CURRICULUM VITAE

Full Name: Bashmakov Stepan Igorevich Scientific Degree: Candidate of Phisico-Mathematical Sciences (i.e. Ph.D., 2018) Date of Birth: November 30, 1990 Place of Birth: Krasnoyarsk, Russia Address: Siberian Federal University, 79 Svobodny Avenue, 35-00 Krasnoyarsk, 660041, Russia **Telephone:** +7-391-206-20-76 **Email:** krauder@mail.ru **Home Pages:** SibFU: http://math.sfu-kras.ru/node/1100 Math-Net.ru: http://www.mathnet.ru/rus/person/118134 ResearchGate: https://www.researchgate.net/profile/Stepan_Bashmakov **Personal indexes:** Google Scholar: g1pHGz8AAAAJ

Google Scholar: g1pHG28AAAAJ ResearcherID: K-7178-2017 ORCID ID: 0000-0002-3354-0383

Education and degrees:

Undergraduate: Siberian Federal University (2008-2012), B.S. in Mathematics and Computer Science (2012);

Graduate: Siberian Federal University (2012-2014), M.S. in Mathematics (Diploma with honours, 2014);

Postgraduate: Siberian Federal University (2014-2018), Graduate Diploma in Math. Logic, Algebra and Number Theory (2018).

Positions held:

2014-2018: Assistant at the Department of Algebra and Mathematical Logic, School of Mathematics and Computer Science, Siberian Federal University;

2018-until now: Associate Professor at the Department of Algebra and Mathematical Logic, School of Mathematics and Computer Science, Siberian Federal University.

Administrative staff:

2018-until now: Deputy Dean, School of Mathematics and Computer Science, Siberian Federal University.

Disciplines taught:

2014-until now: Discrete Mathematics (ScMCS of SibFU, Humanitarian Inst. of SibFU); 2014-2016: Algebra (ScMCS of SibFU);

2015-until now: Formal Systems in Logic and Algebra (ScMCS of SibFU);

2016-until now: Algorithms and Recursive Functions (ScMCS of SibFU);

2017-until now: Additional Chapters of Logic and Discrete Math. (ScMCS of SibFU).

Conference Talks:

April, 2013: IX All-Russian scientific-technical conference of students, graduates and young scientists with the international participation «Youth and science», Krasnoyarsk, Russia, SibFU (section talk);

July, 2013: International conference «Algebra and logic, theory and applications», dedicated to the 80th anniversary of VP Shunkov, Krasnoyarsk, Russia, SibFU (section talk);

April, 2016: International scientific conference of students, graduates and young scientists «Lomonosov-2016», Moscow, Russia, MSU (section talk);

April, 2016: International scientific student conference «ISSC-2016», Novosibirsk, Russia, NSU-IM SB RAS (section talk);

April, 2016: International youth scientific student conference «Svobodny avenue-2016», Krasnoyarsk, Russia, SibFU (section talk);

July, 2016: International conference «Algebra and logic: theory and applications», Dedicated to the 70th anniversary of VM Levchuk, Krasnoyarsk, Russia, SibFU (section talk);

November, 2016: International conference on algebra, mathematical logic and applications «Mal'tsev meeting», Novosibirsk, Russia, IM SB RAS (section talk);

June, 2017: XX All-Russian scientific and practical conference «Mathematicians to Altai region (MAR-2017)», Barnaul, Russia, AltSU (section talk);

August, 2017: 5th school-seminar «Syntax and semantics of a logical systems», Ulan-Ude - Baikal, Russia, BurSU (section talk);

August, 2017: International conference «Mathematics in the modern world», dedicated to the 60th anniversary of the Institute of Mathematics, Novosibirsk, Russia, IM SB RAS (section talk);

November, 2017: International conference on algebra, mathematical logic and applications «Mal'tsev Meeting», Novosibirsk, Russia, IM SB RAS (section talk);

May-June, 2018: XIII International conference «Logic today: developments and perspectives», St. Petersburg, Russia (section talk);

June, 2018: 6th World congress and school on universal logic, Workshop Model Theory, Vichy, France, University of Clermont-Ferrand (section talk on workshop).

