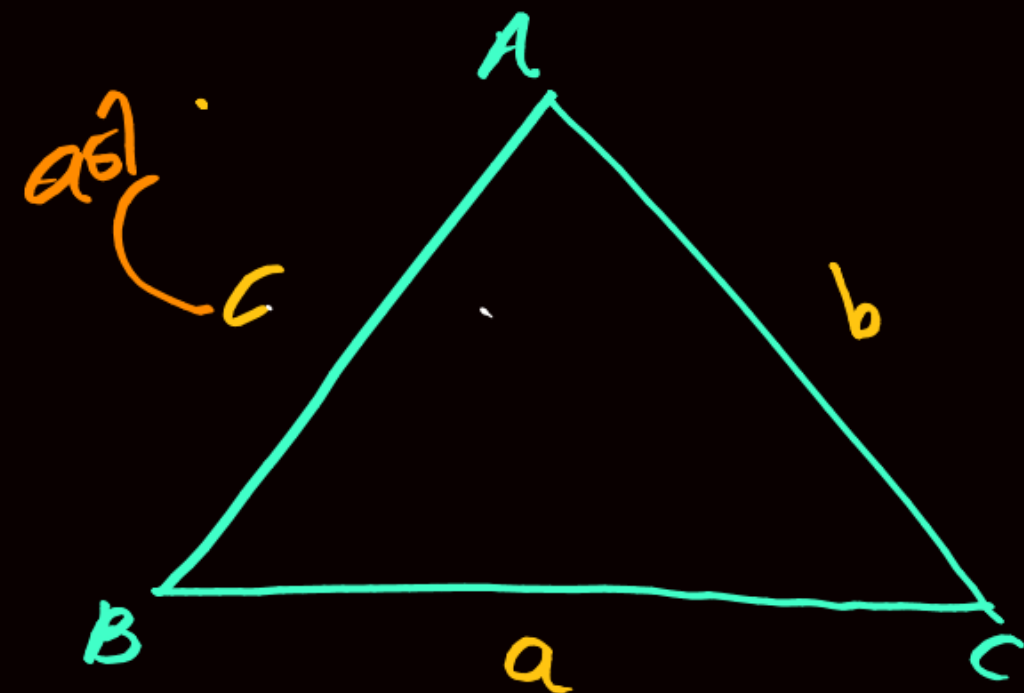
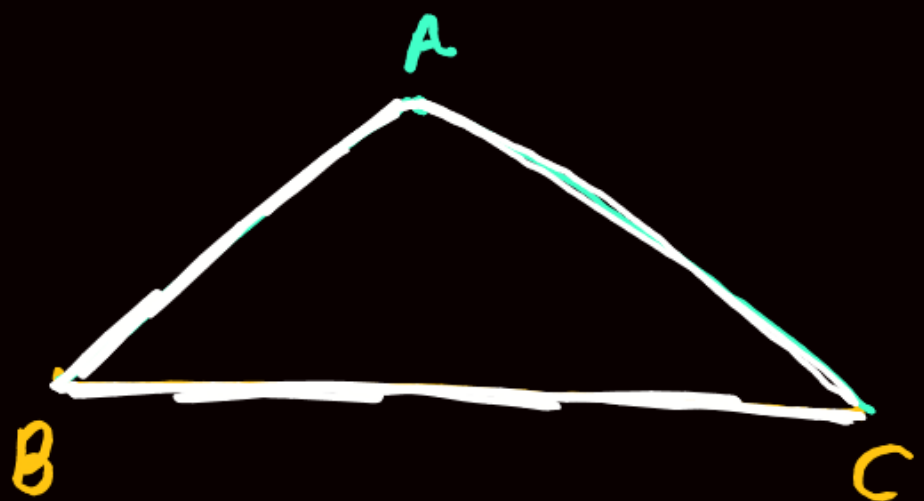
Exterior Angle always Sum of Interior Angle

