LIST OF PUBLICATIONS

Laurian Suciu

„Lucian Blaga" University of Sibiu, Department of Mathematics and Informatics

Doctoral Thesis :

Structure, ergodicity and applications of A-contractions, University Claude Bernard Lyon 1, France, 1-182, 2006.

Habilitation Thesis :

Ergodic and asymptotic behaviours of linear operators, similarity to contractions and Harnack analysis, Technical University of Cluj-Napoca, Romania, 1-233, 2016.

Research activity :

1)Laurian Suciu, *Operators with expansive m-isometric liftings,* Monatshefte für Mathematik, (2022), 1-23. https://doi.org/10.1007/s00605-021-01648-z

2) Laurian Suciu, Elisabeta Alina Totoi, *Three-isometric liftings with invariant isometric part,* Banach J. Math. Anal. (2021) 15:66.
https://doi.org/10.1007/s43037-021-00150-w

3) Catalin Badea, Vladimir Muller, and **Laurian Suciu***, High order isometric liftings and dilations*, Studia Mathematica, 258 (1), (2021), 87-101. DOI: 10.4064/sm200330-25-8

4) Catalin Badea and **Laurian Suciu**, *Hilbert spaces operators with two isometric dilations*, Journal of Operator Theory, 86:1 (2021), 93–123.
doi: 10.7900/jot.2020feb05.2298.

5) Witold Majdak and **Laurian Suciu**, *Convex and expansive liftings close to two-isometries and power bounded operators*, Linear Algebra and its Applications, 617, (2021), 1-26.
 https://doi.org/10.1016/j.laa.2021.01.009

6) Witold Majdak and **Laurian Suciu**, *Triangulations of Operators with Two-Isometric Liftings, Integral Equations and Operator Theory*, (2021) 93:10 https://doi.org/10.1007/s00020-021-02625-9.

7) Laurian Suciu, *Liftings and extensions of operators in Brownian setting*, pp. 1-18, 2020, Linear and Multilinear Algebra. https://doi.org/10.1080/03081087.2020.1819948

8)Laurian Suciu, *On operators with two-isometric liftings,* Complex Analysis and Operator Theory, 14:5, 1-16, 2020. https://doi.org/10.1007/s11785-019-00960-9

9) Witold Majdak and **Laurian Suciu**, *Brownian type parts of operators in Hilbert spaces,* Results in Mathematics, 75:5, 1-23, 2020. https://doi.org/10.1007/s00025-019-1130-8

10) Witold Majdak and **Laurian Suciu**, *Brownian isometric parts of concave operators,* New York J. Math. 25, 1067–1090, 2019. http://nyjm.albany.edu/j/2019/25-46.html

11) Catalin Badea and **Laurian Suciu**, *Similarity problems, Folner sets and isometric representations of amenable semigroups,* Mediterranean Journal of Mathematics 16: 5, 2019. https://doi.org/10.1007/s00009-018-1294-6

12) Catalin Badea and **Laurian Suciu**, *The Cauchy dual and 2-isometric liftings of concave operators,* Journal of Math. Anal. and Appl. 472, 1458-1474, 2019.

https://doi.org/10.1016/j.jmaa.2018.12.002

13) Catalin Badea and **Laurian Suciu***, Harnack and Shmul'yan preorder relations for Hilbert space contractions,* Indagationes Mathematicae 28 (4), 892-912, 2017. ***https://doi.org/10.1016/j.indag.2017.06.012***

14) Laurian Suciu, *Estimations of the operator resolvent by higher order Cesaro means,* Results in Mathematics 69(3), pp. 457-475, 2016. https://doi.org/10.1007/s00025-016-0533-z

15) Witold Majdak, Mostafa Mbekhta**, and Laurian Suciu,** *Operators intertwining with isometries and Brownian parts of 2-isometries,* Linear Algebra and its Applications 509 (15), 168-190, 2016. https://doi.org/10.1016/j.laa.2016.07.014

16) Michael Lin, David Shoikhet, and **Laurian Suciu**, *Remarks on uniform ergodic theorems,* Acta Sci. Math. (Szeged) Vol. 81, pp. 251-283, 2015.
DOI: 10.14232/actasm-012-307-4

17) **Laurian Suciu** and Jaroslav Zemánek, *Growth conditions on Cesaro means of higher order,* Acta Sci. Math. (Szeged) Vol. 79, no 3-4, pp. 545-581, 2013.

