

*Решение задач  
на готовых чертежах.*

*Окружность.*

*Центральные и  
вписанные углы.*

*Геометрия.*

*8 класс.*

*Каратанова Марина Николаевна  
МОУ СОШ №256 г.Фокино*



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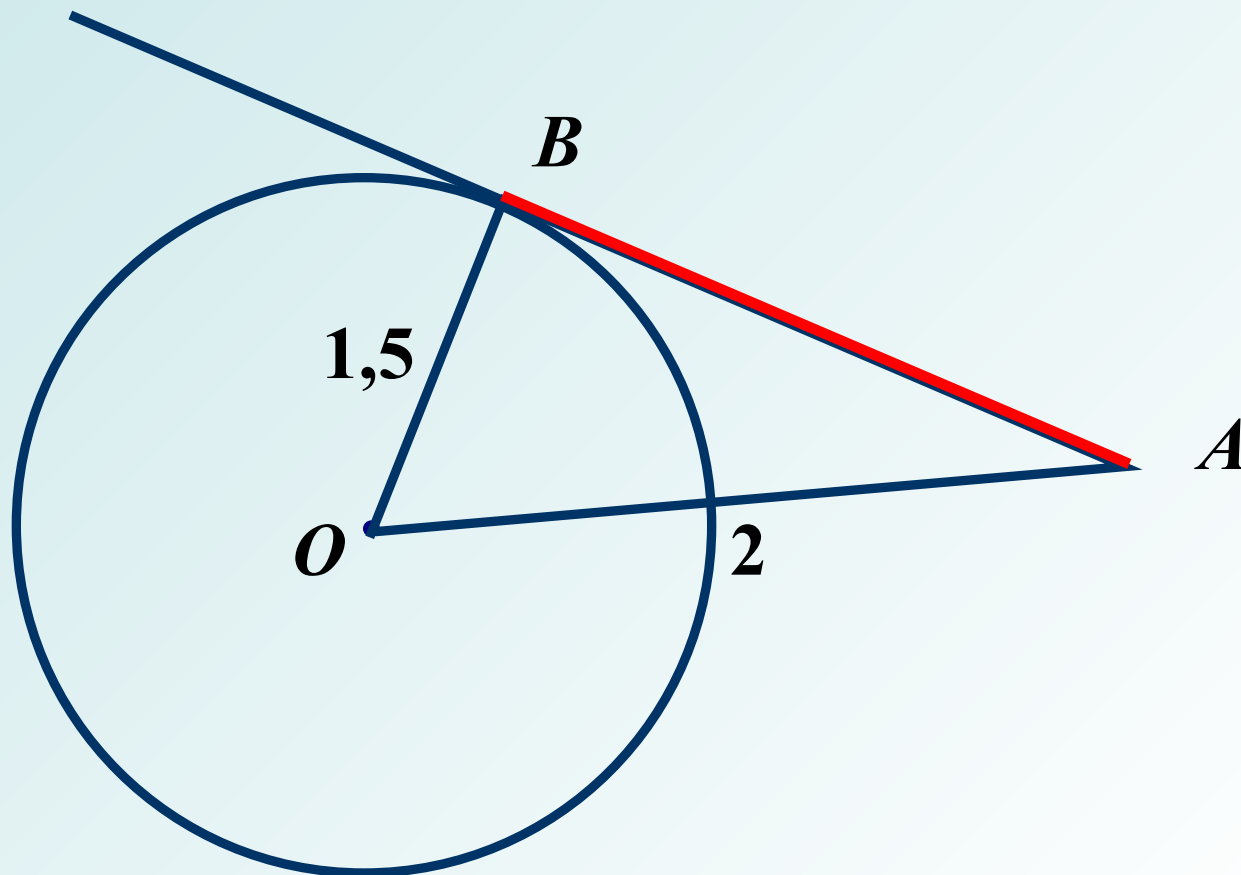
1.

**Дано:**

$\hat{I} \hat{e} \delta . (\hat{I} , r), \hat{A} \hat{A} - \hat{e} \hat{a} \hat{n} \hat{a} \hat{o} \hat{a} \hat{e} \hat{i} \hat{i} \hat{a} \hat{y}$   
 $\hat{I} \hat{A} = 2 \hat{n} \hat{i}, r = 1,5 \hat{n} \hat{i}$

**Найти:**

$\hat{A} \hat{A}$



2.

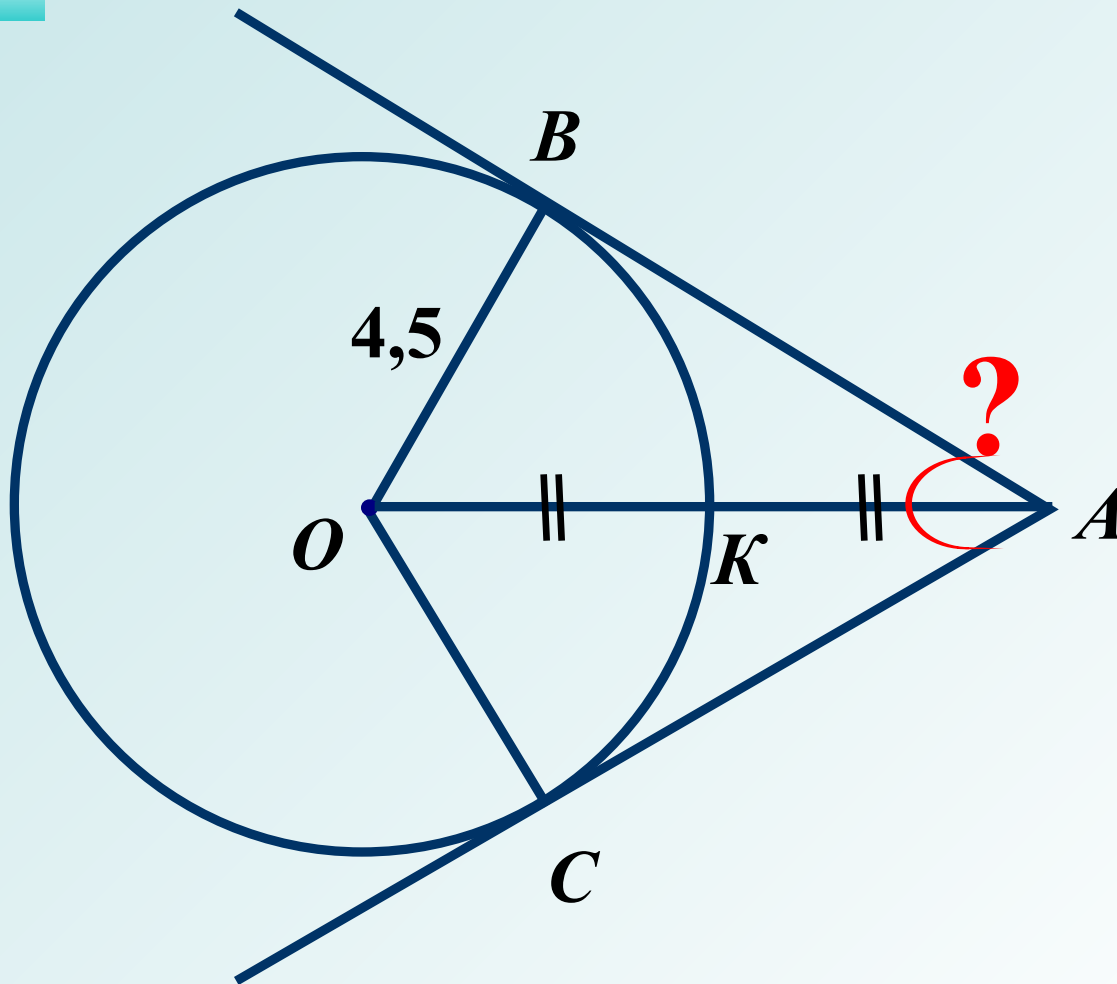
Дано:

$\hat{I} \hat{e} \hat{o} \cdot (\hat{I}, r)$

$\hat{A} \hat{A}, \hat{A} \hat{N} - \hat{e} \hat{a} \hat{n} \hat{a} \hat{o} \hat{a} \hat{e} \hat{i} \hat{i} \hat{u} \hat{a}$

Найти:

$\angle \hat{A} \hat{A} \hat{N}$



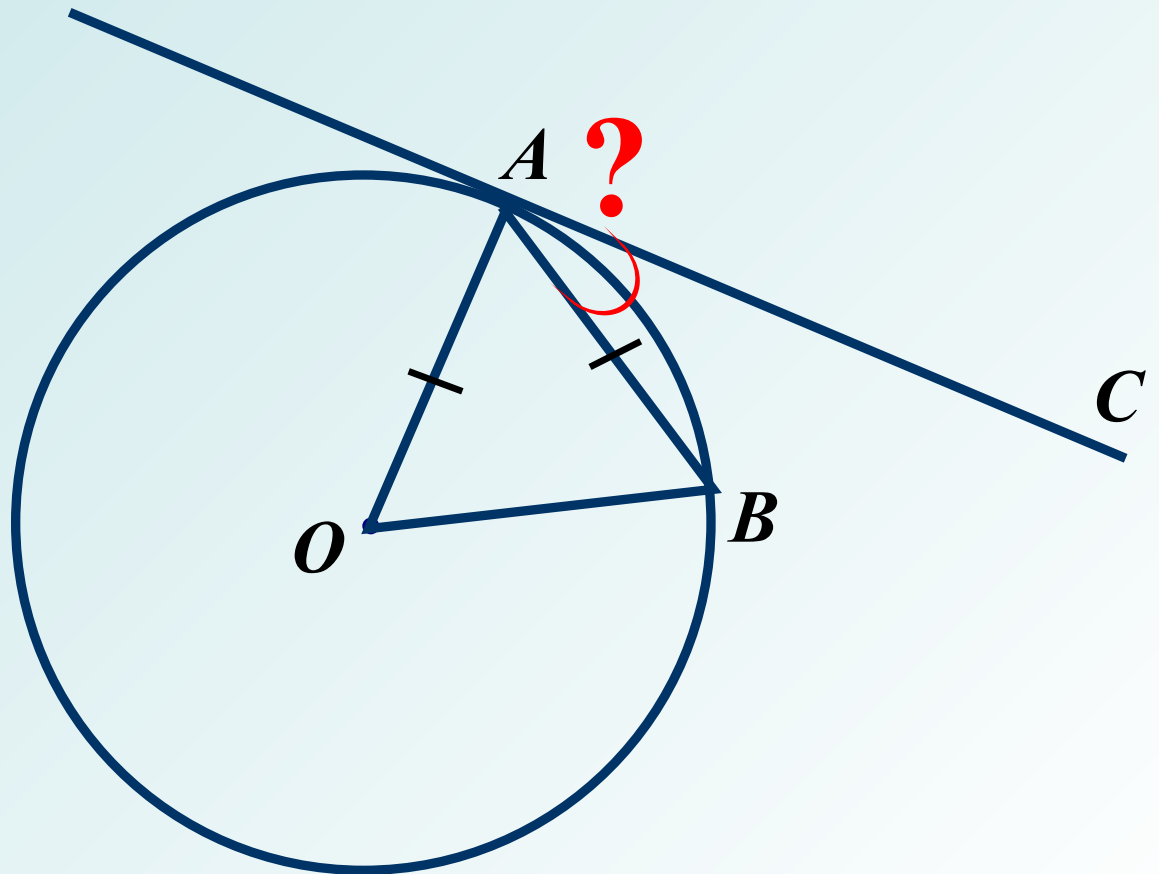
3.

**Дано:**

$\hat{I} \hat{e} \hat{o} . (\hat{I} , \hat{I} \hat{A} )$   
 $\hat{A} \hat{N} \tilde{N} - \hat{e} \hat{a} \hat{n} \hat{a} \hat{o} \hat{a} \hat{e} \hat{i} \hat{i} \hat{a} \hat{y}$

**Найти:**

$\angle \hat{A} \hat{A} \hat{N} \tilde{N}$



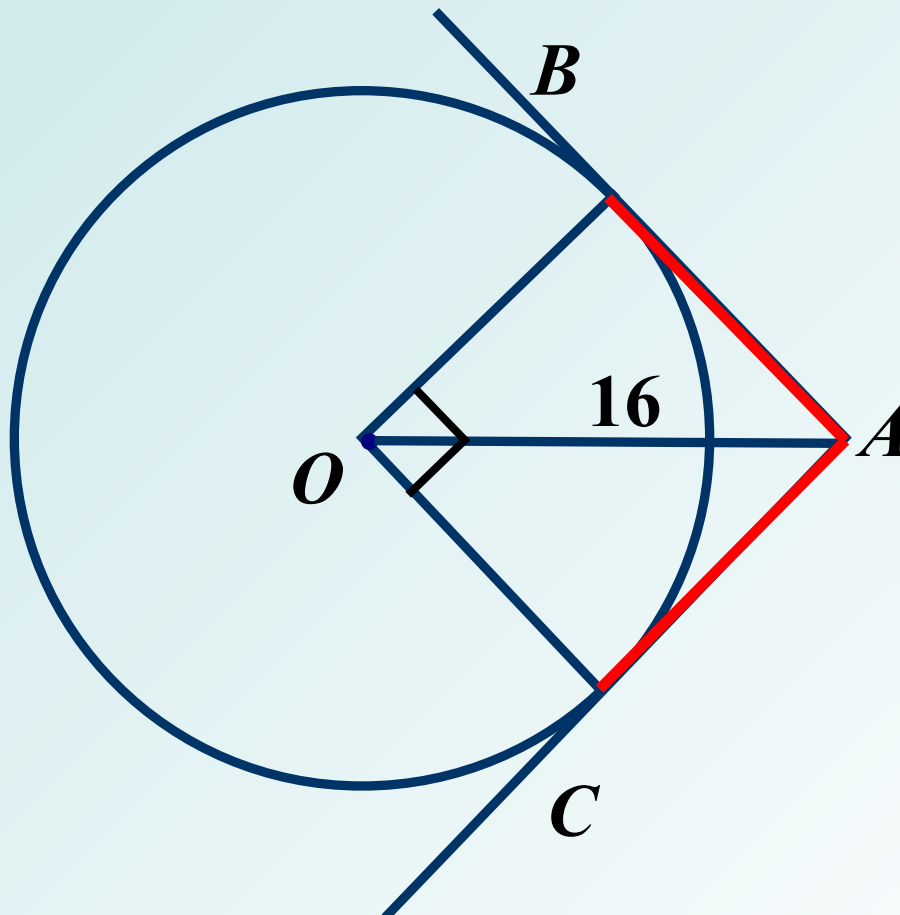
4.