बाह्यकोण हमेशा. अंत कोणों के योग के बराबर होता है

$$180 - (60 + 50)$$

2

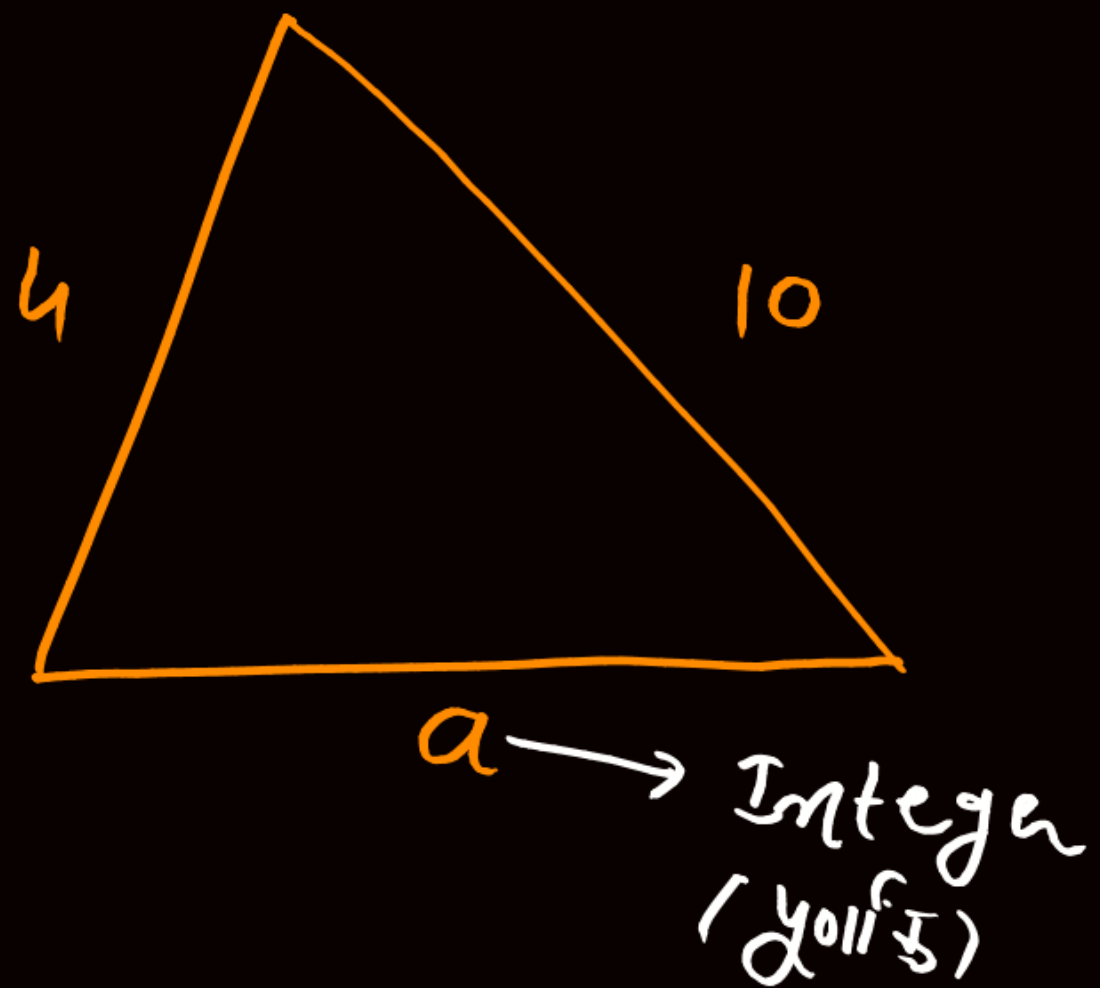




$$\left| \begin{array}{c} -2 \\ 2 \end{array} \right|$$

$$\begin{array}{l} b+c > a \\ c+a > b \\ a+b > c \end{array}$$