Planned Talks:

November, 2018: International conference on algebra, mathematical logic and applications «Mal'tsev Meeting», Novosibirsk, Russia, IM SB RAS (section talk);

May, 2019: XXI IEEE International conference on Soft computing and measurements, St. Petersburg, Russia (section talk);

June, 2019: XVI International "Asian Logical Conference", Astana, KZ, Nazarbayev University (section talk);

July, 2019: International conference «Algebra and logic, theory and applications», Krasnoyarsk, Russia, SibFU (section talk).

Most important publications:

SI Bashmakov, Unification and inference rules in the multi-modal logic of knowledge and linear time LTK, Journal SibFU. Math & Phys., 2016, V. 9(2), 149–157;

SI Bashmakov, AV Kosheleva, VV Rybakov, Non-unifiability in linear temporal logic of knowledge with multi-agent relations, Siberian Electr. Math. Reports, 2016, V. 13, 656–663; **SI Bashmakov**, AV Kosheleva, VV Rybakov, Projective formulas and unification in linear

discrete temporal multi-agent logics, Siber. Electr. Math. Reports, 2016, V. 13, 923–929; **SI Bashmakov**, MI Golovanov, Axiomatization of intuitionistic logics defined by small frames, Mathematical Notes of North-EastFU, 2017, V. 24(1), 6–15 (in russian);

SI Bashmakov, AV Kosheleva, VV Rybakov, Unification for multi-agent temporal logics with universal modality, IfCoLog J. Logics and their Applications, 2017, V. 4(4), 939–954; **SI Bashmakov**, Unification in Linear Modal Logic on Non-transitive Time with the Universal Modality, Journal SibFU. Math & Phys., 2018, V. 11(1), 3–9.

Research interest:

Modal, Intuitionistic, Temporal, Multi-agent, Multi-modal and Many-valued logics, Unification, Projective Formulas, Inference Rules, Axiomatization, Kripke Relational Semantic.

Summary of main results:

Finite axiomatization of intuitionistic logics given by small frames (with MI Golovanov, 2013-2017);

The criterion of non-unifiability and the finite basis of passive inference rules for linear temporal logic of knowledge LTK (2015-2016);

The criterion of non-unifiability and the infinite basis of passive inference rules for linear temporal logic of knowledge LFPK (with AV Kosheleva and VV Rybakov, 2016);

Unitary type of unification (via projective unification) for linear temporal logic of knowledge LFPK and some modifications (with AV Kosheleva and VV Rybakov, 2016);

The criterions of non-unifiability and infinite basis of passive inference rules for all temporal logics with expressible universal modality (with AV Kosheleva and VV Rybakov, 2017);

Unitary type of unification (via projective unification) for linear modal logic of non-transitive time and universal modality (2018);

Prizes, honors and memberships:

Diploma for the 1st place at the conference «Youth and Science» (2013); Diploma for the 1st place at the conference «Mathematicians to Altai region (MAR-2017)»; Advanced training «Project Management» (2016); Advanced trainings «Complexes of processing ballot papers» (2012-2016); Advanced trainings « Corporate Services SibFU» (2018).

Member of the «Staff reserve» of SibFU (since 2016);

Member of the «Council of Young Scientists» of SibFU (since 2017);

Member of the Russian Society of Photobiologists (since 2017);

Member of the organizing committees of the conference «Algebra and Logic: Theory and Applica-

tions» and the School-Conference on Group Theory, Krasnoyarsk, Russia (2016);

Secretary of the weekly Krasnoyarsk scientific workshop «Non-classical Logics».

Laureate of the **Krasnoyarsk Region State Award** in the Vocational Education: for success in scientific and pedagogical activity (Krasnoyarsk, 2017);

Laureate of the **1st prize of the XXI August Moebius Contest** for the work «Unification in the linear modal logic of nontransitive time with a universal modality» (Moscow, 2017).