18) Mostafa Mbekhta and **Laurian Suciu**, *Generalized inverses and similarity to partial isometries,* Journal of Mathematical Analysis and Applications vol. 372, issue 2, pp. 559-564, 2010. https://doi.org/10.1016/j.jmaa.2010.06.022

19) Mostafa Mbekhta and **Laurian Suciu,** *Classes of operators similar to partial isometries,* Integral Equations and Operator Theory Volume 63, Number 4, pp. 571-590, 2009. https://doi.org/10.1007/s00020-009-1671-4

20) Laurian Suciu*, Contractions généralisées et applications* : Prépublications de l'Institut Girard Desargues, Université Claude Bernard Lyon I, UMR 5028, 7, pp. 1-64, 2003.

Scientific contribution :

21) Laurian Suciu, *Ergodic behaviors of the regular operator means,* Banach Journal of Mathematical Analysis, 11, No. 2, 239-265, 2017. **doi:10.1215/17358787-3796878**

22) Catalin Badea, **Laurian Suciu**, and Dan Timotin, *Classes of contractions and Harnack domination,* Revista Matematica Iberoamericana, 33 (2), 469-488, 2017. DOI: 10.4171/RMI/945

23) Alexandru Aleman and **Laurian Suciu,** *On ergodic operator means in Banach spaces,* Integral Equations and Operator Theory, vol. 85 pp. 259-287, 2016. *https://doi.org/10.1007/s00020-016-2298-x*

24) Mostafa Mbekhta and **Laurian Suciu,** *Partial isometries and the conjecture of C. K. Fong and S. K. Tsui*, Journal of Mathematical Analysis and Applications Vol. 437, pp. 431-444, 2016. https://doi.org/10.1016/j.jmaa.2015.12.057

25) Michael Lin and **Laurian Suciu**, *Poisson's equation for mean ergodic operators,* Contemporary Mathematics Vol. 636, pp. 141-148, 2015.

26) Mostafa Mbekhta and **Laurian Suciu,** *Quasi-isometries associated to A-contractions,* Linear Algebra and its Applications Vol. 459, pp. 430-453, 2014. https://doi.org/10.1016/j.laa.2014.07.016

27) Laurian Suciu and Nicolae Suciu, *Borel-Carathéodory and Fan Type Inequalities for Hilbert space bicontractions*, Complex Analysis and Operator Theory Vol. 8, Issue 1, pp. 227-241, 2014. https://doi.org/10.1007/s11785-013-0291-9

28) Laurian Suciu, *Saturation for Cesaro means of higher order*, Operators and Matrices Vol. 7, no. 3, pp. 557-572, 2013. dx.doi.org/10.7153/oam-07-30

29) Witold Majdak, Nicolae Adrian Secelean, and **Laurian Suciu,** *Ergodic properties for operators in semi-Hilbertian spaces,* Linear and Multilinear Algebra Vol. 61, Issue 2, pp. 139-159, 2013. https://doi.org/10.1080/03081087.2012.667094

30) Marek Kosiek and **Laurian Suciu**, *Decompositions and asymptotic limit for bicontractions,* Annales Polonici Mathematici 105.1, pp. 43-64, 2012. DOI: 10.4064/ap105-1-5

31) Laurian Suciu and Nicolae Suciu, *Inequalities for strict bicontractions,* Annals of the University of Bucharest LIX, pp. 3-15, 2010. http://fmi.unibuc.ro/ro/anale/matematica/1_2010/suciu.pdf

32) Laurian Suciu, *Quasi-isometries in semi-Hilbertian spaces*, Linear Algebra and its Applications Volume 430, Issues 8-9, pp. 2474-2487, 2009. https://doi.org/10.1016/j.laa.2008.12.021