$$\begin{array}{l} |b-c| < a \\ |c-a| < b \\ |a-b| < c \end{array}$$



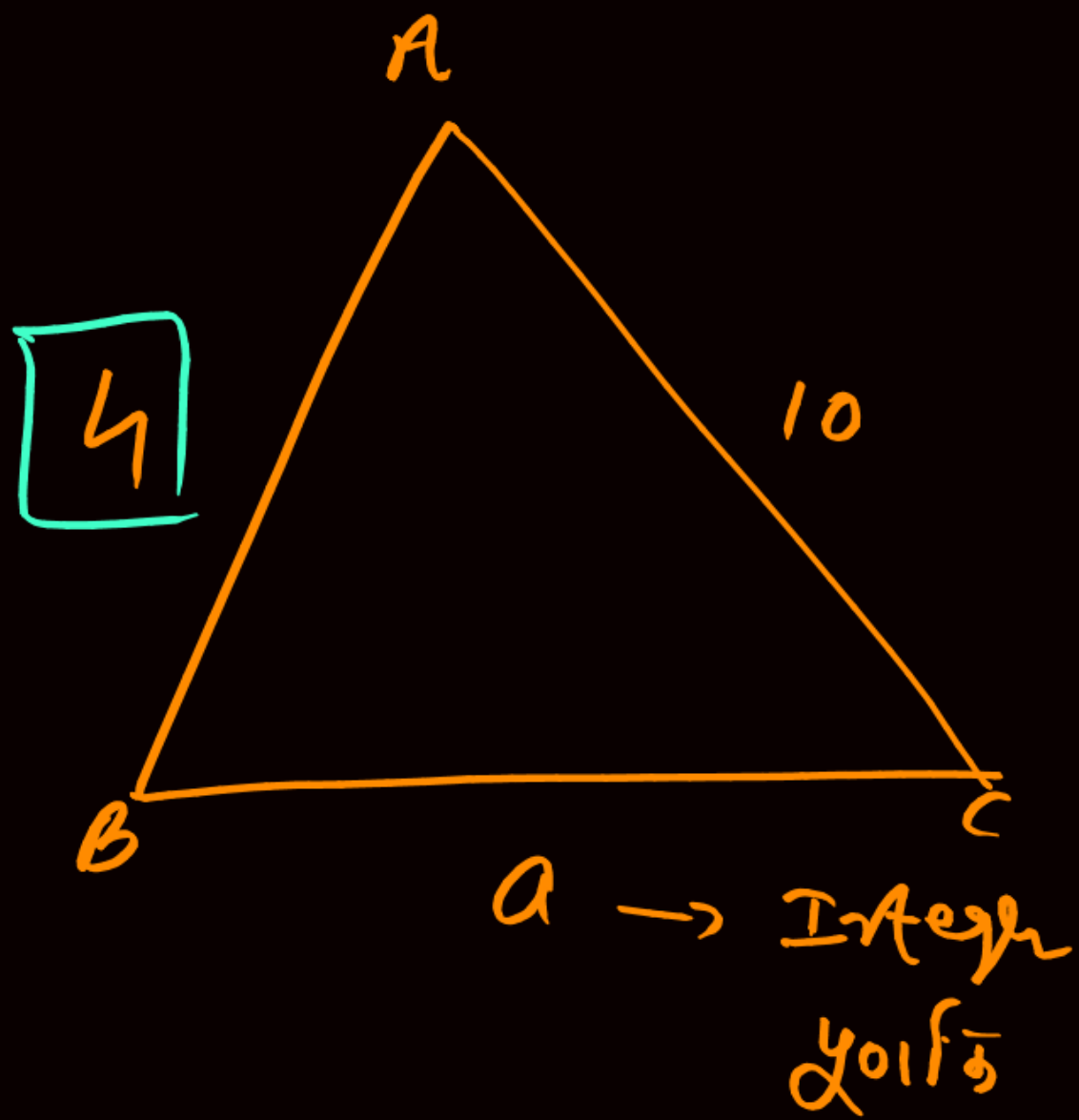
$a = ?$

$$6 < a < 14$$



$a \rightarrow$  minimum  $\rightarrow 7$

$a \rightarrow$  maximum  $\rightarrow 13$



$$6 < a < 14$$

