

Ana Maria Acu

Curriculum Vitae

Department of Mathematics and Informatics
Str. Dr. I. Ratiu, No.5-7, RO-550012 Sibiu, Romania
Office: +402692166429
✉ anamaria.acu@ulbsibiu.ro
Orcid ID: [0000-0003-1192-2281](https://orcid.org/0000-0003-1192-2281)
WoS ID: [F-8072-2019](https://www.scopus.com/authid/detail.url?authorID=57202121000)



Personal info *Date of Birth:* November 11, 1977

Place of Birth: Ramnicu Valcea, Romania

Tel.: +40766258465

Affiliations

Department of
Mathematics and
Informatics, Lucian
Blaga University of Sibiu,
Romania

Str. Dr. I. Ratiu, No.5-7, RO-550012 Sibiu, Romania, depmath.ulbsibiu.ro

Research Center in
Mathematics and
Applications

Str. Dr. I. Ratiu, No.5-7, RO-550012 Sibiu, Romania, stiinte.ulbsibiu.ro/cercetare/rcma

Education

- 1996–2000 **Bachelor in Mathematics and Informatics**, *Lucian Blaga University of Sibiu*
2000–2007 **Ph.D. in Mathematics**, *Babeş-Bolyai University from Cluj-Napoca*
2016 **Habilitation in Mathematics**, *Tehcnical University of Cluj-Napoca*

Languages

Roumanian *Mothertongue*
English *B1 Average*

Positions

- Oct. 2000-Feb. 2003 **Preparatory Assistant**, *Department of Mathematics and Informatics, University Lucian Blaga of Sibiu*
Mar. 2003-Feb. 2008 **Assistant Professor**, *Department of Mathematics and Informatics, University Lucian Blaga of Sibiu*
Mar 2008-Sept. 2014 **Lecturer**, *Department of Mathematics and Informatics, University Lucian Blaga of Sibiu*
Oct. 2014-Sep. 2017 **Associate Professor**, *Department of Mathematics and Informatics, University Lucian Blaga of Sibiu*
Oct. 2017- **Professor**, *Department of Mathematics and Informatics, University Lucian Blaga of Sibiu*

Member in scientific organizations

American Mathematical Society, *member*

Romanian Mathematical Society, *member*

Research Center in Mathematics and Applications of Lucian Blaga University of Sibiu, RCMA, *member*

Coordinator of the group Numerical Methods and Approximation Theory, RCMA

Member in Editorial Board of Scientific Journals

Results in Mathematics

Mathematical Foundations of Computing

Publications de l'Institut Mathématique-Beograd

Poincare Journal of Analysis and Applications

International Journal of Applied Mathematical Research

Open Journal of mathematical Sciences (OMS)

General Mathematics

Member in scientific/organizing committees of International symposiums/conferences

- The International Conference on Approximation Theory and its Applications, September 12-14, 2022, Sibiu
- Minisymposium on "Approximation Theory and Applications" at the 8th European Congress of Mathematics, Portoroz, Slovenia, 20-26 June 2021.
- The International Conference on Approximation Theory and its Applications, 10-13 October, 2019, Sibiu
- The 13th Romanian - German Seminar on Approximation Theory and Its Applications, Technical University of Cluj-Napoca Faculty of Automation and Computer Science, Department of Mathematics, 3-6 July, 2019, Romania.
- The Romanian-German Seminar on Approximation Theory and its Applications, 21-22 April 2017, Oradea, Romania
- The International Conference on Approximation Theory and its Applications, 26-29 May, 2016, Sibiu
- International Conference on Theory and Applications of Mathematics and Informatics, Alba Iulia 2015.
- The 11th Romanian German Seminar on Approximation Theory and its Applications Sibiu, 29 May-1 June, 2014
- The 10th Romanian German Seminar on Approximation Theory and its Applications Sibiu, 24-27 May, 2012
- International Conference on Theory and Applications of Mathematics and Informatics, Alba Iulia 2011
- The 13th WSEAS International Conference on SYSTEM", Rodos Island, Greece, July 22-24, 2009
- International Conference on Theory and Applications of Mathematics and Informatics, Alba Iulia 2009.
- Romanian- German Symposium on Mathematics and Its Applications Sibiu, May 14-17, 2009.
- The 8th Romanian German Seminar on Approximation Theory and its Applications Sibiu, 28 May-1 June, 2008
- International Symposium "Mathematical Inequalities" , 25 – 27 September , Sibiu 2008"
- International Symposium on Complex Analysis, 26-29 August, Sibiu 2007
- International Conference on Theory and Applications of Mathematics and Informatics, Alba Iulia 2007