**Дано:**

$\hat{I} \hat{e} \hat{o} \cdot (\hat{I}, \hat{I} \hat{A}), \hat{I} \hat{A} = 16$   
 $\hat{A} \hat{A}, \hat{A} \hat{N} - \hat{e} \hat{a} \hat{n} \hat{o} \hat{o} \hat{a} \hat{e} \hat{i} \hat{i} \hat{u} \hat{a}$

**Найти:**

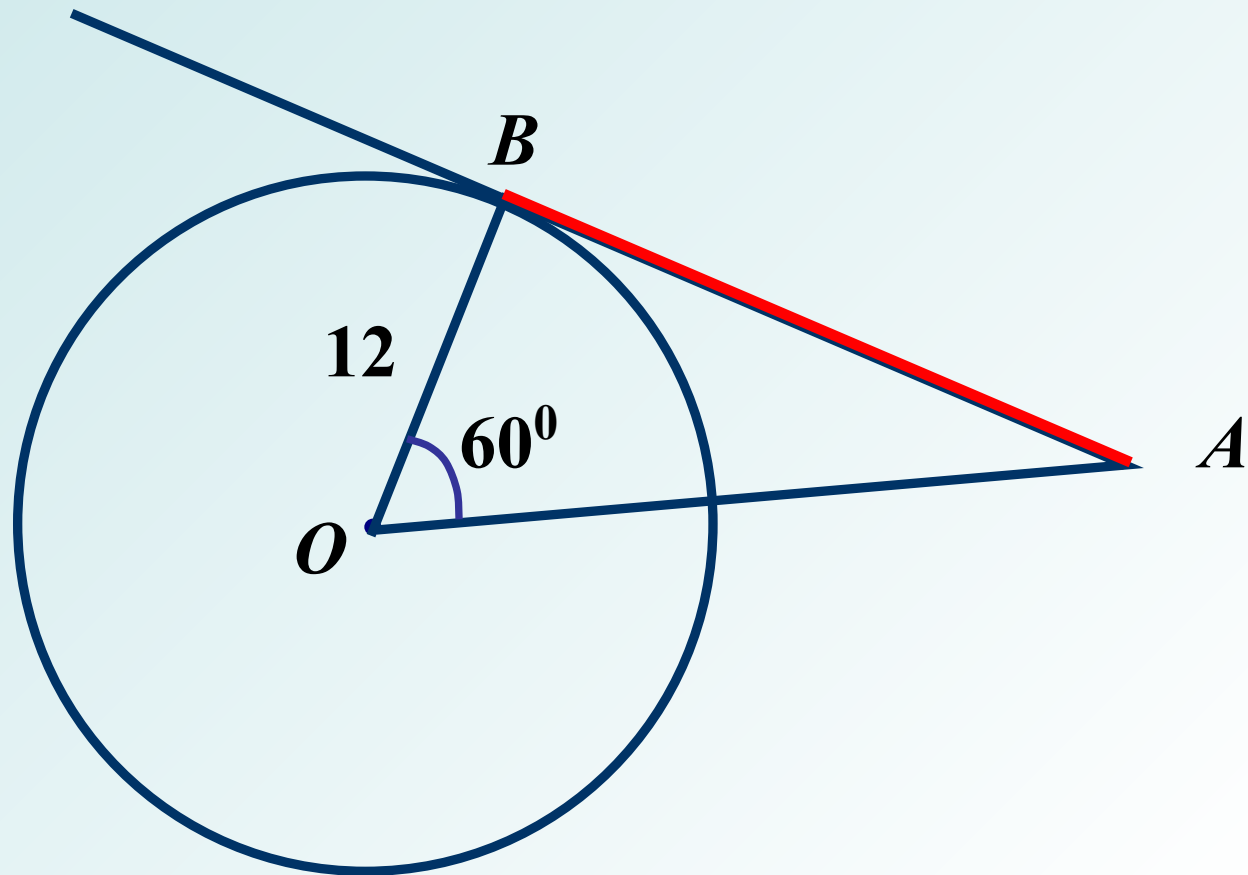
$\hat{A} \hat{A}, \hat{A} \hat{N}$



5.

**Дано:**  $\hat{I} \hat{e} \delta . (\hat{I} , \hat{I} \hat{A} ) ,$   
 $\hat{A} \hat{A} - \hat{e} \hat{a} \hat{n} \hat{a} \hat{o} \hat{a} \hat{e} \hat{i} \hat{i} \hat{a} \hat{y}$

**Найти:**  $\hat{A} \hat{A}$



6.

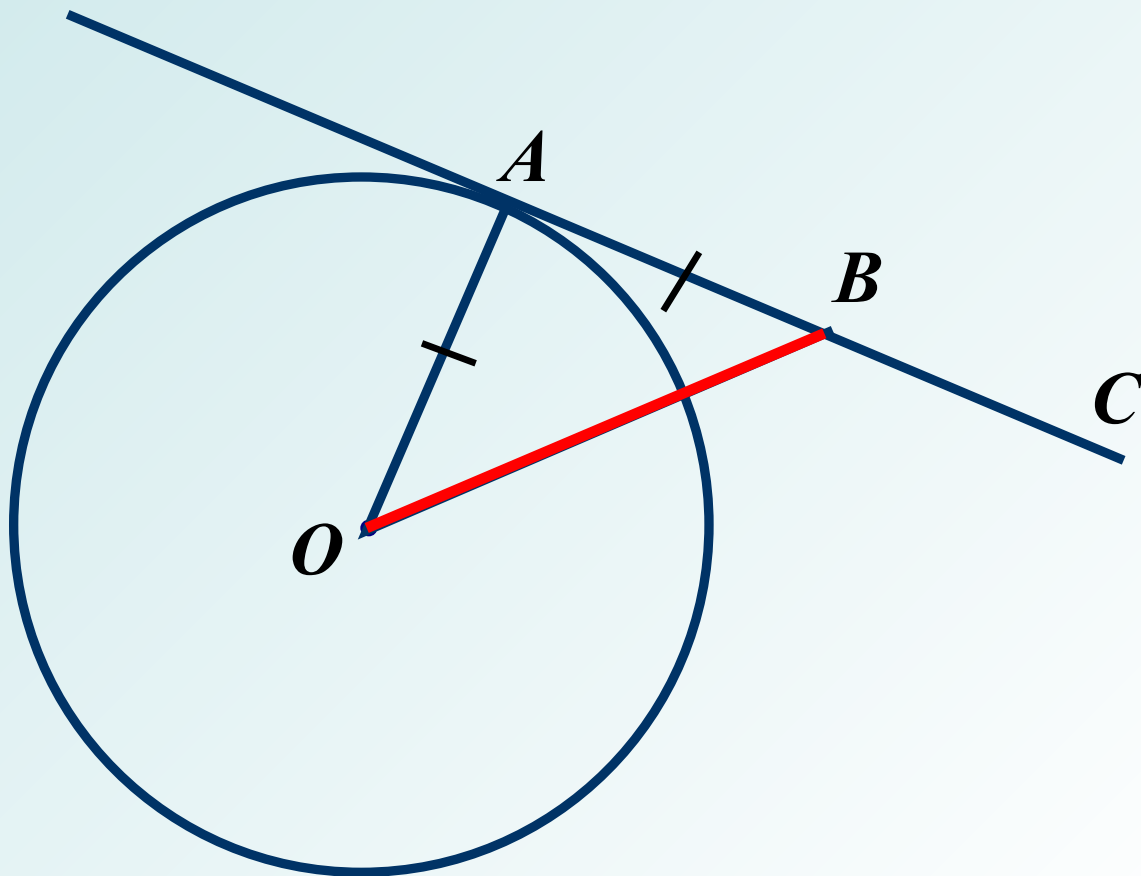
Дано:

$\hat{I} \hat{e} \hat{o} . (\hat{I} , R), R = 5$

$\hat{A} \hat{A} - \hat{e} \hat{a} \hat{n} \hat{a} \hat{o} \hat{a} \hat{e} \hat{i} \hat{i} \hat{a} \hat{y}$

Найти:

$O \hat{A}$





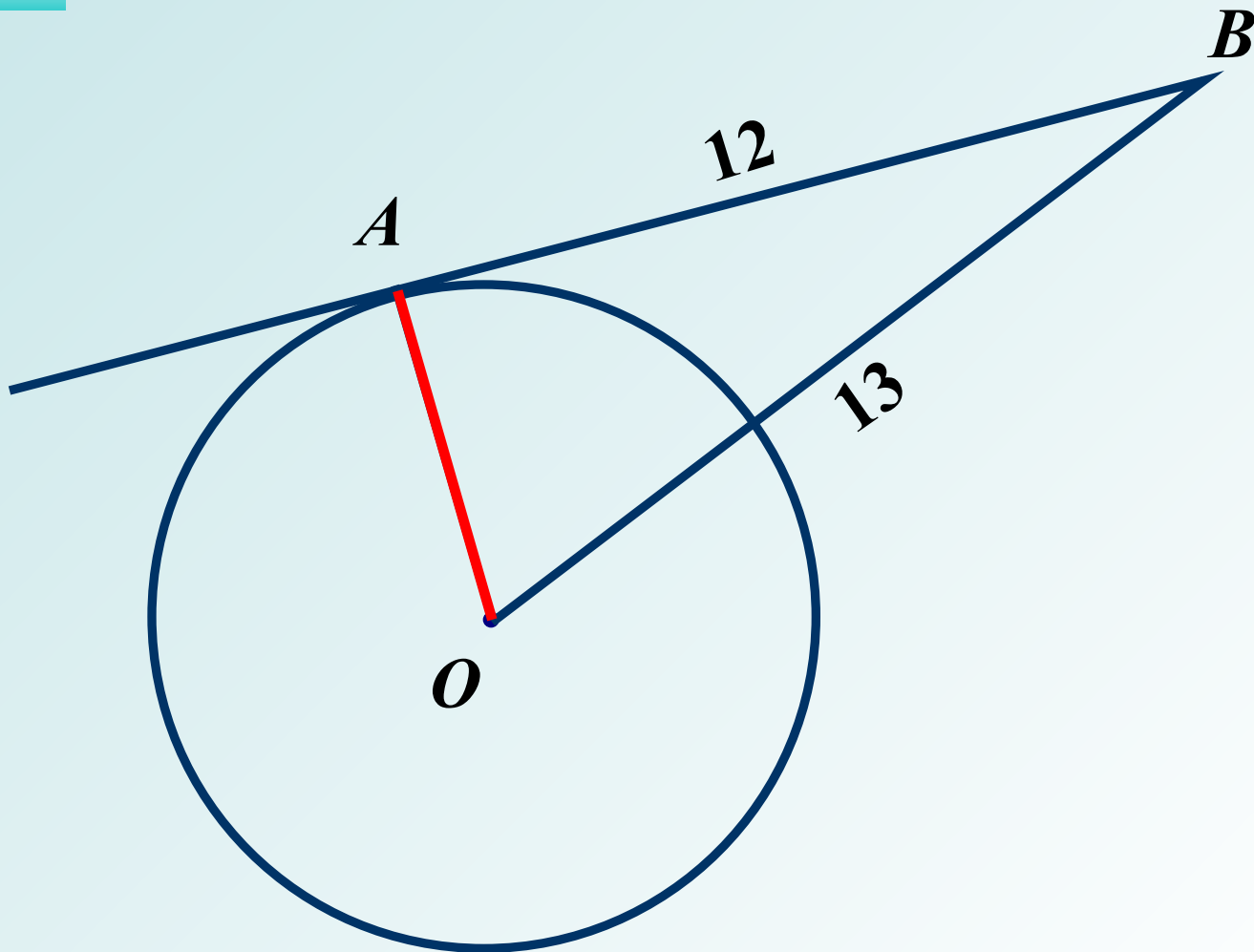
7.

Дано:

$\hat{I} \hat{e} \hat{o} \cdot (\hat{I}, R)$   
 $\hat{A} \hat{A} - \hat{e} \hat{a} \hat{n} \hat{o} \hat{o} \hat{a} \hat{e} \hat{i} \hat{i} \hat{a} \hat{y}$

Найти:

$R \hat{i} \hat{e} \hat{o} \hat{o} \hat{a} \hat{i} \hat{i} \hat{n} \hat{o} \hat{e}$



8.