① No of possible, 7, 8, 9, 10, 11, 12, 13

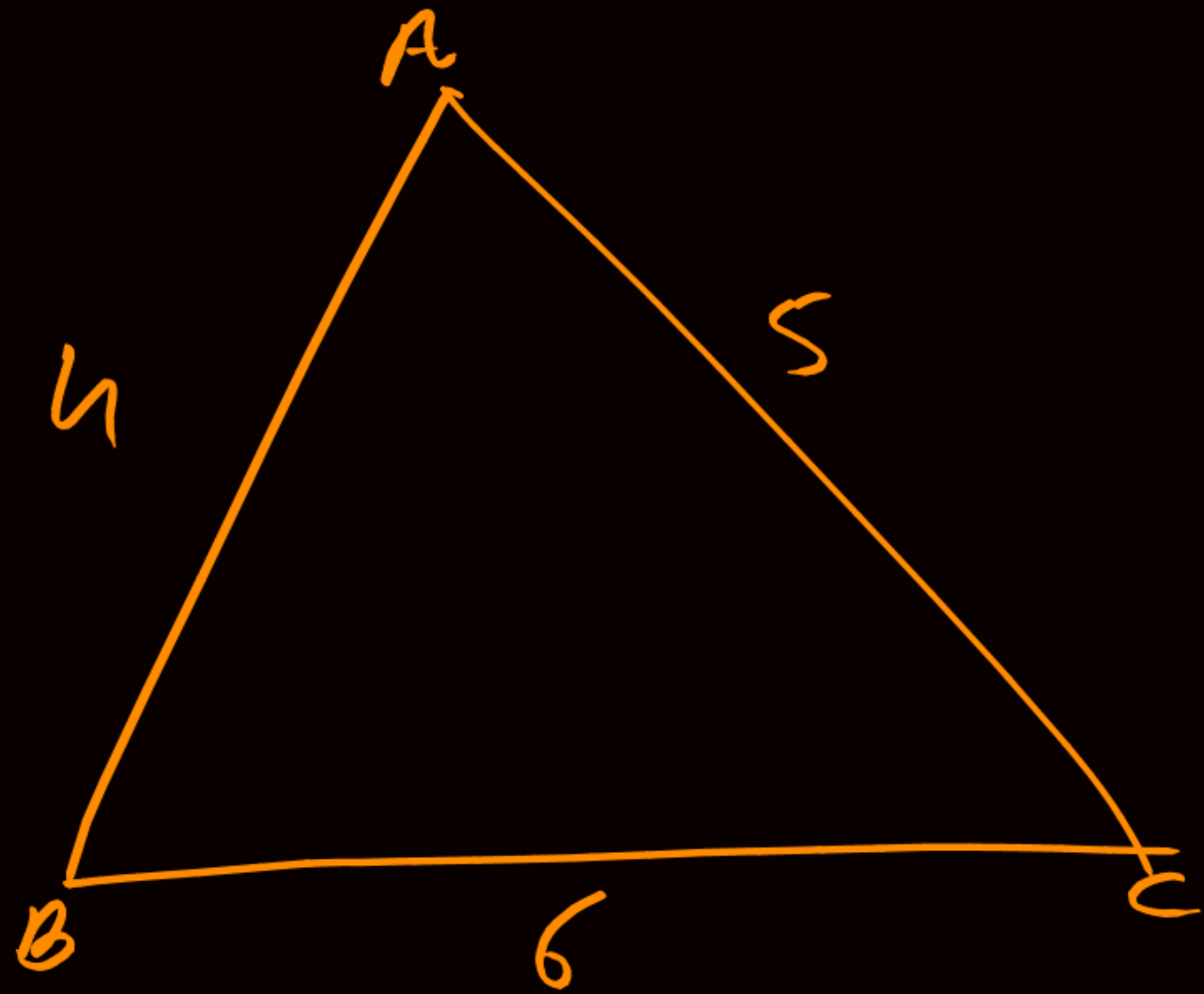
② a min nio  $\Rightarrow 7$

③ a maxi nio  $\Rightarrow 13$

④ No of possible  $\Rightarrow 2n-1$

$$2 \times 4 - 1 \Rightarrow 7$$



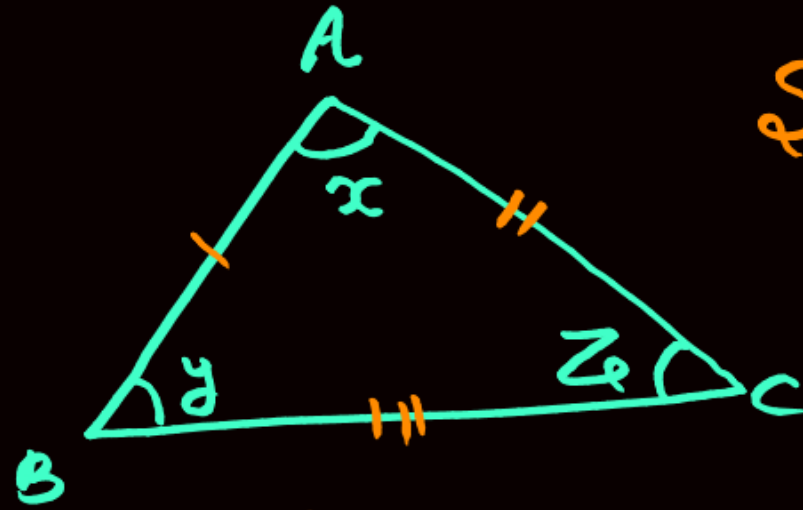