Scientific activity

- two monographies
- five university courses and two selections
- more than 150 published papers in scientific journals
- Editor/Guest Editor
 - Special Issue "Mathematical Inequalities, Models and Applications, 2nd Edition" in Mathematics (Deadline, 31 October 2024)
 - Special Issue "Numerical Methods and Approximation Theory" in Axioms (Deadline, 30 September 2024)
 - Special Issue Dedicated to Professor Ioan Raşa on the occasion of his 70th birthday in Dolomites Research Notes on Approximation (Volume 17, 2024)
 - Special Issue "Mathematical Inequalities, Models and Applications" in Mathematics (closed 30 November 2023)
 - Special Issue "New Directions in Theory of Approximation and Related Problems" in Symmetry (closed 15 September 2022)
 - Special Issue "Sequence Spaces, Function Spaces and Approximation Theory" in Journal of Function Spaces (closed 16 October 2020)
 - Proceedings of The 12th International conference on approximation Theory and its Applications, 26-29 May, 2016, Sibiu.
 - Proceedings of The 11th Romanian German Seminar on Approximation Theory and its Applications, Sibiu, 29 May-1 June, 2014
 - Proceedings of The 10th Romanian German Seminar on Approximation Theory and its Applications, Sibiu, 24-27 May, 2012
 - Proceedings of The 8th Romanian German Seminar on Approximation Theory and its Applications, Sibiu, 28 May-1 June, 2008
 - Proceedings of the Fifth International Symposium "Mathematical Inequalities, 25 – 27 September, Sibiu 2008
 - Mathematical Analysis I: Approximation Theory ICRAPAM 2018, New Delhi, India, October 23–25, Editors: Deo, N., Gupta, V., Acu, A.M., Agrawal, P.N. (Eds.), Springer Proceedings in Mathematics & Statistics, 2020.
 - Mathematical Analysis II: Optimisation, Differential Equations and Graph Theory, ICRAPAM 2018, New Delhi, India, October 23–25, Editors: Deo, N., Gupta, V., Acu, A.M., Agrawal, P.N. (Eds.), Springer Proceedings in Mathematics & Statistics, 2020.
- Invited speaker at 5 colloquium or seminar talks at "Duisburg-Essen" University, Germany
 - 19 June 2009-"Duisburg-Essen University", Germany Generalization of some classical quadrature formulas
 - 20 January 2010- "Duisburg-Essen University", Germany Extremal Problems for Polynomials
 - 28 January 2010- "Duisburg-Essen University", Germany Some methods for construction of quadrature formulas
 - 25 November 2011-"Duisburg-Essen University", Germany Some corrected optimal quadrature formulas
 - 26 April 2013-"Duisburg-Essen University", Germany Inequalities for a linear functional
- Invited speaker in 13 October 2015 at Kirikkale University, Turkey, New estimations for the differences of positive linear operators.
- Invited speaker at International Conference on Differential Geometry, Algebra and Analysis, November 15-17, 2016, Jamia Millia Islamia, India, Differences of positive linear operators.
- Invited speaker in 18 November 2016 at Delhi Technological University, India, Approximation by certain positive linear operators.
- Invited speaker in 19 November 2016 at Dr. B.R. Ambedkar University, Agra, India, Some problems in approximation by linear positive operators.



- Invited speaker in 18 May 2017 at Sofia University, Faculty of Mathematics and Informatics, Bulgaria, Some problems in Approximation by linear positive operators.
- Invited speaker at International Conference on Recent Advances in Pure and Applied Mathematics, 23-25 October 2018, New Delhi, India, Perturbed Bernstein-type operators.
- Invited speaker at International Conference on Mathematics : An Istanbul Meeting for World Mathematicians, 3-6 July, Istanbul, Turkey, 2018, Approximation by certain positive linear operators
- Invited speaker in 5 April 2019 at University of Wuppertal, Germany, Differences of positive linear operators.
- Invited speaker at at conference Approximation: Theory, Methods and Applications (ATMA2023), that was held in Padova (Italy) from January 18 to January 20, 2023.

