

Welcome to International Group Theory Web Seminar

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"Algebraic & definable closure in free groups."

Apr 14, 12:00pm (New York Time).

Abstract:

We prove that if F is a free group of finite rank and A is a nonabelian subgroup of F such that F is freely indecomposable with respect to A , then $\text{acl}(A)$ coincides with the vertex group in the generalized cyclic JSJ-decomposition of F with respect to A . We show that $\text{dcl}(A)$ is a free factor of $\text{acl}(A)$ and in particular they coincide in a free group of rank ≥ 2 . In the general case, we show that a free group whose rank is greater than 4 contains a subgroup A such that $\text{acl}(A) \neq \text{dcl}(A)$. This answers a question of Z. Sela.

This is a joint work with D. Vallino.

Next presentation: **Apr 28. Andrei Nikolaev**

