

Title: Area of reduced polygons

Author(s): Marek Lassak

A convex body R of Euclidean space  $E^d$  is said to be *reduced* if every convex body  $P \subset R$  different from R has thickness smaller than the thickness  $\Delta(R)$  of R. We prove that the area of every reduced polygon R is smaller than  $\frac{1}{4}\pi \cdot \Delta^2(R)$  and that the factor  $\frac{1}{4}\pi$  cannot be lessened. We conjecture that the area of every planar reduced body is at most  $\frac{1}{4}\pi \cdot \Delta^2(R)$ .

## Address:

Marek Lassak University of Technology 85-796 Bydgoszcz Poland *E-mail:* lassak@mail.atr.bydgoszcz.pl