33) Laurian Suciu and Nicolae Suciu, *Asymptotic behaviours and generalized Toeplitz operators*, Journal of Mathematical Analysis and Applications vol. 349, issue 1, pp. 280-290, 2009. https://doi.org/10.1016/j.jmaa.2008.08.028

34) Laurian Suciu, *Maximum A-isometric part of an A-contraction and applications,* Israel Journal of Mathematics vol. 174, pp. 419-442, 2009. https://doi.org/10.1007/s11856-009-0121-y

35) Laurian Suciu, *Uniformly ergodic A-contractions on Hilbert spaces*, Studia Mathematica vol. 194, pp. 1-22, 2009. DOI: 10.4064/sm194-1-1

36) Laurian Suciu, *Canonical decompositions induced by A-contractions*, Note di Matematica vol. 28, issue 2, pp. 187-202, 2008. DOI :10.1285/i15900932v28n2p187

37) Laurian Suciu and Nicolae Suciu, *Ergodic conditions and spectral properties for A-contractions,* Opuscula Mathematica Vol. 28, No. 2, pp. 195 – 216, 2008.
https://www.opuscula.agh.edu.pl/om-vol28iss2art8

38) Laurian Suciu, *Maximum subspaces related to A-contractions and quasinormal operators,* Journal of the Korean Mathematical Society 45, No.1, pp. 205-219, 2008.

39) Laurian Suciu, *Ergodic properties for regular A-contractions*, Integral Equations and Operator Theory 56, 2, pp. 285-299, 2006. https://doi.org/10.1007/s00020-006-1417-5

40) Laurian Suciu, *Some invariant subspaces for A-contractions and applications,* Extracta Mathematicae 21 (3), pp. 221-247, 2006.
https://www.eweb.unex.es/eweb/extracta/Vol-21-3/21J3Suciu.pdf

41) Laurian Suciu and Nicolae Suciu, *Harnack domination for contractions and related intertwining operators,* Acta Sci. Math. (Szeged) 72, pp. 319-343, 2006.

42) Laurian Suciu, *On the ergodic A-contractions*, Analele Univ. de Vest din Timişoara, Ser. Mat.-Inf. 2, pp. 115-136, 2004.

43) Laurian Suciu, *Orthogonal decomposition induced by generalized contractions,* Acta Sci. Math. (Szeged) 70, pp. 751-765, 2004.

Articles in Proceedings

44) Laurian Suciu and Nicolae Suciu, *On the asymptotic limit of a bicontraction,* Theta Series in Advanced Mathematics, pp. 117-135, 2012.

45) Laurian Suciu and Nicolae Suciu, *Selection of semispectral measures for bicontractions,* Theta Series in Advanced Mathematics, pp. 1-21, 2010.

46) Laurian Suciu and Nicolae Suciu, *Harnack ordering for pairs of commuting contractions,* Proceedings of the 6th Congress of Romanian Mathematicians, Bucharest 2007, Editura Academiei Române, vol. 1, pp. 381-398, 2009.

47) Gilles Cassier and **Laurian Suciu**, *Mapping theorems and similarity to contractions for classes of A-contractions,* Theta Series in Advanced Mathematics, pp. 39-58, 2008.

48) Laurian Suciu, *Block representation for A-contractions*, Theta Series in Advanced Mathematics, pp. 201-216, 2008.

49) Laurian Suciu, *Ergodic properties and saturation for A-contractions,* Theta Series in Advanced Mathematics, pp. 225-242, 2006.

50) Laurian Suciu, *Invertible A-contractions and applications,* Proceedings of the 9th National Conference of the Romanian Mathematical Society, Lugoj 6-7 May 2005, Ed. UVT, pp. 272-290, 2005.

51) Laurian Suciu, *Sur les contractions quasi-normales,* Proceedings of the National Conf. of Math. Anal. and Appl., Timişoara 2000, pp. 395-404, 2000.

Preprints

52) Witold Majdak and **Laurian Suciu**, *On ergodic operators on semi-Hilbert spaces*, pp. 1-25, 2019.

53) Sanne ter Horst, **Laurian Suciu**, and Marten Wortel, *Perturbations of the maximal function related to the intertwining expansion problem for contractions*, pp. 1-40, 2019.