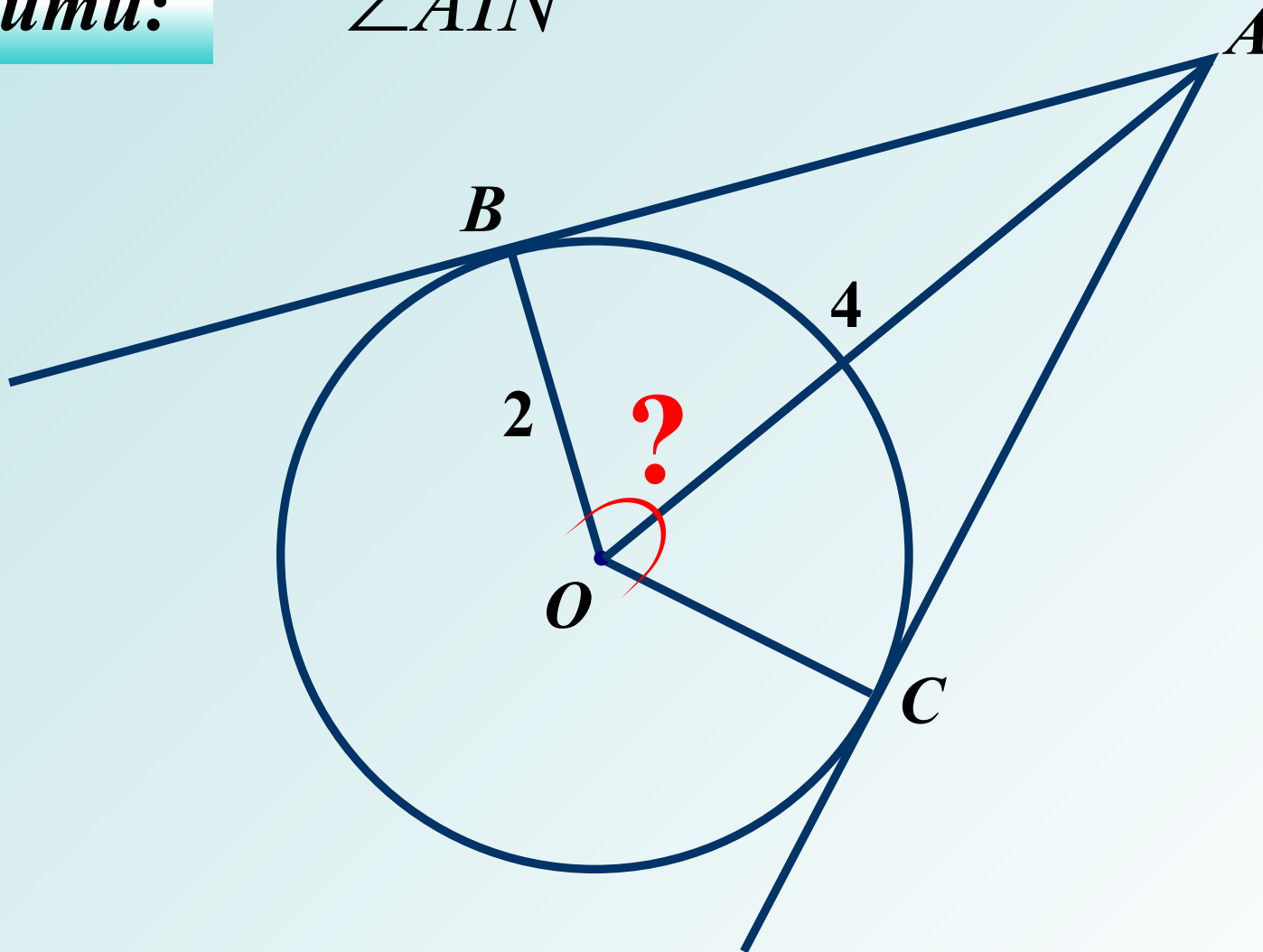
Дано:

$\hat{I} \in \delta$  ( $\hat{I}, \hat{I}A$ ),

$\hat{A}A, \hat{A}N$  –  $\hat{e}a\tilde{n}a\hat{o}a\hat{e}i\hat{u}i\hat{u} \hat{a}$

Найти:

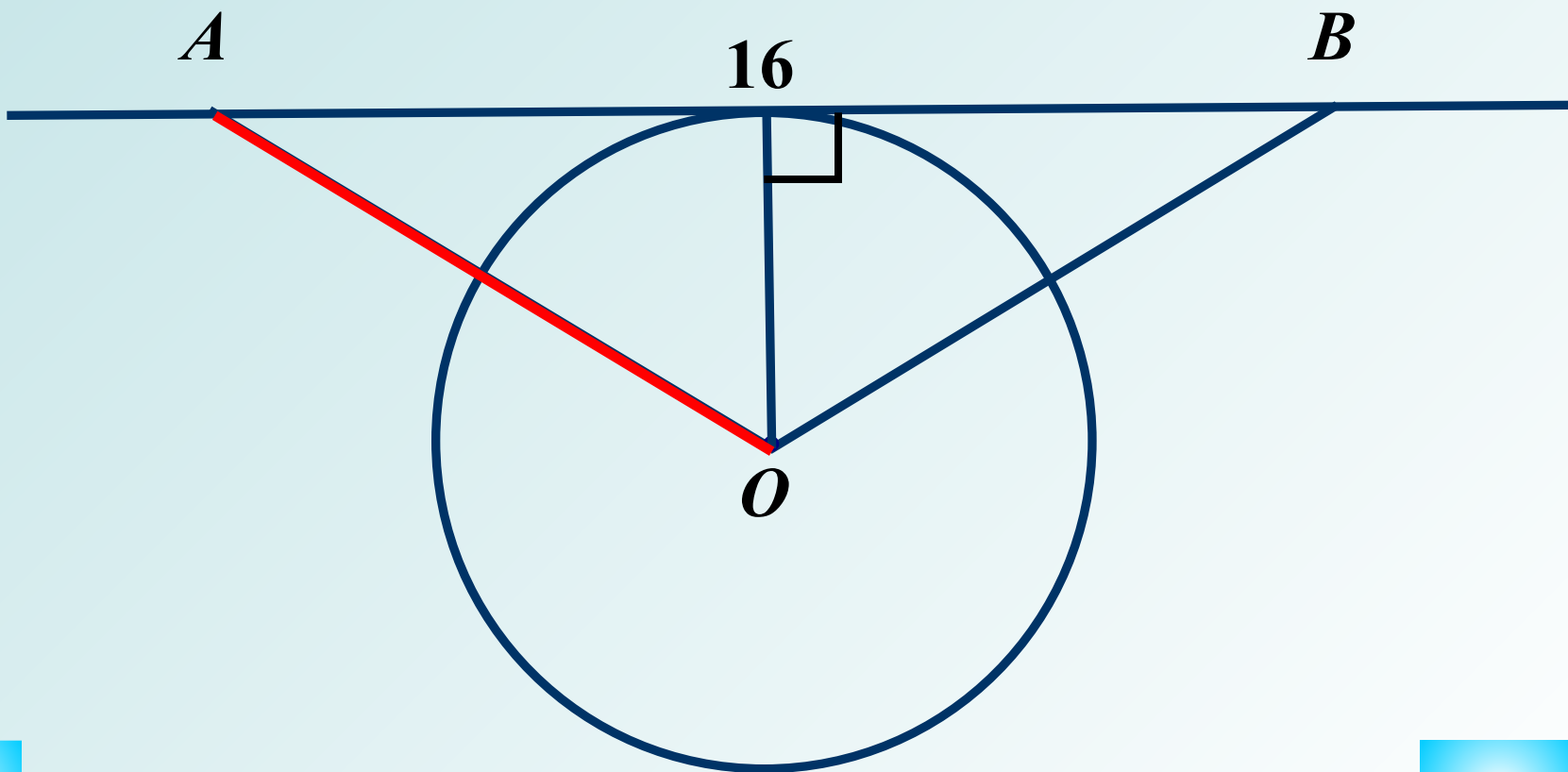
$\angle \hat{A}I\tilde{N}$



9.

**Дано:**  $\hat{I} \hat{e} \hat{d} \cdot (\hat{I}, R), R = 6$   
 $\hat{A} \hat{A} - \hat{e} \hat{a} \hat{n} \hat{a} \hat{o} \hat{a} \hat{e} \hat{i} \hat{i} \hat{a} \hat{y}, \hat{I} \hat{A} = \hat{I} \hat{A}$

**Найти:**  $O\hat{A}$



Доп.

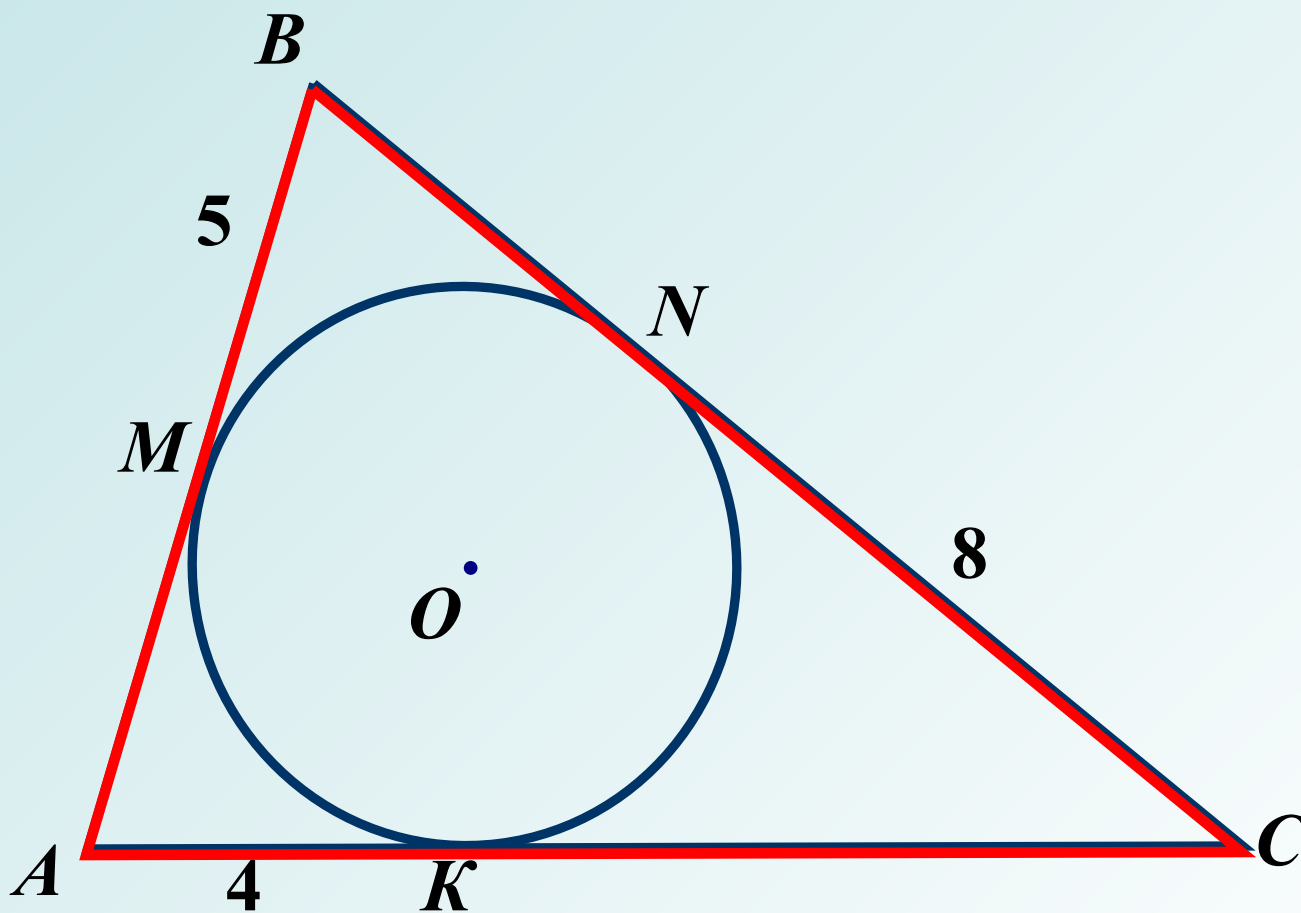
10.

**Дано:**

$I, N, K$  –  $o\hat{i}\div e\hat{e}$   $e\hat{a}\tilde{n}\hat{a}i\hat{e}\ddot{y}$

**Найти:**

$P_{ABC}$



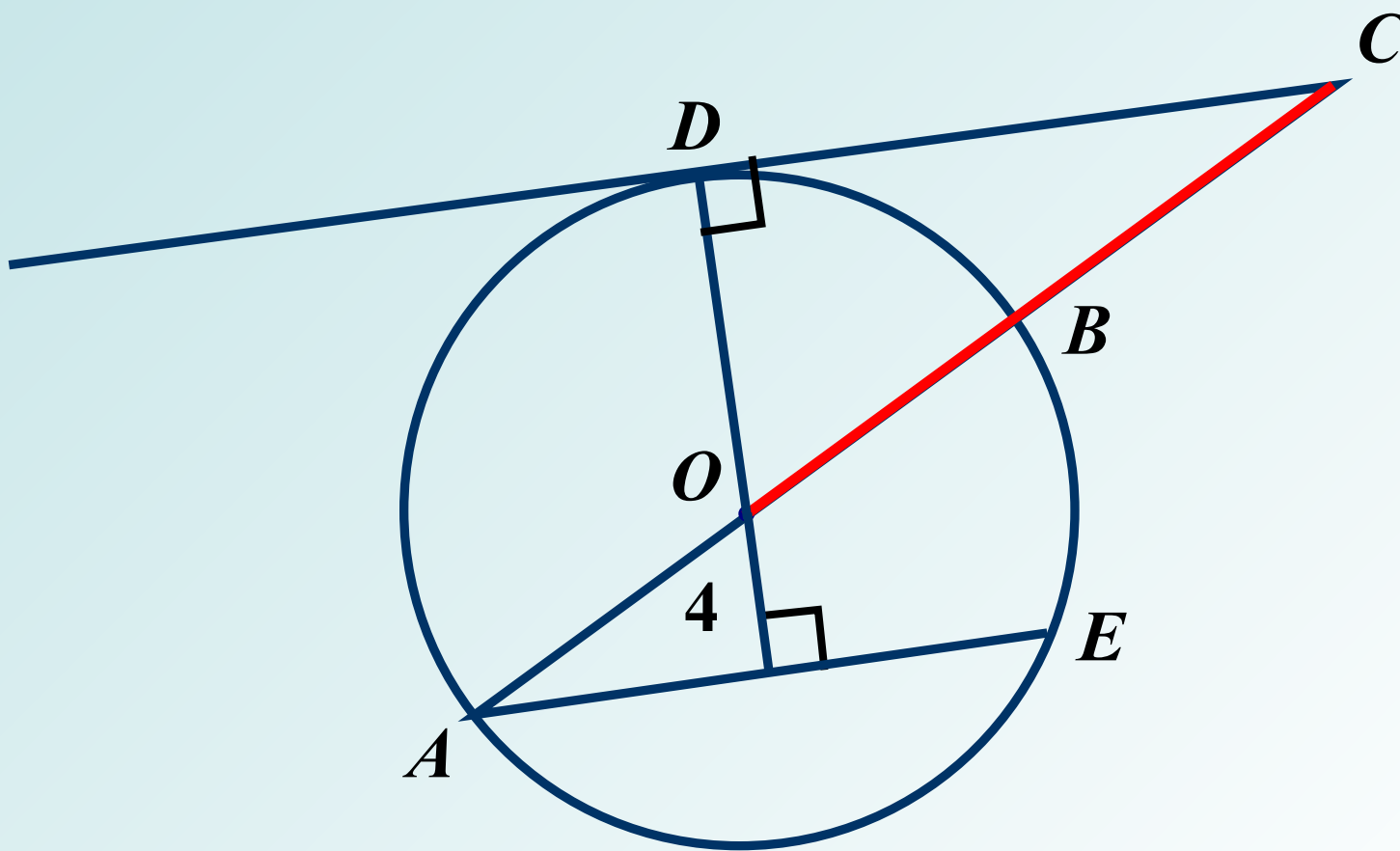
11.

