

INTERNATIONAL BIWEEKLY ONLINE SEMINAR ON ANALYSIS, DIFFERENTIAL EQUATIONS AND MATHEMATICAL PHYSICS

Coordinators: Prof. Alexey Karapetyants, Prof. Vladislav Kravchenko

[JOIN THE SEMINAR](#)

25 July 2024, 6 pm (UTC+3)

On various classes of hypercyclic and topologically transitive operators on Banach spaces

Stefan Ivkovic, Serbian Academy of Sciences and Arts, Serbia

stefan.iv10@outlook.com

Hypercyclicity and topological transitivity are the main concepts in topological dynamics of operators. In this talk, we shall present characterizations of several classes of topologically transitive operators, such as weighted compositions on certain function spaces, left multipliers on Schatten p -ideals, generalized weighted shifts on Hilbert C^* -modules, the adjoint of weighted composition operators on the space of Radon measures etc... Also, we shall provide concrete examples.

The talk will be based on the following papers.

1. Ivković, S., Tabatabaie, S.M. Disjoint Linear Dynamical Properties of Elementary Operators. Bull. Iran. Math. Soc. 49, 63 (2023). <https://doi.org/10.1007/s41980-023-00808-1>
2. Ivković, S., Tabatabaie, S.M. Hypercyclic Generalized Shift Operators. Complex Anal. Oper. Theory 17, 60 (2023). <https://doi.org/10.1007/s11785-023-01376-2>
3. Ivković, S., Tabatabaie, S.M. Hypercyclic Translation Operators on the Algebra of Compact Operators. Iran J Sci Technol Trans Sci 45, 1765–1775 (2021). <https://doi.org/10.1007/s40995-021-01186-1>
4. Ivković, S. Hypercyclic operators on Hilbert C^* -modules, FILOMAT vol. 38 no. 6 (2024), 1901–1913 <https://doi.org/10.2298/FIL2406901I6>
5. Ivković, S. Dynamics of operators on the space of Radon measures, to appear in Analysis, Approximation, Optimization: Computation and Applications - In Honor of Gradimir V. Milovanović on the Occasion of his 75th Anniversary (edited by: M. Stanić, M. Albijanić, D. Djurčić, M. Spalević), Springer Optimization and its Applications <https://doi.org/10.48550/arXiv.2310.10868>

*Seminar website: <https://msrn.sfedu.ru/sl>. The seminar uses Microsoft Teams online platform.

Please send questions to ademp.seminar@gmail.com (Tatiana Andreeva, scientific secretary).

The seminar is organized by the coordinators Alexey Karapetyants and Vladislav Kravchenko within the activities of the Regional Mathematical Center of the Southern Federal University in collaboration with Institute of Mathematics, Mechanics and Computer Sciences of the Southern Federal University and the OTHA research group in Operator Theory and Harmonic Analysis.



Regional Mathematical Center
<https://rmc.sfedu.ru/>



Institute of Mathematics, Mechanics
and Computer Sciences
<http://www.mmcs.sfedu.ru/>



OTHA research network in
Operator Theory and Harmonic Analysis
<http://msrn.sfedu.ru/>