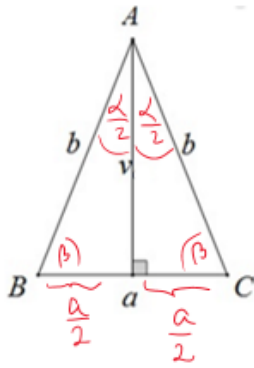


7.6. PRIMJENE U PLANIMETRIJI - jednakokračan trokut

JEDNAKOKRAČAN TROKUT

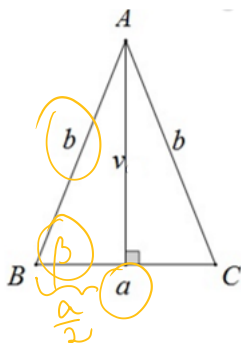


-visina na osnovicu jednakokračnog trokuta praspolavlja osnovicu i kut nasuprot nje

$$\alpha + 2\beta = 180^\circ$$

Primjer: Izračunajmo ostale elemente jednakokračnog trokuta ako je:

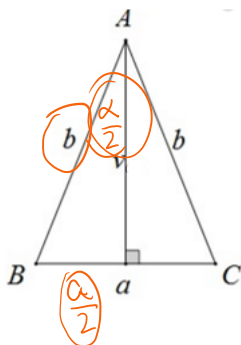
a) $a = 3\text{cm}, \beta = 73^\circ 32'$



$$\alpha = 180^\circ - 2\beta = 90^\circ - 73^\circ 30' = 33^\circ$$

$$\cos\beta = \frac{\frac{a}{2}}{b} = \frac{a}{2b} \Rightarrow b = \frac{a}{2\cos\beta} = 10.58\text{ cm}$$

b) $b = 4\text{cm}, \alpha = 100^\circ$



$$\beta = 90^\circ - \frac{\alpha}{2} = 90^\circ - 50^\circ = 40^\circ$$

$$\sin\frac{\alpha}{2} = \frac{\frac{a}{2}}{b} = \frac{a}{2b} \Rightarrow a = 2b\sin\frac{\alpha}{2} = 6.13\text{ cm}$$