Дано:

$\hat{I} \hat{e} \hat{o} (\hat{I}, \hat{I} \hat{A}), \hat{A} \hat{A} = 10$   
 $CD - \hat{e} \hat{a} \hat{n} \hat{a} \hat{o} \hat{a} \hat{e} \hat{i} \hat{i} \hat{a} \hat{y}, \hat{A} \hat{E} \parallel \hat{C} \hat{D}$

Найти:

$OC$



Доп.

12.

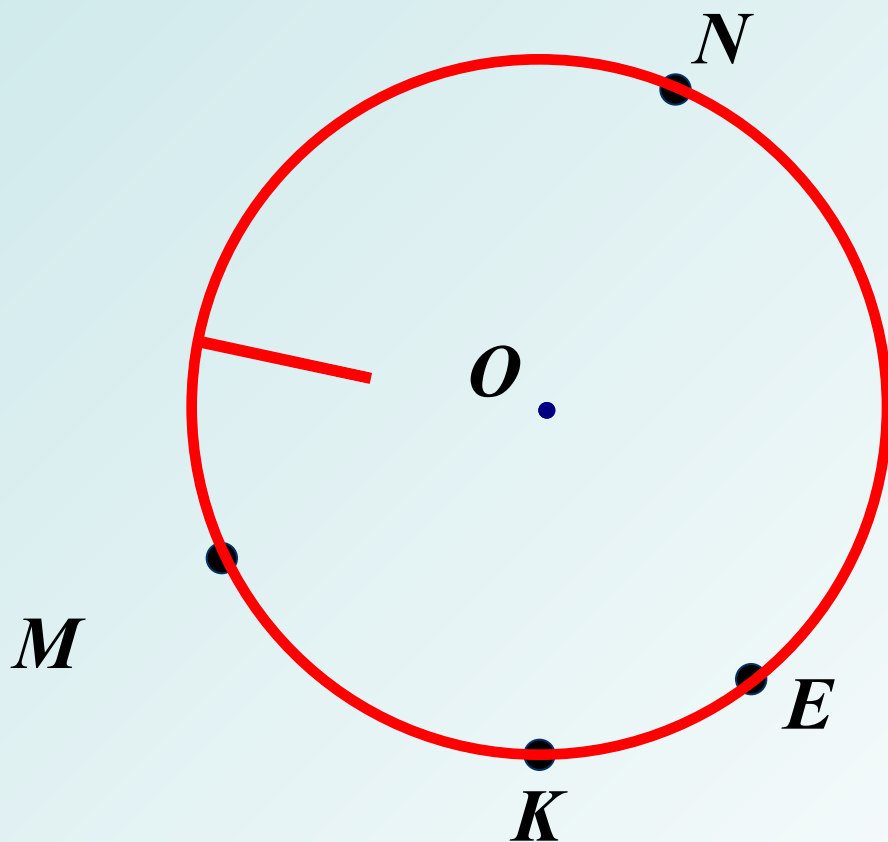
**Дано:**

$\hat{I} \hat{e} \hat{o} \cdot (\hat{I}, R)$

$\cup \hat{I} \hat{E} \hat{A} < \cup MNE \hat{a} 2 \hat{o} \hat{a} \hat{c} \hat{a}$

**Найти:**

$\cup \hat{I} \hat{E} \hat{A}$  ,  $\cup MNE$



13.

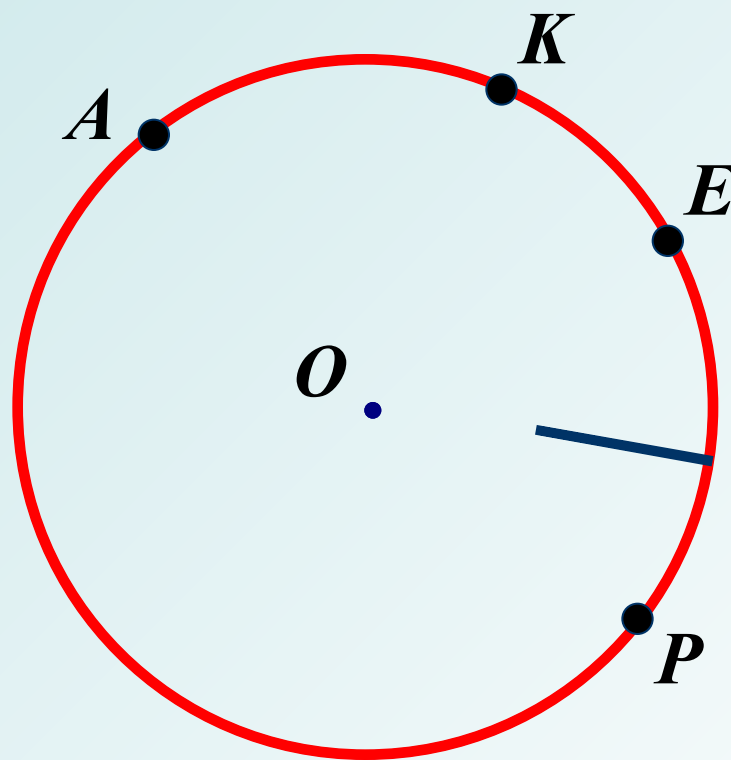
**Дано:**

$\hat{I} \hat{e} \hat{d} \cdot (\hat{I}, R)$

$\cup \hat{A} \hat{E} \hat{A} < \cup \hat{A} \hat{D} \hat{E} \text{ íà } 140^{\circ}$

**Найти:**

$\cup \hat{A} \hat{D} \hat{E}$



14.

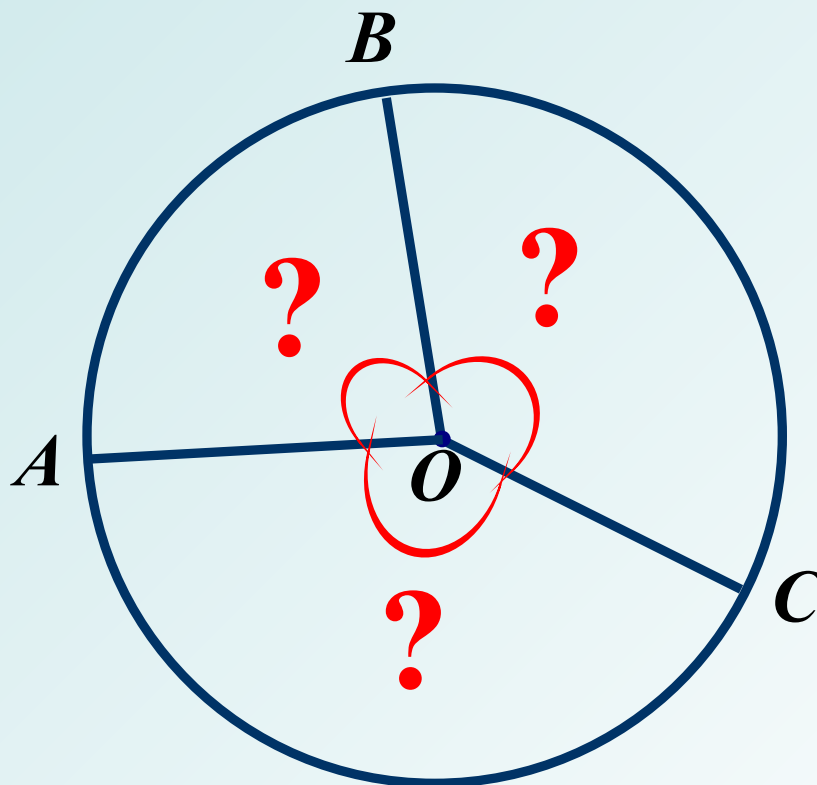
**Дано:**

$\hat{I} \hat{e} \hat{o} . (\hat{I} , R)$

$$\cup \hat{A} \hat{A} : \cup \hat{A} \hat{N} \tilde{N} : \cup \hat{A} \hat{N} \tilde{N} = 2 : 3 : 4$$

**Найти:**

$$\angle \hat{A} \hat{I} \hat{A} , \angle \hat{A} \hat{I} \hat{N} \tilde{N} , \angle \hat{A} \hat{I} \hat{N} \tilde{N}$$





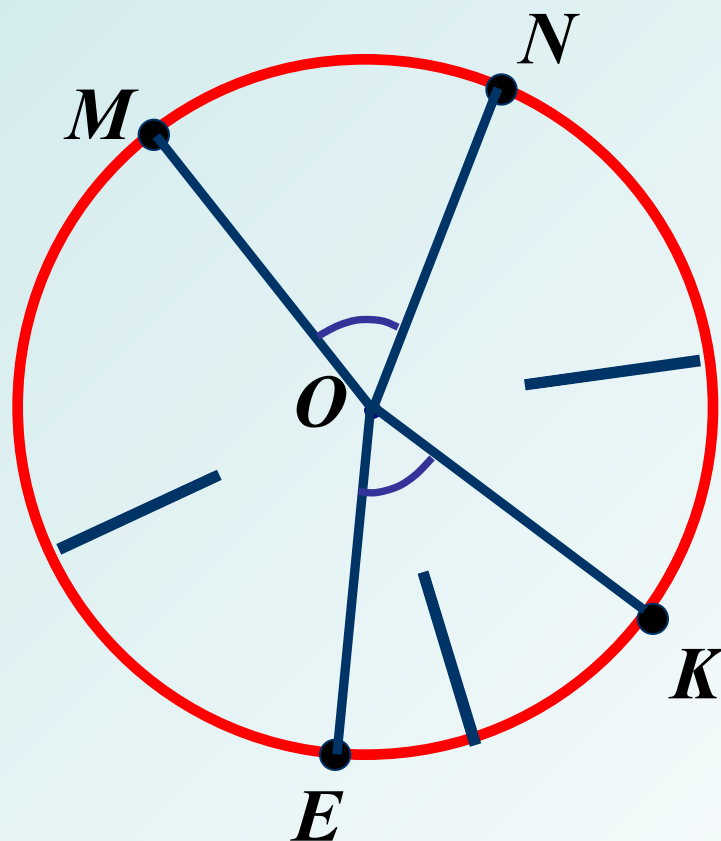
15.

Дано:  $\hat{I}e\delta$   $(\hat{I}, R)$

$$\angle \hat{I} \hat{I} N : \angle \hat{N} \hat{I} K : \angle \hat{M} \hat{I} E = 3 : 4 : 5$$

Найти:

$$\cup \hat{I} A, \cup NK, \cup KE$$

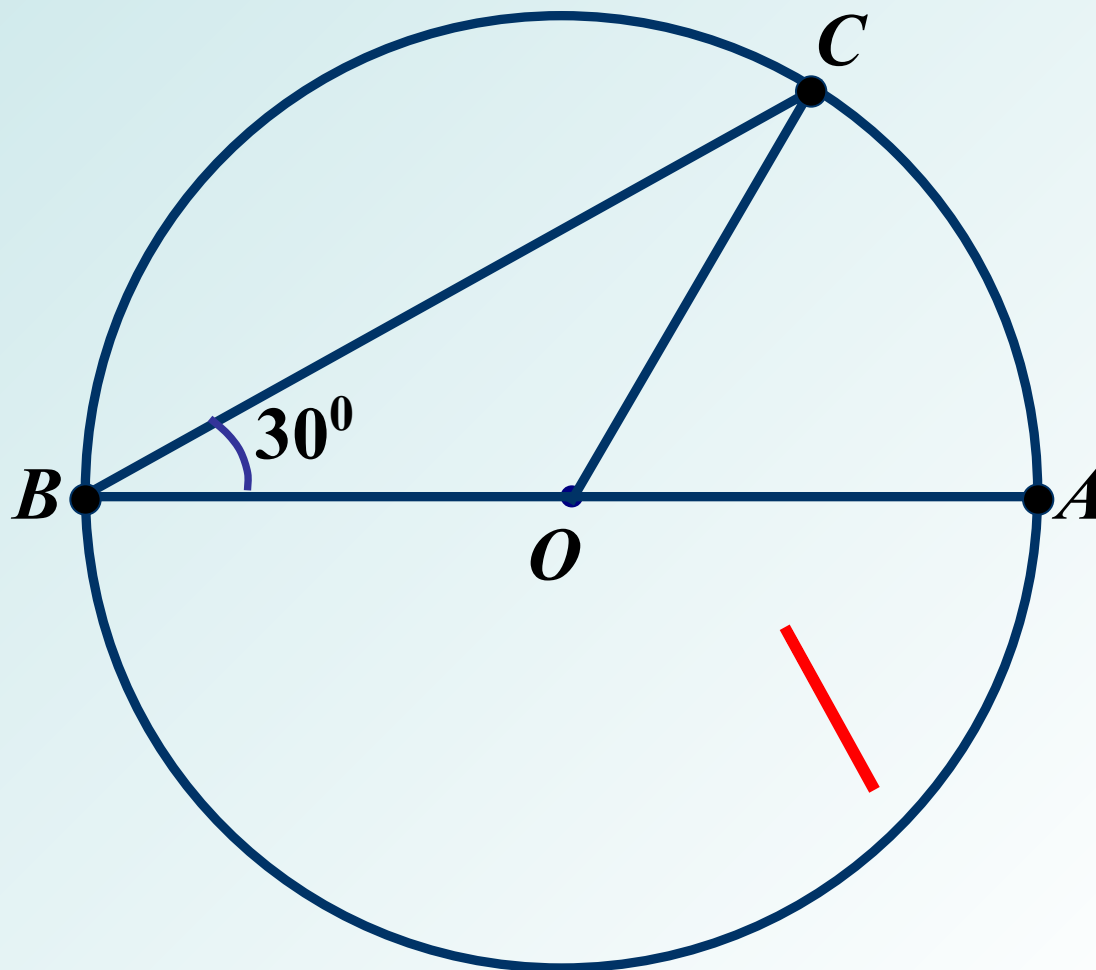


16.

