

**BAREM DE CORECTARE- CLASA a VIII-a**  
**Concursul Interjudețean Interdisciplinar**  
**FII CAMPION!**  
 Ediția a XI-a, 22 aprilie 2023  
**Clasa a VIII-a**  
**MATEMATICĂ**



**Subiectul I (6x 5puncte = 30 puncte)**

1	2	3	4	5	6
c.6	b. $f(0)=-3$	d. 2021	a. $\sqrt{10}$	b. 24	b.( 9, 10)

**Subiectul II (15 puncte)**

7. a)  $SP \perp (ABC)$   
 $BC \perp AS$   
 $BC \perp SP \Rightarrow BC \perp AP$   
 $AB \perp SC$   
 $AB \perp SP \Rightarrow AB \perp PC \Rightarrow P$  ortocentru.....5p

b)  $SC \perp AB$ , H – ort.cf (a)

$$SC \perp (SAB) \Rightarrow SC \perp SQ \Rightarrow SQ = \frac{ab}{\sqrt{a^2 + b^2}}$$

$$\square CQS - \square dr. \Rightarrow CQ^2 = SQ^2 + SC^2 = \frac{a^2 b^2}{a^2 + b^2} + c^2 = \frac{a^2 b^2 + a^2 c^2 + b^2 c^2}{a^2 + b^2}$$

$$S_{ABC}^2 = \frac{CQ^2 \cdot AB^2}{4} = \frac{1}{4} \cdot \frac{a^2 b^2 + a^2 c^2 + b^2 c^2}{a^2 + b^2} \cdot (a^2 + b^2) = \frac{a^2 b^2}{4} + \frac{a^2 c^2}{4} + \frac{b^2 c^2}{4} = S_{SAB}^2 + S_{SAC}^2 + S_{SBC}^2$$

.....10p