$$\text{Perimeter} = \underline{\underline{15}}$$
$$\text{परिमाप} = ?$$

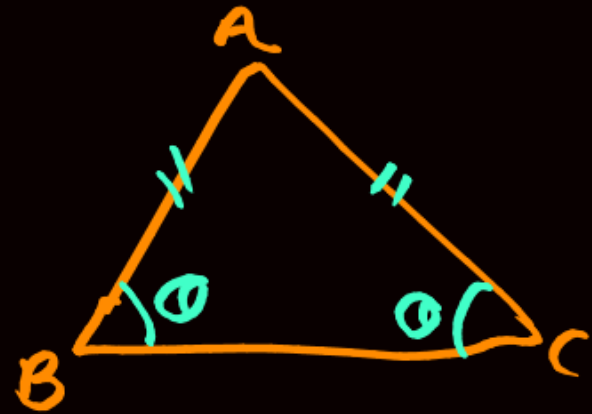
# Types of Triangle



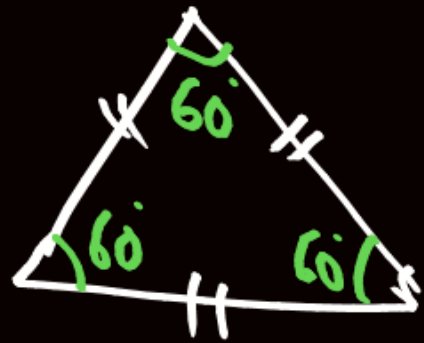
आधार  
Based on side



Scalene triangle  
(विषमबाहु त्रिभुज)