Дано:  $\hat{I} \hat{e} \hat{o} . (\hat{I} , R)$

Найти:

$\cup \hat{A} \hat{N} \hat{N}$

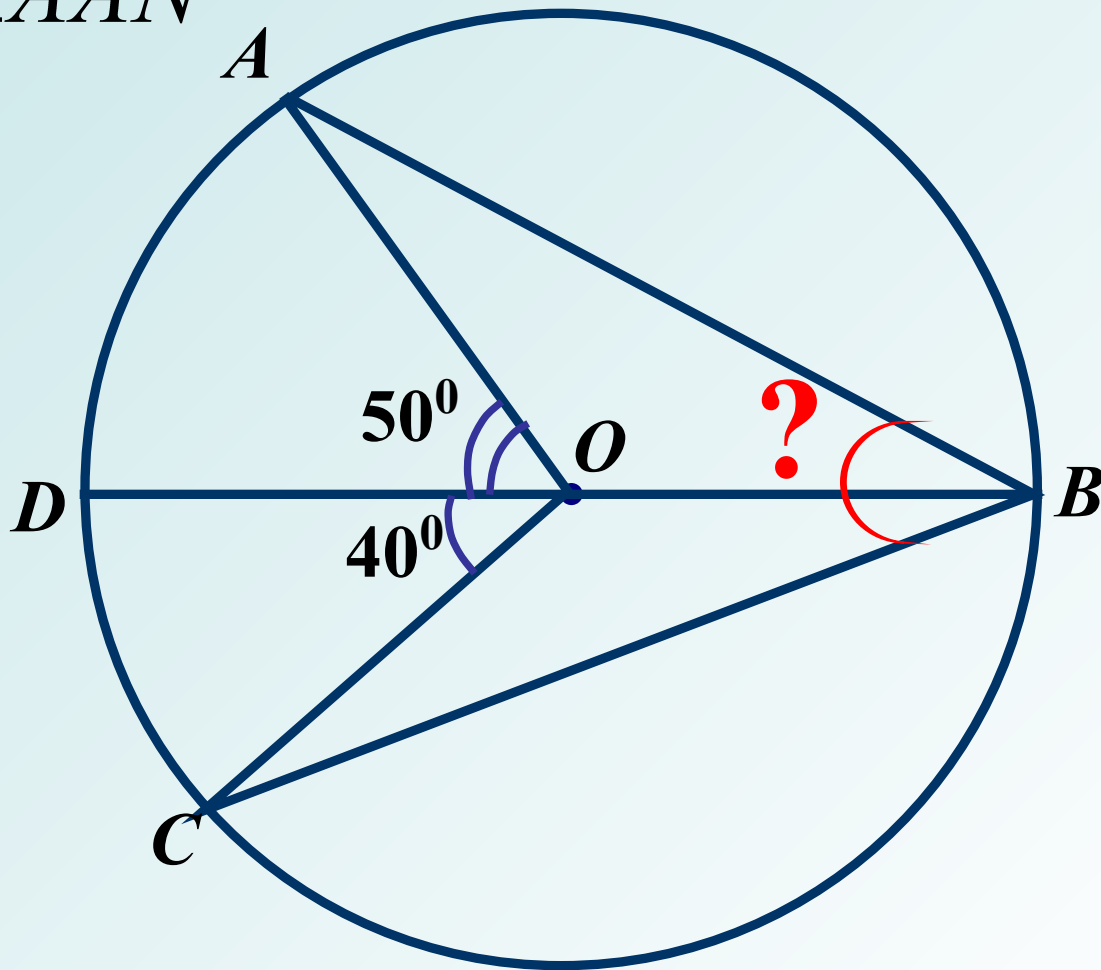


17.

Дано:  $\hat{I} \hat{e} \hat{o} . (\hat{I} , R)$

Найти:

$\angle A \hat{A} \tilde{N}$



18.

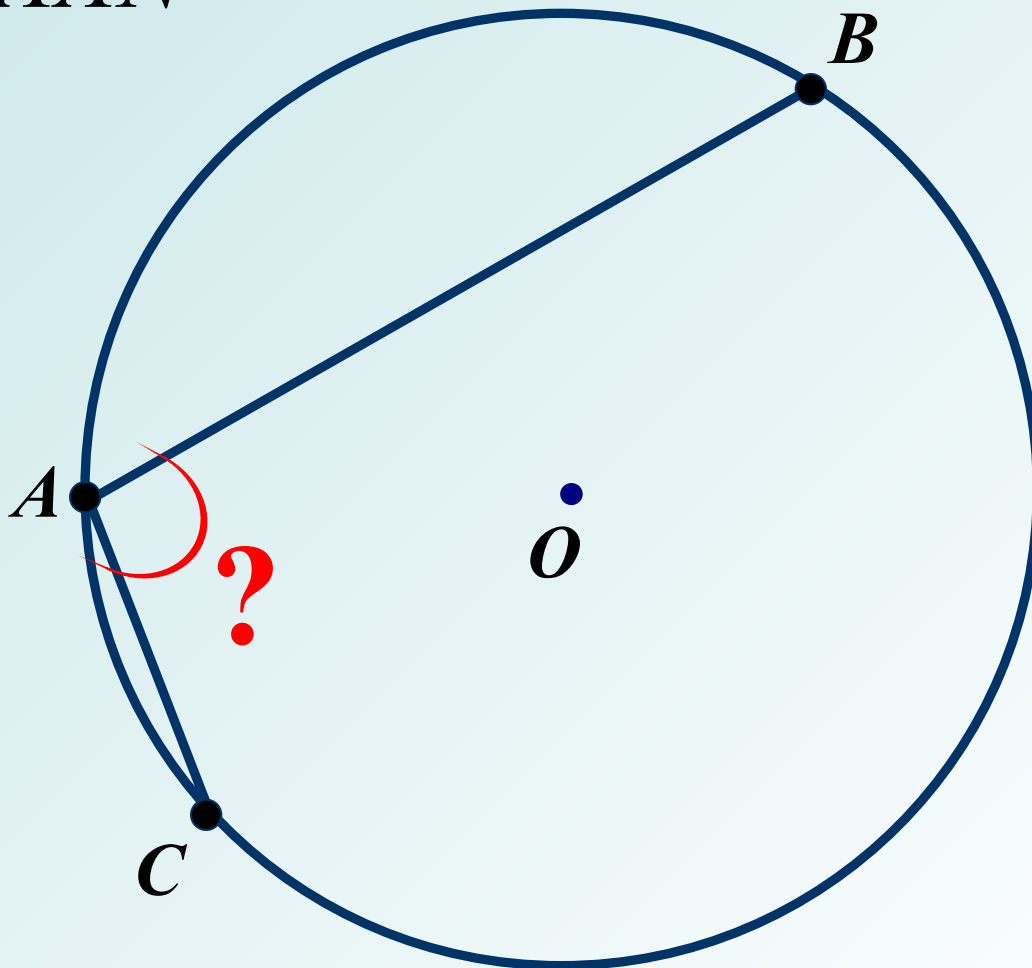
**Дано:**

$\hat{I} \hat{e} \hat{o} \cdot (\hat{I}, R)$

$\cup \hat{A} \hat{N} = 43^\circ, \cup \hat{A} \hat{A} = 115^\circ$

**Найти:**

$\angle \hat{A} \hat{A} \hat{N}$



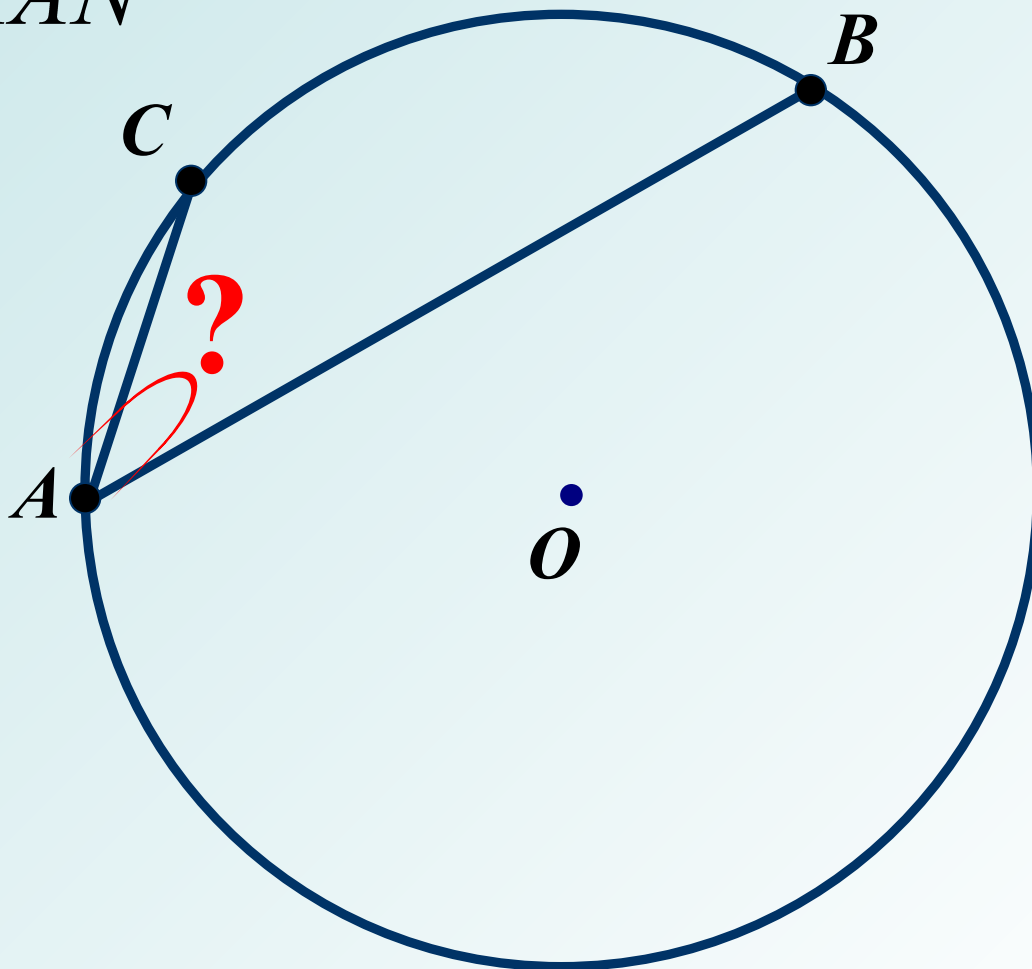
19.

**Дано:**

$$\hat{I} \hat{e} \hat{o} \cdot (\hat{I}, R) \\ \cup \hat{A} \hat{N} \tilde{=} = 43^{\circ}, \cup \hat{A} \hat{A} = 115^{\circ}$$

**Найти:**

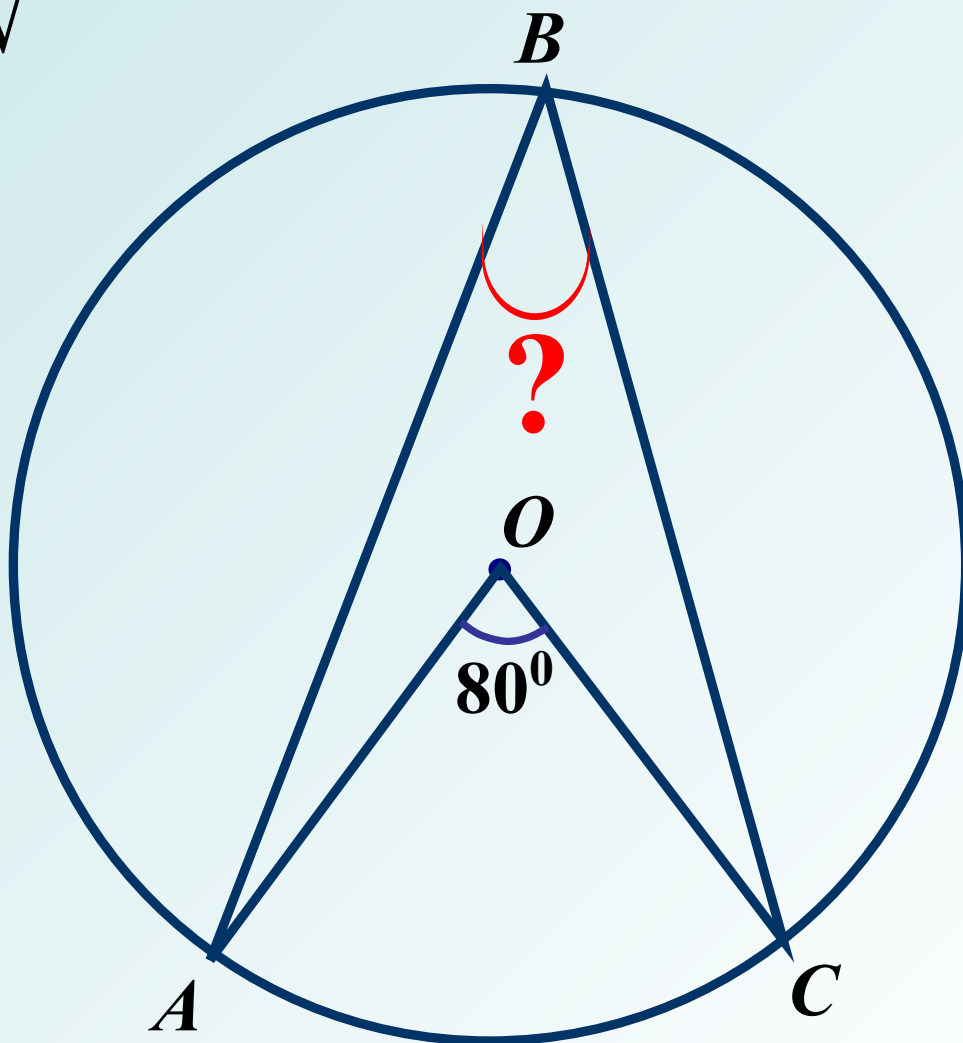
$$\angle \hat{A} \hat{A} \hat{N} \tilde{}$$



20.