Research visits

1. Visiting Professor at Duisburg-Essen University, 4-29 January, 2010 (DAAD program dedicated to "Academic Reconstruction of South-Eastern Europe")
2. Visiting Professor at Duisburg-Essen University, 15 February-12 March, 2010, (DAAD program dedicated to "Academic Reconstruction of South-Eastern Europe")
3. Visiting Professor at Duisburg-Essen University, 4-29 January, 2012, (DAAD program dedicated to "Academic Reconstruction of South-Eastern Europe")
4. Visiting Professor at Kirikkale University, Turkey , 12-19 October, 2015.
5. Visiting Professor at Delhi Technological University, India, 16-18 Noiembrie, 2016
6. Visiting Professor at Dr. B.R. Ambedkar University, Agra, India, 19-20 Noiembrie, 2016
7. Visiting Professor at Indian Institute of Technology Roorkee, India, 21-23 Noiembrie, 2016
8. Visiting Professor at University of Wuppertal, 1-29 April 2019.
9. Visiting scientist at Ankara University during 2-16 November 2019, supported by The Scientific and Technological Research Council of Turkey, " 2221 - Fellowships for Visiting Scientists and Scientists on Sabbatical Leave, with application numbers (1059B211900262)
10. Visiting Professor at University of Padua, Italy, 19 February-11 March 2022.
11. Visiting Professor at University of Perugia, Italy, 27 February-1 March 2022.
12. Visiting Professor at University of Wuppertal, 1-29 April 2022.
13. Visiting Professor at University of Jaen, Spain, 10 – 17 October 2022.
14. Visiting Professor at University of Wuppertal, 1-30 March 2023.

Research Projects

- Research grants LBUS-IRG-2015-01, No.2032/7 financed from Lucian Blaga University of Sibiu (Mathematical Inequalities and its Applications in Approximation Theory) (Director)
- Research grants LBUS-IRG-2016-02, Nr. 3209 financed from Lucian Blaga University of Sibiu (Approximation by certain positive linear operators) (Director)
- Research grants LBUS-IRG-2017-03, Nr. 3081 financed from Lucian Blaga University of Sibiu (Rate of convergence of summation-integral type operators) (Director)
- Research grants LBUS-IRG-2018-04, Nr. 3414 financed from Lucian Blaga University of Sibiu (Approximation by Durrmeyer type operators) (Director)
- Mobility projects for researchers; project code: PN-III-P1-1.1-MC-2018-1041, supported by Executive Unit for Financing Higher Education, Research, Development and Innovation (UEFISCDI)
- Mobility projects for researchers; project code: PN-III-P1-1.1-MC-2019-0957, supported by Executive Unit for Financing Higher Education, Research, Development and Innovation (UEFISCDI)
- Research grants LBUS-IRG-2019-05, Nr. 3083 financed from Lucian Blaga University of Sibiu & Hasso Plattner Foundation research grants (Representations for the inverses of certain operators) (Director)
- Project "LBUS-HPI-ERG-2020-04/Adaptive preferences and natural price on the financial market-a co-evolutionary model", contract no. 2724/16.12.2020, COR code 241301 (scientific resercher I)

- Project "LBUS-HPI-ERG-2020-07/Development of advanced numerical algorithms and robust calculation protocols for the dimensional and structural characterization of nanostructures", contract no. 4530/19.11.2021, COR code 212023 (scientific researcher I)
- Research grants LBUS-IRG-2021-07, financed from Lucian Blaga University of Sibiu & Hasso Plattner Foundation research grants (Iterates and invariant measures for Markov operators) (Director)
- "Know-how transfer for excellent research at ULBS" project, code: CNFIS-FDI-2021-0030, COR code 242401- Training expert
- "PYTHAGORAS" project, project code no. 2021-1-RO01-KA220-HED-000032258, COR code 235104-Education expert
- Research grants LBUS-IRG-2022-08, financed from Lucian Blaga University of Sibiu & Hasso Plattner Foundation research grants (Discrete probability distributions and some applications) (Director)
- "FORTHEM-Fostering Outreach within European Regions, Transnational Higher Education and Mobility" project, code 101089463, Grant Agreement no. 101089463/19.10.2022, COR code 235104-Educational expert WP 8 senior
- Research grants LBUS-IRG-2023, financed from Lucian Blaga University of Sibiu (Voronovskaja formula for Aldaz-Kounchev-Render operators), contract Nr. 3509/24.07.2023 (Director)
- Project financed by Lucian Blaga University of Sibiu (Knowledge Transfer Center) & Hasso Plattner Foundation research grants LBUS-HPI-ERG-2023-01 (Operatori liniari pozitivi: noi provocări, noi aplicații), contract nr. 3190/03.07.2023 (Director)
- Romania's National Recovery and Resilience Plan PNRR-III-C9-2022 - I8, Mathematical Methods and Models for Biomedical Applications (Ma.Me.Mo.Bi.A.), Contract no.760076/23.05.2023, CF125/15.11.2022 (Executive Manager and Scientific Resercher I)

