



**6th Croatian Conference on Geometry and Graphics
BAŠKA, 6–10 September 2026**

ORGANIZER:

Croatian Society for Geometry and Graphics

PROGRAM

PROGRAM COMMITTEE:

Ema Jurkin, Domen Kušar, Boris Odehnal, Jenő Szirmai

DONOR:

SAND d.o.o.

PATRONAGE:

International Society for Geometry and Graphics

Supported by the Ministry of Science, Education and Youth of the Republic of Croatia and the Foundation of Croatian Academy of Sciences and Arts.



SUNDAY, SEPTEMBER 6

17.00–19.00 Registration

19.00–21.00 DINNER

MONDAY, SEPTEMBER 7

7.00– 9.00 BREAKFAST

Morning session (Chair: I. Kodrnja)

9.00– 9.15 OPENING

9.15–10.00 Plenary lecture

Jenő Szirmai: *Classical Notions and Problems in Thurston Geometries of non-Constant Curvatures*

10.05–10.30 COFFEE BREAK

10.30–10.45 Judit Sajtos, Jenő Szirmai: *Lattice-like Packings and Coverings with Congruent Translation Balls and Cylinders in Sol*

10.50–11.05 Zlatko Erjavec: *On Translation Curves in $\text{Sol}_{m,n}^4$*

11.10–11.25 Ivana Filipan, Željka Milin Šipuš, Ljiljana Primorac Gajčić: *Involute and Evolute of Null Curve in 4-Dimensional Lorentz-Minkowski Space*

11.30–11.45 Géza Csima: *Generalized Apollonius Circles as Equioptic Curves of Circles in Constants Curvature*

12.00–13.00 LUNCH



Afternoon session (Chair: E. Jurkin)

- 15.00–15.15 Iva Kodrnja, Mia Maras: *Near-Equilateral Recurrence of Rotating Points*
- 15.20–15.35 Mandi Orlić Bachler: *Axial Extremal Configurations for Bicentric Pentagons*
- 15.40–15.55 Gunter Weiss: *Three Points and their Place of Action – Still a Matter of Attraction*
- 16.00–16.30 COFFEE BREAK
- 16.30–16.45 Hellmuth Stachel: *On Congruent Tetrahedra with Crossing Edges*
- 16.50–17.05 Lukas Rose, Boris Odehnal: *Ruled Surfaces of Cube Gears*
- 17.10–17.25 Daniela Velichová: *Conoids in 4D*
- 19.00–21.00 DINNER

TUESDAY, SEPTEMBER 8

- 7.00– 8.00 BREAKFAST
- 8.00–19.00 EXCURSION – Krk, Vrbnik, Košljun
- 19.00–21.00 DINNER



WEDNESDAY, SEPTEMBER 9

7.00– 9.00 BREAKFAST

Morning session (Chair: M. Šimić Horvath)

9.00– 9.45 Plenary lecture
Michal Zamboj: *From Roots to Imaging Imaginary*

9.50–10.15 COFFEE BREAK

10.15–10.30 Petra Daković, Blaženka Divjak: *A Comparison of Two Assessment Approaches for Evaluating Problem-Solving Competencies in Higher Education*

10.35–10.50 Tamás Balla, Miklós Hoffmann: *Artificial Intelligence and Spatial Cognition*

11.55–11.10 Ede Troll: *Thinking First, Prompting Second – A Complex AI System for Problem-Solving Support*

11.15–11.30 Darija Marković, Josipa Matotek: *Geometry for All: Removing Barriers for Students with Disabilities*

12.00–13.00 LUNCH



Afternoon session (Chair: N. Lovričević)

- 15.00–15.15 Georg Glaeser: *One Geometry, Three Regimes: The Hyperbolic Continuation of Keplerian Conics*
- 15.20–15.35 Christian Clemenzen, Boris Odehnal: *Exploring the World of Pseudo-Geodesics on the Torus*
- 15.40–15.55 Leonard Weydemann: *Practical Considerations for Optimal Transport based Shape Morphing in Blender*
- 16.00–16.15 Bojan Pažek: *Computable Closedness of Incidence Relations in Effective Topological Geometry*
- 16.20–16.50 COFFEE BREAK
- 16.50–17.30 POSTER SESSION
- Maja Andrić, Dominka Jukić, Neda Lovričević: *Geometric Bliss Beyond the Circle Kiss*
- Gorana Aras-Gazić, Ana Laštre: *Take it, Invert it, Solve it and Bring it Back*
- Ivana Božić Dragun, Antonela Orkić: *Algebraic Surfaces in Civil Engineering and Architecture*
- Marijana Hadzima-Nyarko, Silva Lozančić, Antonija Ereš, Josip Radić, Daniela Đikanović: *Geometric Characterisation of Recycled Crushed Brick Aggregate in Sustainable Concrete*
- Ema Jurkin, Marija Šimić Horvath: *Inversion on the Cyclic Quadrangle in the Isotropic Plane*
- Iva Kodrnja: *A Trine Apart – Dance of the Planets*
- 20.30–24.00 CONFERENCE DINNER



THURSDAY, SEPTEMBER 10

7.00– 9.00 BREAKFAST

Morning session (Chair: H. Koncul)

9.00– 9.45 Plenary lecture

Ljiljana Primorac Gajčić: *Minimal and Maximal Surfaces: A Comparative Geometric Perspective*

9.50–10.20 COFFEE BREAK

10.20–10.35 Tomislav Došlić, Biserka Kolarec, Marina Ninčević: *Directed Sequential Arrangements of Families of Circles*

10.40–10.55 Davor Andrić, Nataša Jakšić: *Generative Body Plan of a Ribbed Vault System with Irregular Spatial Loop Morphology for Contemporary Roof Structures*

11.00–11.15 Boris Odehnal: *Bézier Curves are not Smooth!*

11.20–11.35 Miklós Hoffmann, Ede Troll: *Smooth Ride - Bicycle Track Design by Free-form Curves*

11.40–12.00 CLOSING

12.00–13.00 LUNCH

Departure