Дано:  $\hat{I} \hat{e} \delta . (\hat{I} , R)$

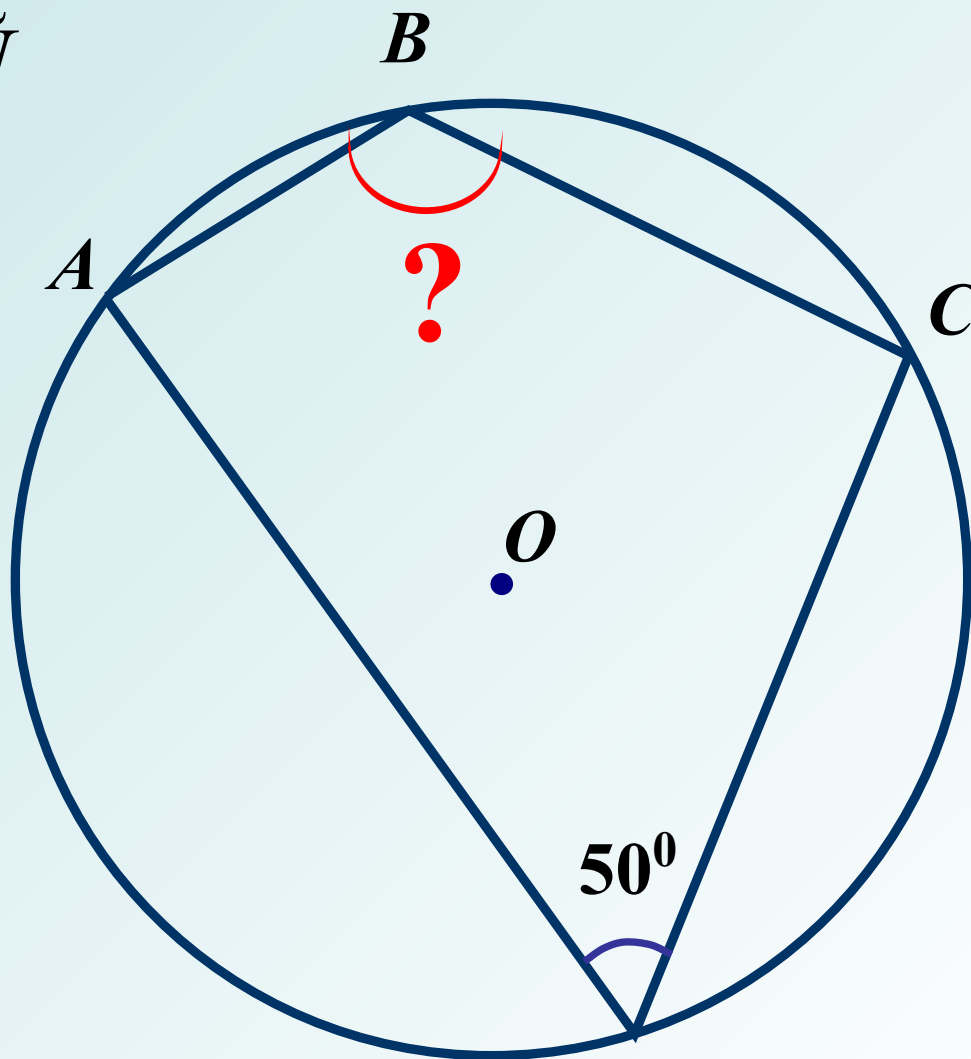
Найти:  $\angle A \hat{A} \tilde{N}$



21.

Дано:  $\hat{I} \hat{e} \hat{o} . (\hat{I} , R)$

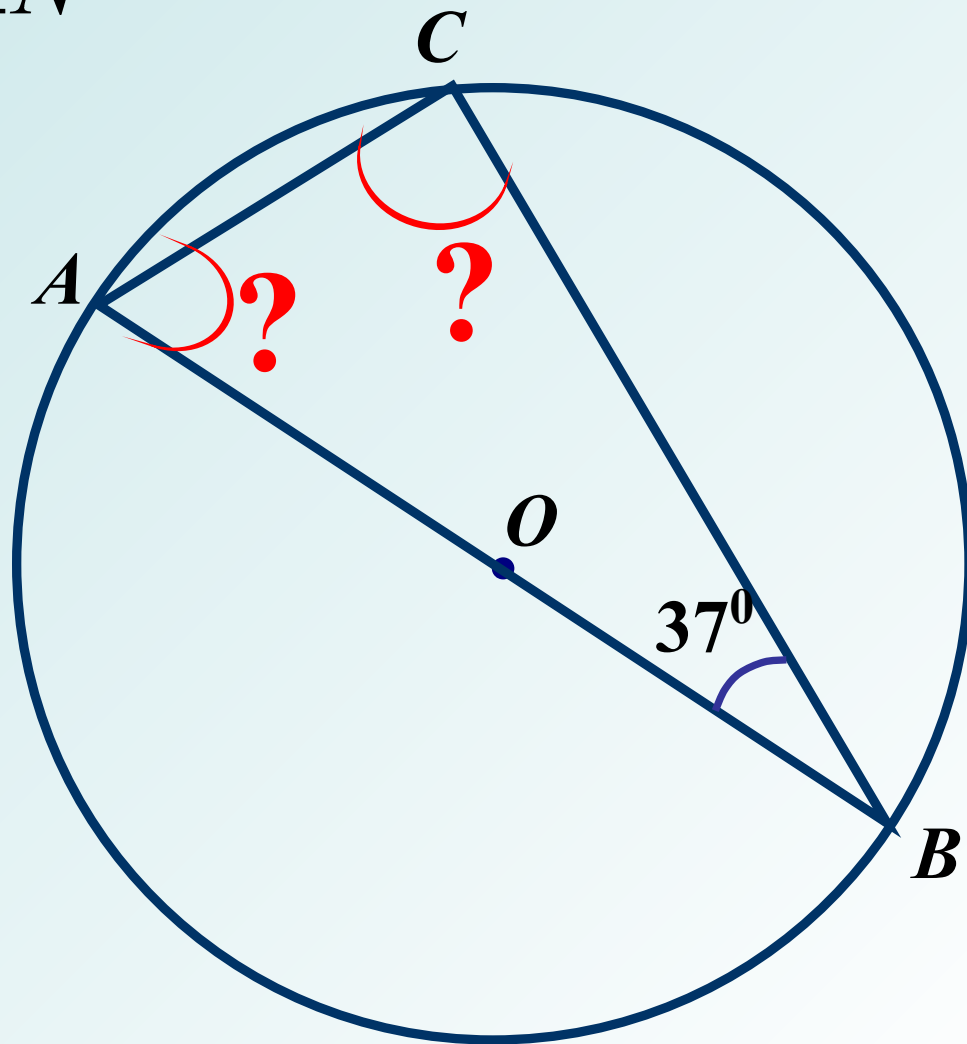
Найти:  $\angle A \hat{A} \tilde{N}$



22.

Дано:  $\hat{I}\hat{e}\hat{\delta} .(\hat{I} , R)$

Найти:  $\angle\hat{A}, \angle\hat{N}$

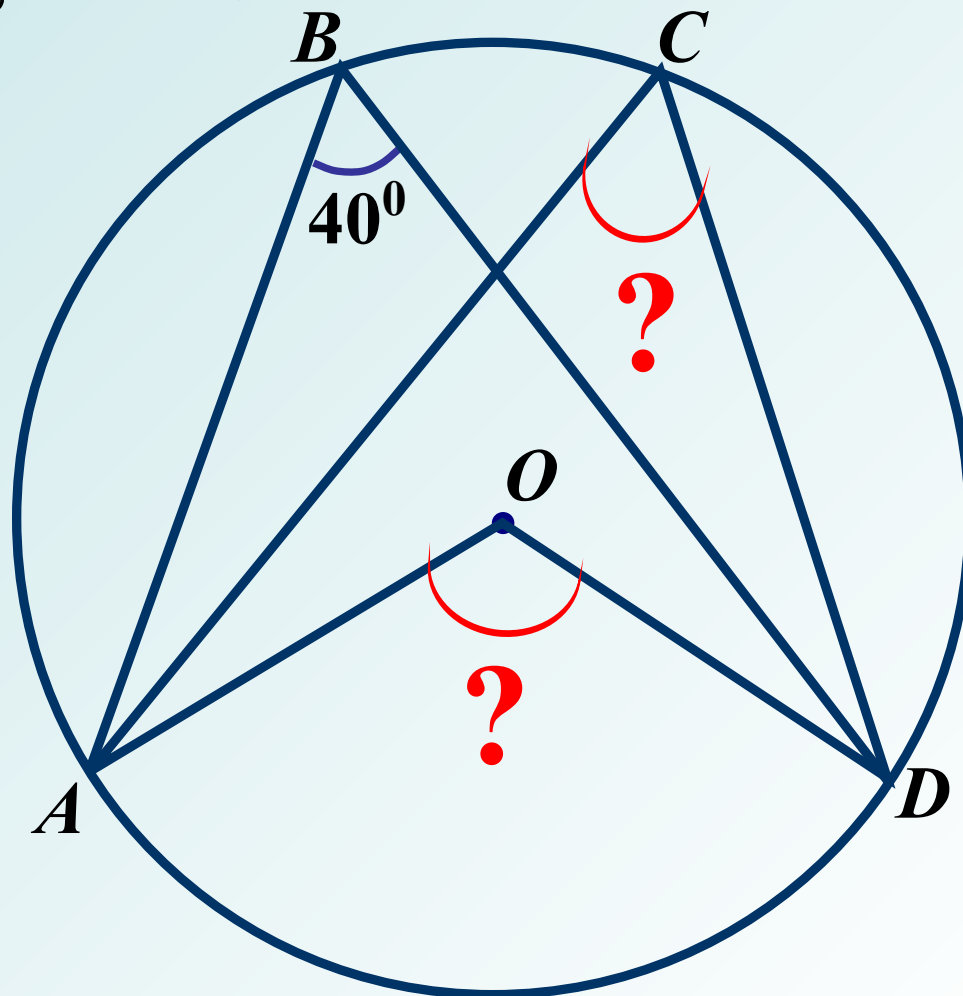




23.

Дано:  $\hat{I}\hat{e}\hat{\delta} . (\hat{I} , R)$

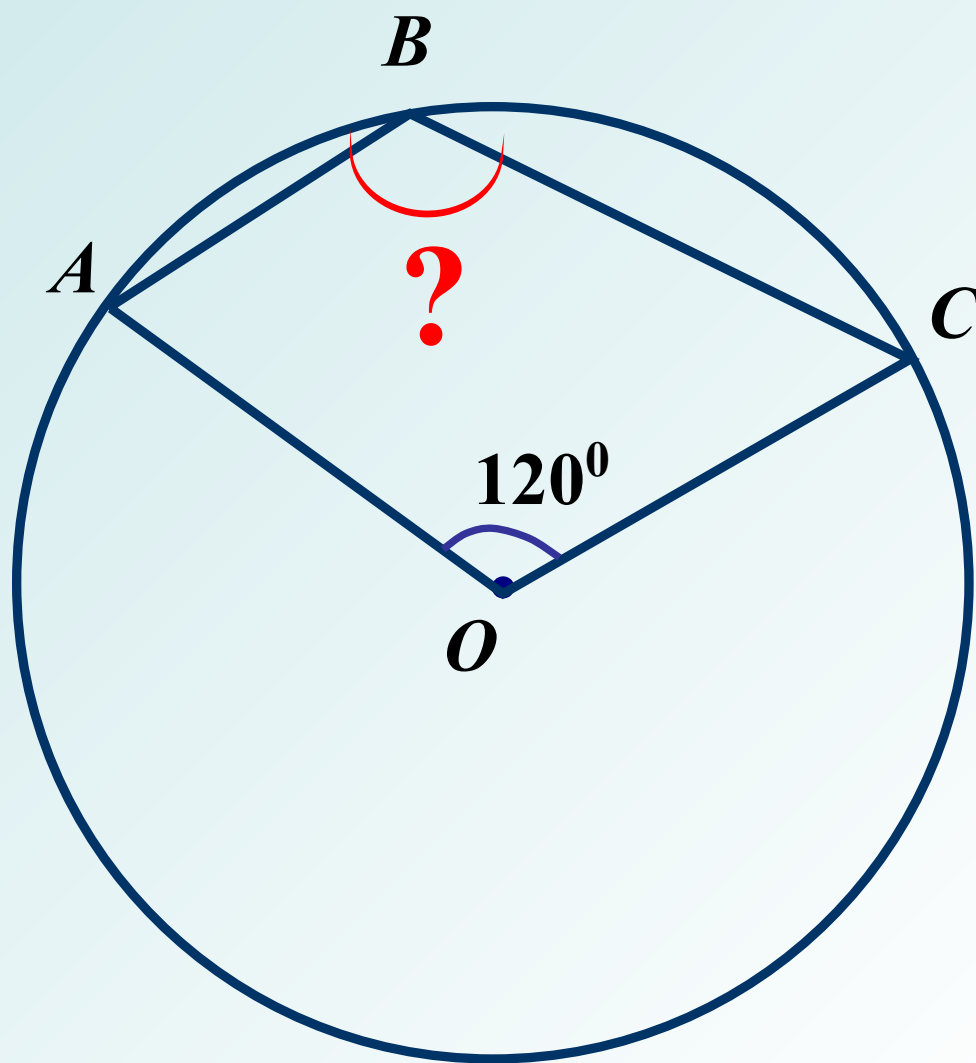
Найти:  $\angle AOD, \angle A\tilde{N}D$



24.