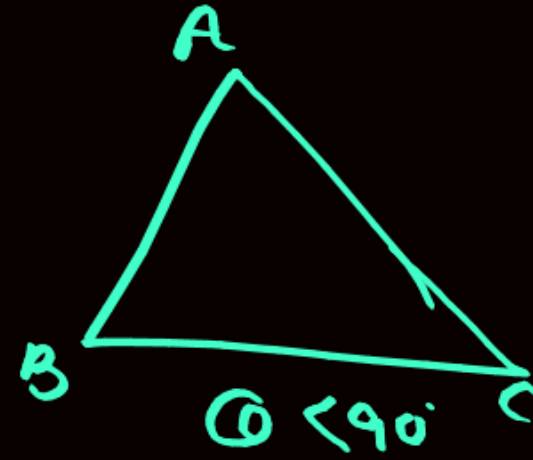


Isosceles triangle  
समद्विबाहु त्रिभुज



Equilateral triangle  
समबाहु त्रिभुज

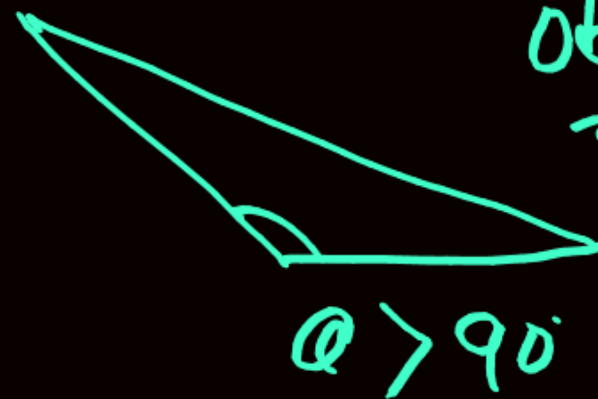
कोण  
Based on Angles



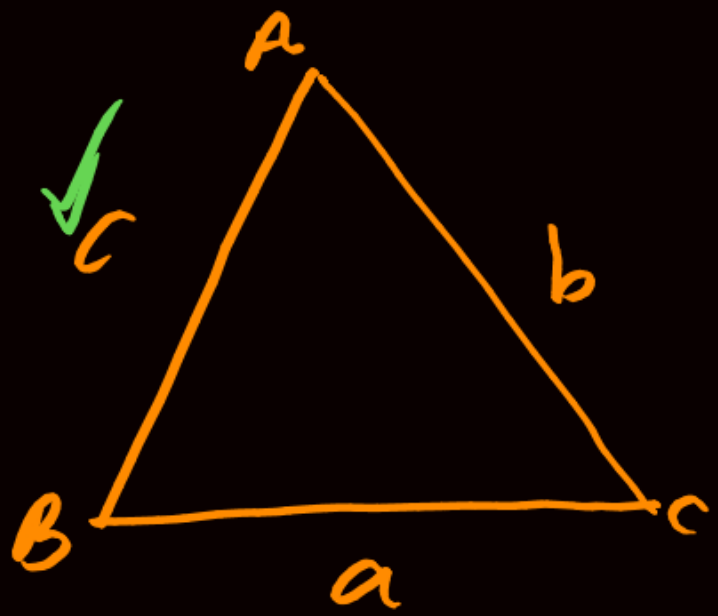
Acute Angle triangle  
-सूत्र कोण त्रिभुज



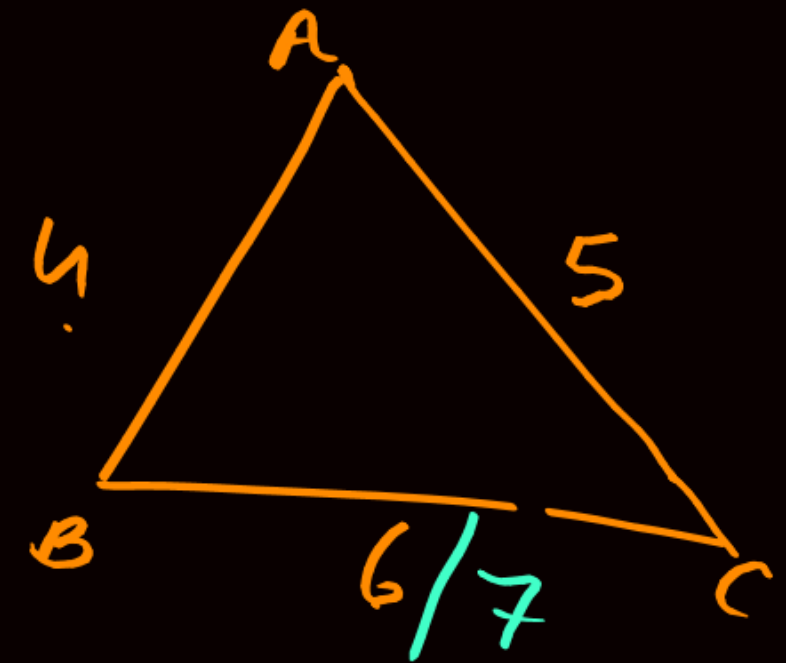
Right Angle triangle  
समकोण त्रिभुज



Obtuse Angle triangle  
अधिक कोण त्रिभुज



②



$$a^2 + b^2 = c^2$$

$$a^3 + b^3 < c^3$$

$$a^2 + b^2 > c^2 \text{ (Acute Angle Tri)} \\ \text{(• धूर्त कोण त्रिभुज)}$$

$$a^2 + b^2 = c^2 \text{ Right Angle Tri} \\ \text{• समकोण त्रिभुज}$$

$$a^2 + b^2 < c^2 = \text{obtuse Angle Tri} \\ \text{अधिक्षकोण त्रिभुज}$$

$$27 + 64 < 125$$

$$16 + 25 = 36 \\ 41 > 36$$

$$16 + 25 = 49 \\ 41 < 49$$

$$a^2 + b^2 = c^2 \\ 16 + 9 = 25$$