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**SYNOPSIS**

- 398 Mathematical Mayhem      *Shawn Godin*  
Solutions to Mayhem problems M507–M512 are presented.
- 403 The Contest Corner: No. 10      *Shawn Godin*
- 405 The Olympiad Corner: No. 308      *Nicolae Strungaru*
- 405      The Olympiad Corner Problems: OC106–OC110
- 406      The Olympiad Corner Solutions: OC46–OC50
- 412 Book Reviews      *Amar Sodhi*
- 412      *Heavenly Mathematics: The Forgotten Art of Spherical Trigonometry*  
by *Glen Van Brummelen*
- 413      *Mathematical Excursions to the World's Great Buildings*  
by *Alexander J. Hahn*
- 415 Problem Solver's Toolkit: No. 3      *Murray S. Klamkin*
- This is an article that previously appeared in *Crux* [1984 : 139-140]. The article investigates some inequalities in a triangle.
- 418 Recurring *Crux* Configurations 9 :      *J. Chris Fisher*
- In this ninth and final column, problem editor J. Chris Fisher examines problems that have appeared in **Crux** with triangles that satisfy  $B = 90^\circ + C$ .

420 Problems: 3791–3800

This month’s “free sample” is:

**3793.** *Correction. Proposé par George Apostolopoulos, Messolonghi, Grèce.*

Soit  $a$ ,  $b$  et  $c$  trois nombres réels positifs tels que

$$\sqrt{a} + \sqrt{b} + \sqrt{c} = 1007\sqrt{2} .$$

Trouver la valeur minimale de l’expression

$$\sqrt{a+b} + \sqrt{b+c} + \sqrt{c+a} .$$

.....

**3793.** *Correction. Proposed by George Apostolopoulos, Messolonghi, Greece.*

Let  $a$ ,  $b$ , and  $c$  be positive real numbers such that

$$\sqrt{a} + \sqrt{b} + \sqrt{c} = 1007\sqrt{2} .$$

Find the minimum value of the expression

$$\sqrt{a+b} + \sqrt{b+c} + \sqrt{c+a} .$$

424 Solutions: 3691–3700

436 YEAR END FINALE

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