Дано:  $\hat{I} \hat{e} \delta . (\hat{I} , R)$

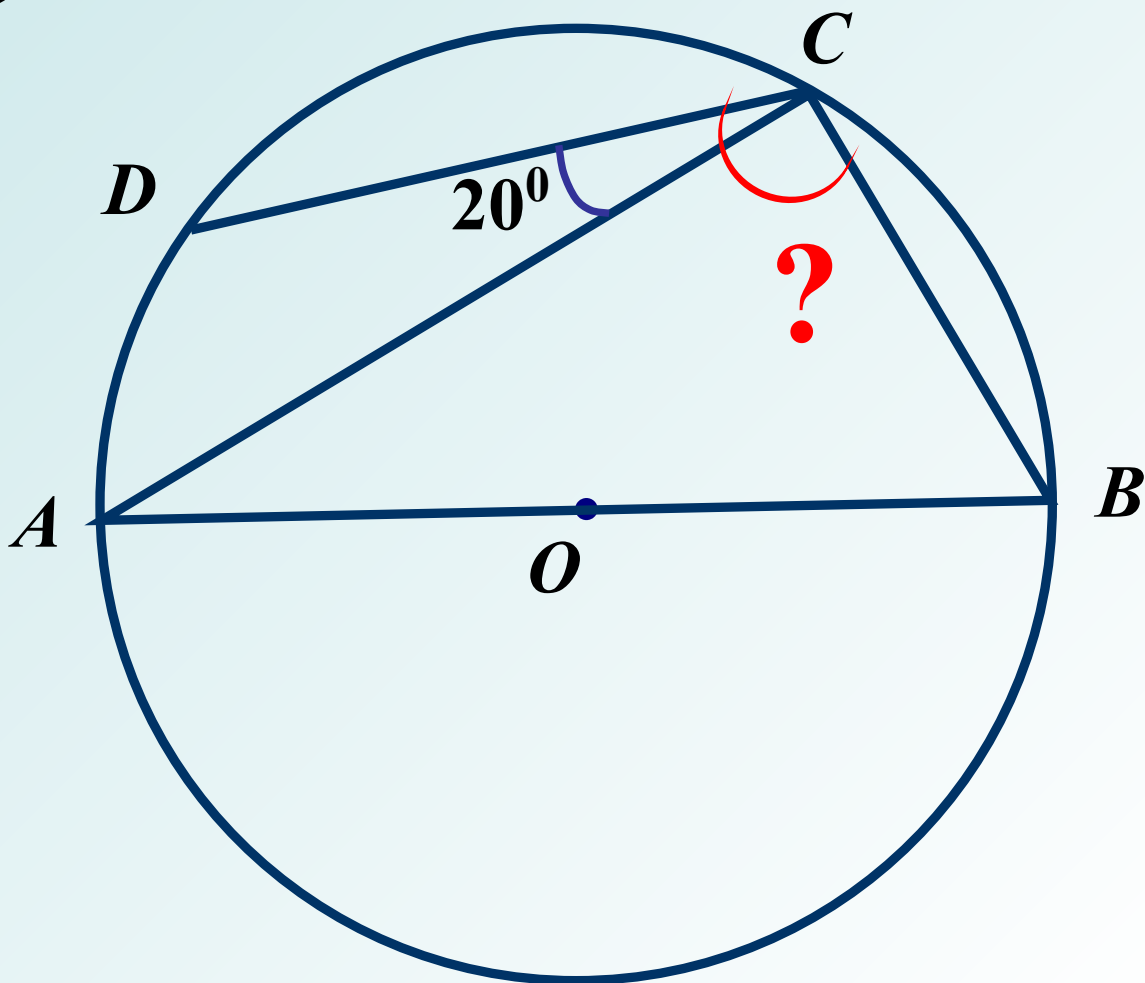
Найти:  $\angle A \hat{A} \tilde{N}$



25.

Дано:  $\hat{I} \hat{e} \delta . (\hat{I} , R)$

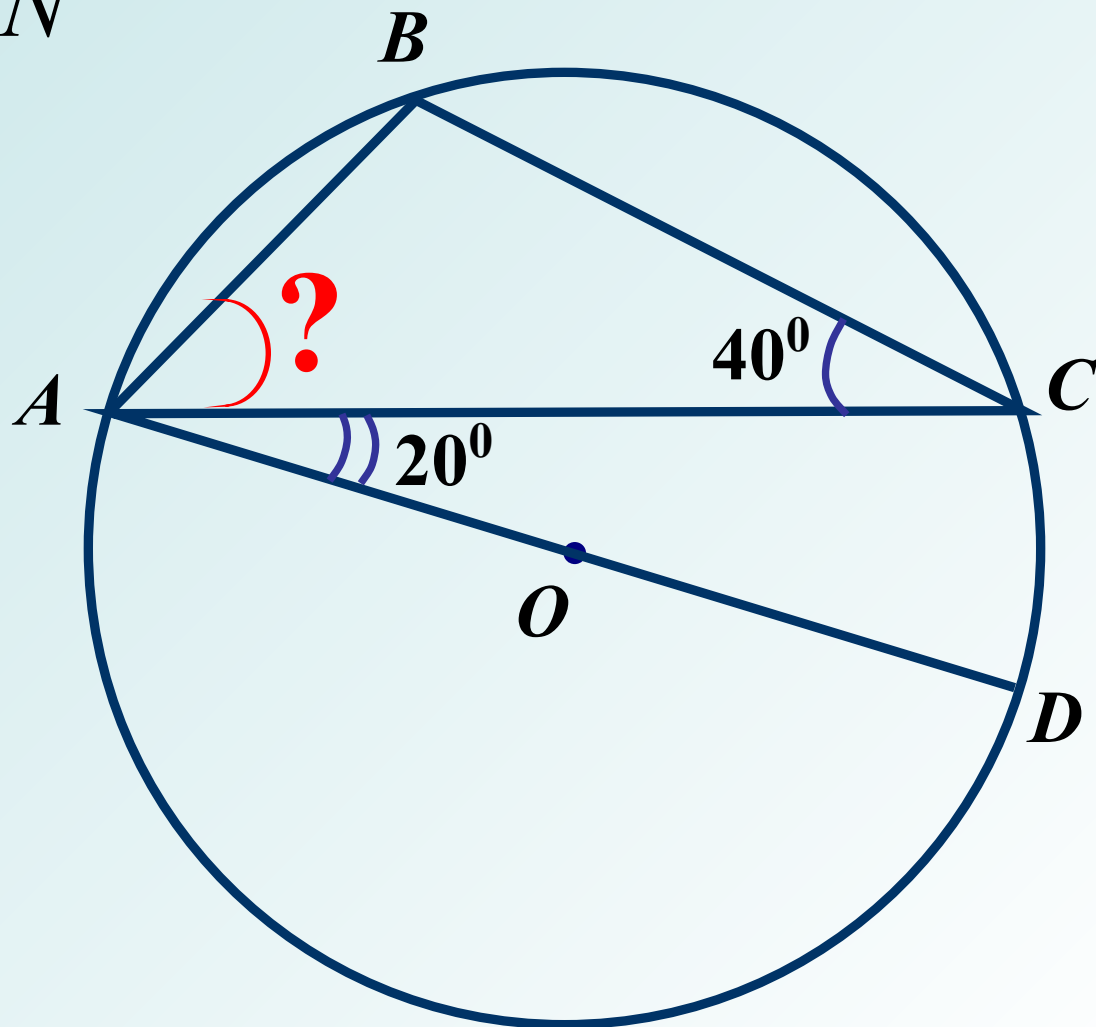
Найти:  $\angle \hat{A} \hat{N} \hat{D}$



26.

Дано:  $\hat{I}\hat{e}\hat{\delta} .(\hat{I} , R)$

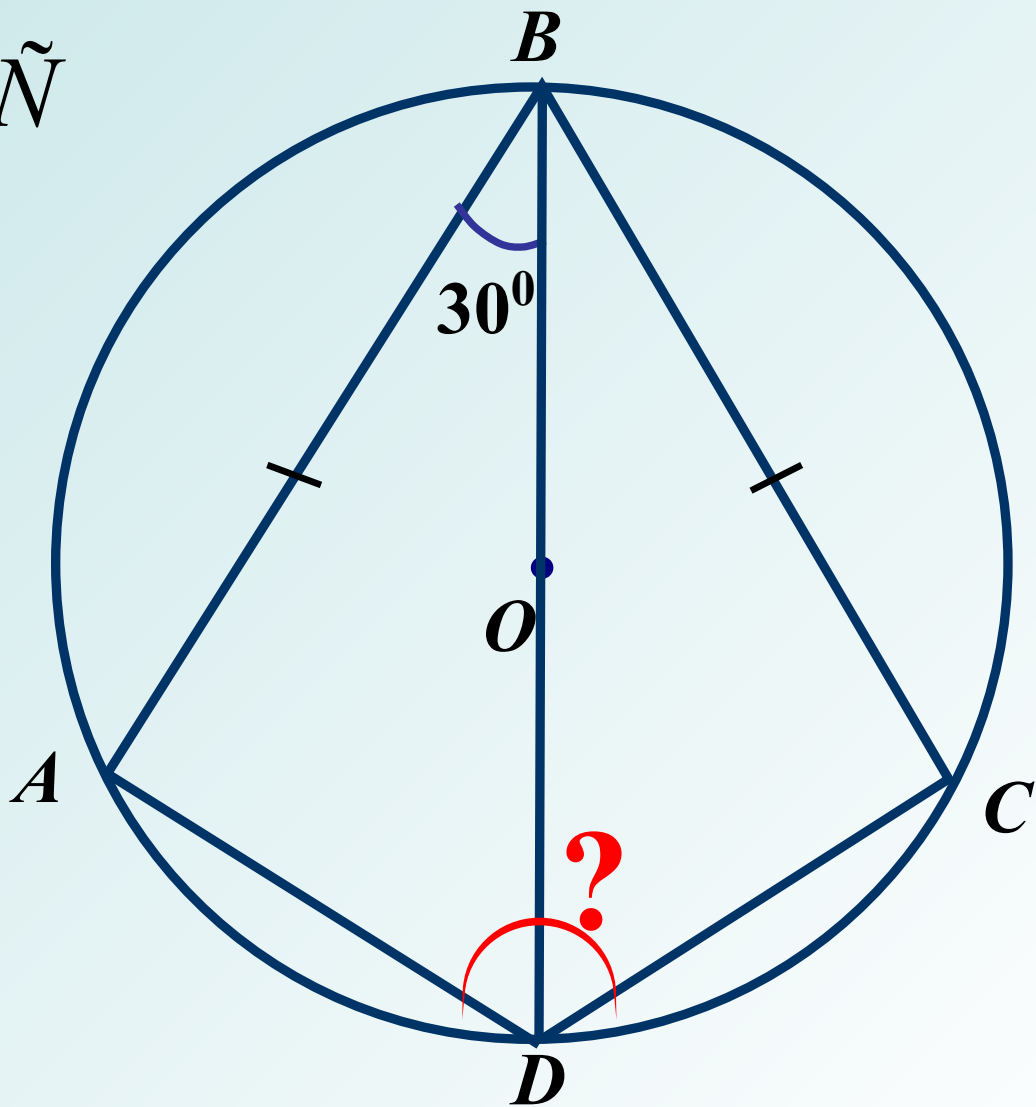
Найти:  $\angle \hat{A}A\hat{N}$



27.

