

Annual Scientific Session of the Department of Algebra and Logic

December 12, 2025, Room 578

Programme

9:45 – 10:00 Opening

10:00 – 10:20 Vesselin Drensky: Dihedral invariants of the free associative algebra of rank two (joint results with Silvia Boumova and Şehmus Findık).

10:20 – 10:50 Tatiana Gateva-Ivanova: Finite idempotent braided sets and their quadratic algebras

10:50 – 11:00 Break

11:00 – 11:20 Emil Kolev: Covering problems

11:20 – 11:40 Ivan Chipchakov: Application of primary tensor product decompositions to the normality question for locally finite-dimensional central division algebras

11:40 – 11:50 Break

11:50 – 12:10 Veselin Filev: Holographic flavour and neural networks

12:10 – 12:30 Elitza Hristova: Tensor products of Lie nilpotent associative algebras

12:30 – 13:30 Lunch Break

13:30 – 13:50 Jörg Koppitz: On Semigroups of Order-Preserving Transformations with the Same Fix Set

13:50 – 14:10 Dimitrinka Vladeva: Why we study semicentral idempotent matrices?

14:10 – 14:20 Break

14:20 – 14:50 Hristo Iliev: On decomposable Tschirnhausen structures and their applications to smooth and non-reduced components of Hilbert schemes of curves

14:50 – 15:20 Ali Raad: Constructing Cartan subalgebras in non-classifiable C^* -algebras

15:20 – 15:30 Break

15:30 – 15:50 Petar Iliev: Intuitionistic formulae with equivalence are exponentially more succinct

15:50 – 16:10 Tatyana Ivanova: The fragment of elementary plane Euclidean geometry, based on perpendicularity alone - decidability and complexity (joint with T. Tinchev)

16:10 – 16:20 Break

16:20 – 16:40 Vilislav Boutchaktchiev: On the Estimation Error of the Expected Inferred Loss Rate

16:40 – 17:10 Marin Genov: Some algebraic aspects of analysis over finite-dimensional commutative algebras

17:10 – 17:15 Break

17:15 – 17:35 Yacine Barhoumi-Andreani: The Tracy-Widom process