Дано:  $\hat{I} \hat{e} \hat{d} . (I, R)$

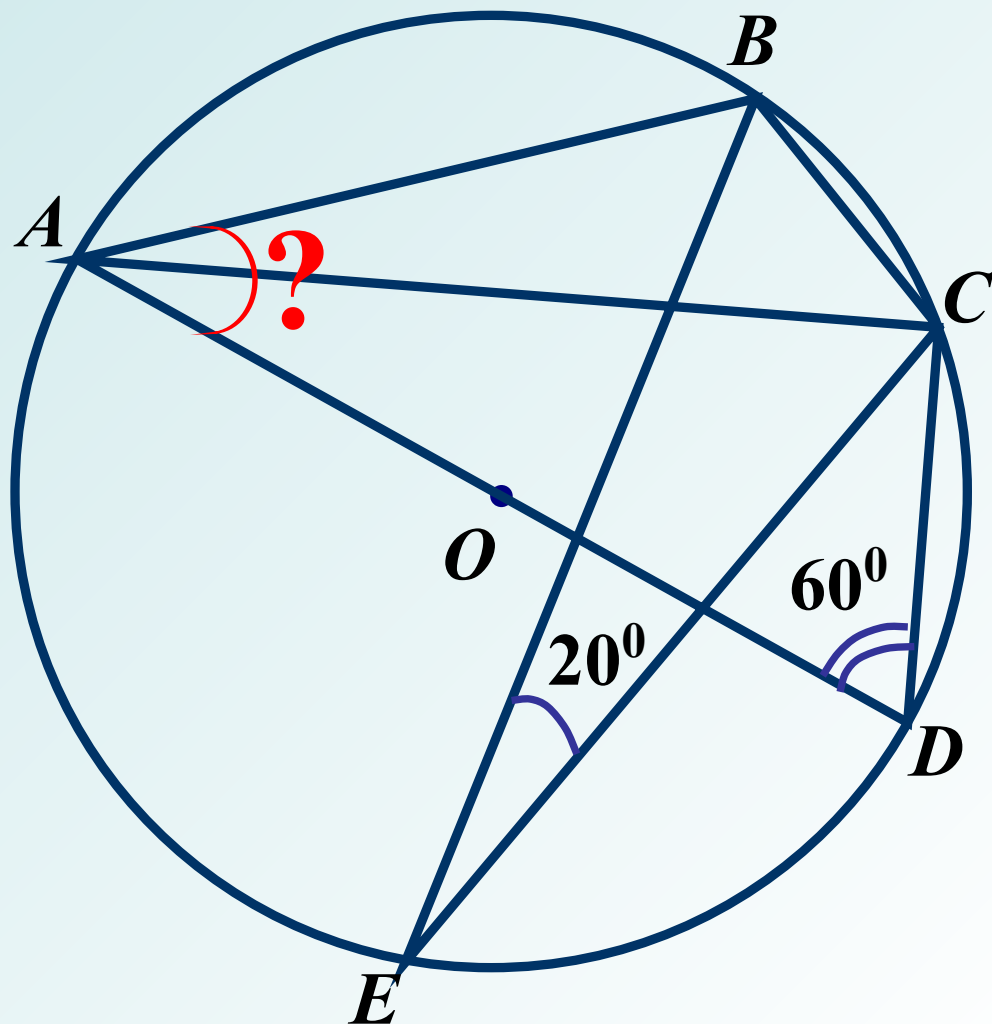
Найти:  $\angle AD\tilde{N}$



28.

Дано:  $\hat{I} \hat{e} \hat{D} . (I, R)$

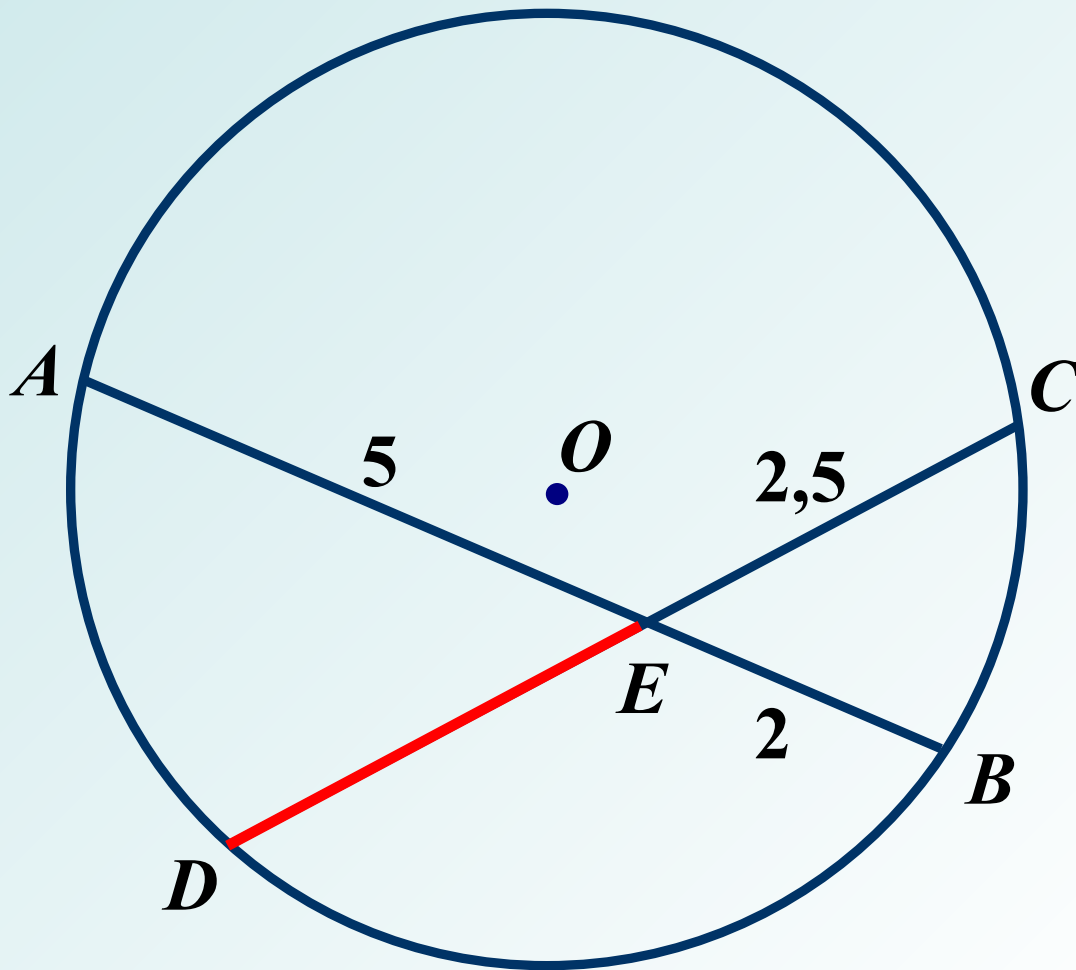
Найти:  $\angle BAD$



29.

Дано:  $\hat{I} \hat{e} \delta . ( \hat{I} , R )$

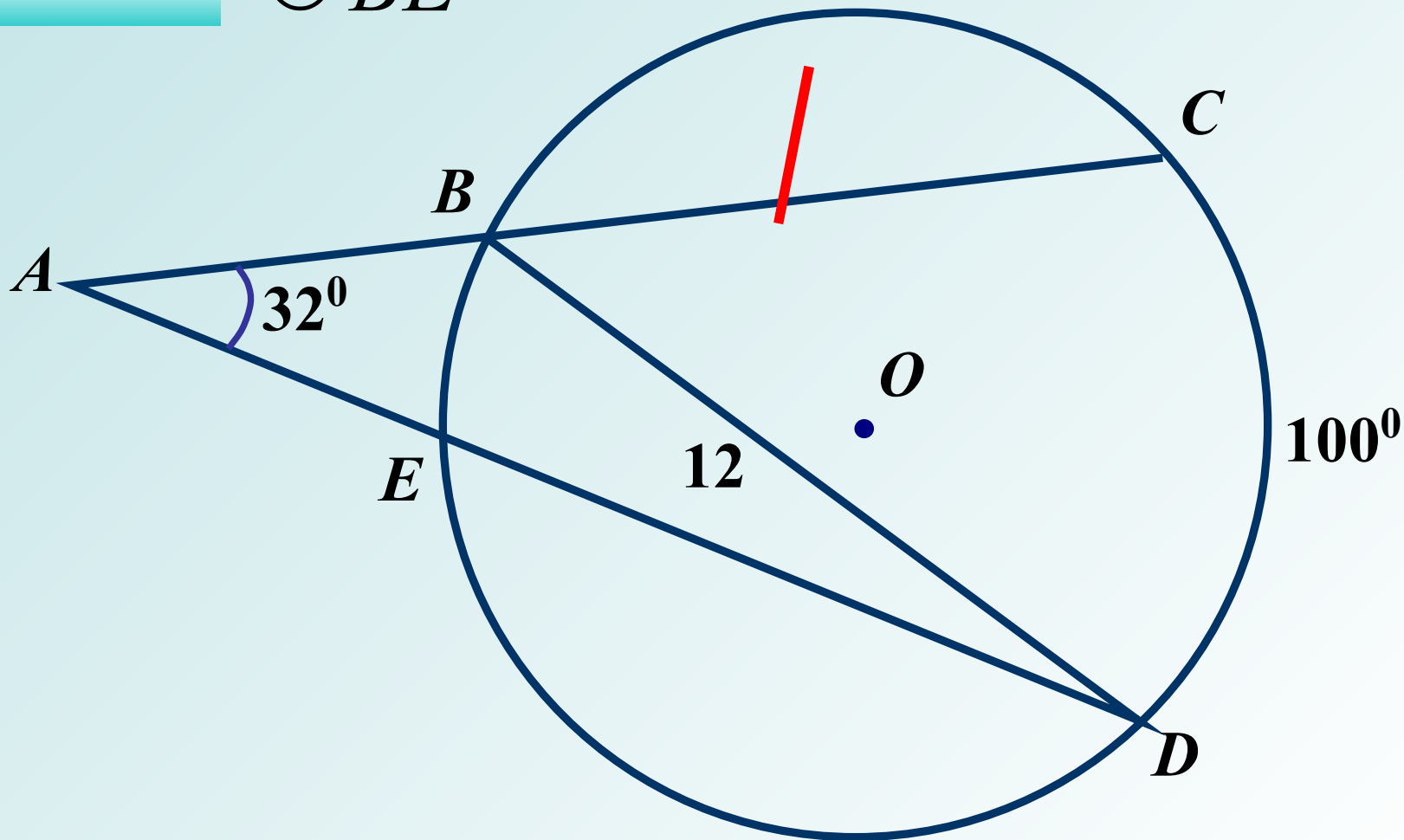
Найти:  $DE$



30.

Дано:  $\hat{I} \hat{e} \delta . (\hat{I} , R), \cup CD = 100^{\circ}$

Найти:  $\cup BE$

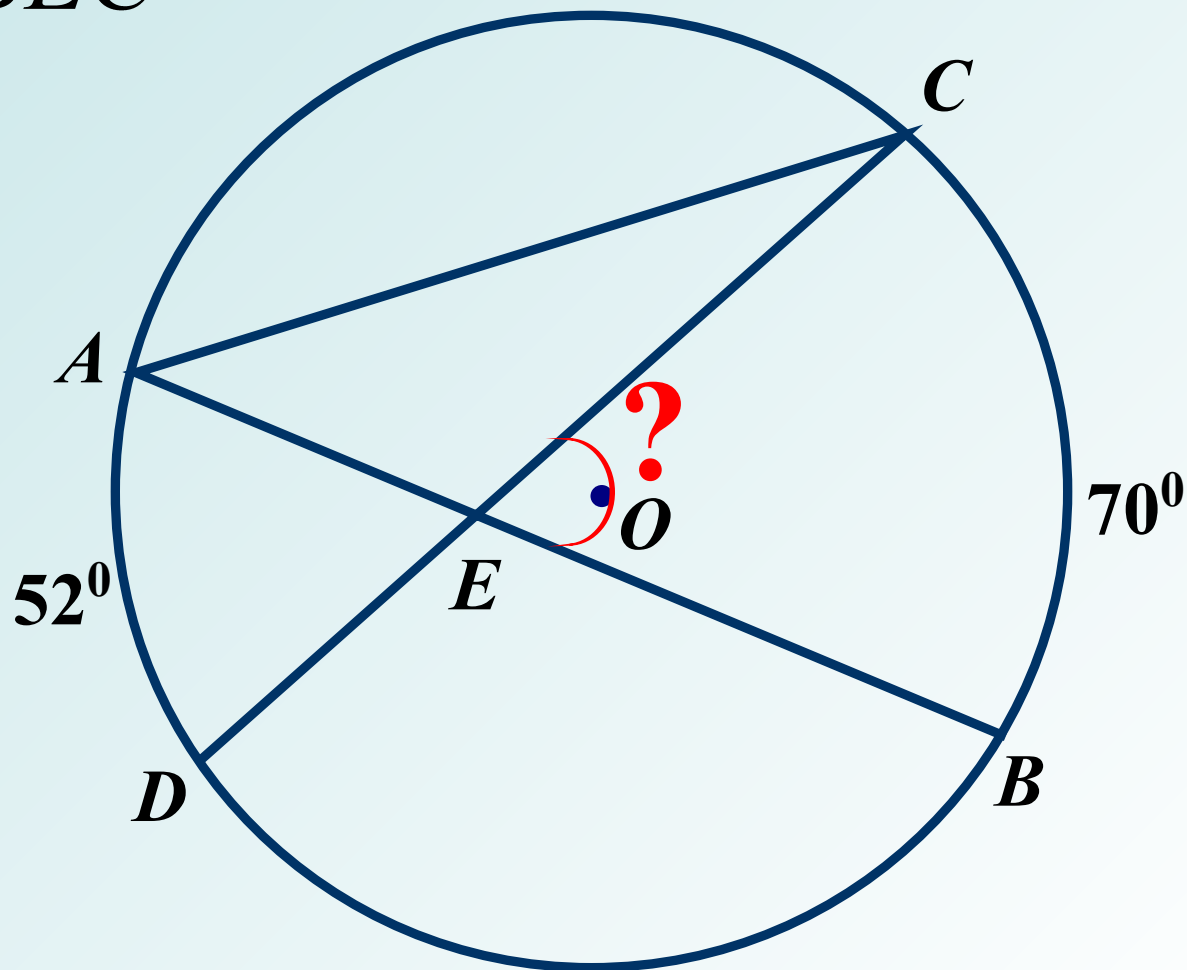




31.

Дано:  $\hat{I}\hat{e}\hat{D} . (\hat{I} , R)$

Найти:  $\angle BEC$



32.

Дано:  $\hat{I}\hat{e}\hat{\delta} . (\hat{I} , R)$

Найти:  $\angle A, \angle C, \angle AOC$