Conference talks

1. APPLIED MATHEMATICS AND SCIENTIFIC COMPUTING, BRIJUNI, CROATIA, JULY 9-13, 2007
2. INTERNATIONAL SYMPOSIUM ON COMPLEX ANALYSIS, SIBIU, 26-29 AUGUST, 2007,
3. INTERNATIONAL CONFERENCE ON THEORY AND APPLICATIONS OF MATHEMATICS AND INFORMATICS, 29 AUGUST-2 SEPTEMBER, ALBA-IULIA, 2007
4. THE 8th ROMANIAN GERMAN SEMINAR ON APPROXIMATION THEORY AN ITS APPLICATIONS, 28 MAY-1 JUNE, SIBIU, 2008
5. THE 12th WSEASE INTERNATIONAL CONFERENCE ON COMPUTERS, HERAKLION, GREECE, JULY 23 - 25, 2008
6. THE TWELFTH INTERNATIONAL CONFERENCE ON APPLIED MATHEMATICS COMPUTER SCIENCE AND MECHANICS, BAISOARA, SEPTEMBRIE 10-13, 2008.
7. THE FIFTH INTERNATIONAL SYMPOSIUM " MATHEMATICAL INEQUALITIES", 25-27 SEPTEMBER, SIBIU, 2008.
8. INTERNATIONAL WORKSHOP "NEW TRENDS IN APPROXIMATION, OPTIMIZATION AND CLASSIFICATION", OCTOBER 1-5, SIBIU, 2008.
9. THE 14th INTERNATIONAL CONFERENCE -KNOWLEDGE BASED ORGANIZATION- LAND FORCES ACADEMY, NOIEMBRIE, SIBIU, 2008.
10. ROMANIAN-GERMAN SYMPOSIUM ON MATHEMATICS AND ITS APPLICATIONS, SIBIU MAY 14-17, 2009.
11. THE 5TH INTERNATIONAL CONFERENCE "DYNAMICAL SYSTEM AND APPLICATIONS" CONSTANTA, JUNE 15-18, 2009.
12. INTERNATIONAL CONFERENCE ON THEORY AND APPLICATIONS IN MATHEMATICS AND INFORMATICS, 3-6 SEPTEMBER, ALBA-IULIA, ROMANIA, 2009. 13. THE XII-TH SYMPOSIUM OF MATHEMATICS AND ITS APPLICATIONS, 5-7 NOVEMBER, TIMISOARA, ROMANIA, 2009.



13. INTERNATIONAL SYMPOSIUM "TWENTY YEARS OF MATHEMATICS IN THE LUCIAN BLAGA UNIVERSITY OF SIBIU, 14-15 MAY, 2010
14. SEVENTH INTERNATIONAL CONFERENCE ON APPLIED MATHEMATICS, BAIA MARE, SEPTEMBER 1-4, 2010
15. MATHEMATICS AND COMPUTER-AIDED MODELING IN SCIENCES INTENSIVE SCHOOL – NOVI SAD, 27-29 MAY, 2011
16. THE 9TH CONFERENCE ON NONLINEAR ANALYSIS AND APPLIED MATHEMATICS, TARGOVISTE, 10-11 JUNE, 2011
17. THE 8 TH INTERNATIONAL CONFERENCE ON APPLIED MATHEMATICS, BAIA-MARE , 27-30 OCTOBER 2011
18. INTERNATIONAL CONFERENCE ON THEORY AND APPLICATIONS IN MATHEMATICS AND INFORMATICS, 21-24 JULY, 2011, ALBA-IULIA
19. "GHEORGHE VRANCEANU" NATIONAL CONFERENCE ON METHEMATICS AND INFORMATICS WITH INTERNATIONAL PARTICIPATION, BACAU, 26-28 MAY, 2011
20. THE 17-TH INTERNATIONAL CONFERENCE, THE KNOWLEDGE-BASED ORGANISATION, APPLIED TECHNICAL SCIENCES AND ADVANCED MILITARY TECHNOLOGIES, 24-26 NOVEMBER, 2011, SIBIU.
21. OBERSEMINAR RHEIN-RUTH, DUISBURG-ESSEN UNIVERSITY, 26 NOVEMBER, 2011
22. THE 10TH ROMANIAN GERMAN SEMINAR ON APPROXIMATION THEORY AND ITS APPLICATIONS, 24-27 MAY, 2012, SIBIU.
23. OBERSEMINAR RHEIN-RUTH, DUISBURG-ESSEN UNIVERSITY, 26 APRIL, 2013
24. THE 13TH INTERNATIONAL CONFERENCE ON MATHEMATICS AND ITS APPLICATIONS, NOVEMBER, 1-3, 2012, TIMISOARA
25. "GHEORGHE VRANCEANU" NATIONAL CONFERENCE ON METHEMATICS AND INFORMATICS, BACAU, 31th OF MAY, 2013 .
26. THE 19TH INTERNATIONAL CONFERENCE –THE KNOWLEDGE BASED ORGANIZATION- APPLIED TECHNICAL SCIENCES AND ADVANCED MILITARY TECHNOLOGIES CONFERENCE, 13-15 JUNE 2013, SIBIU.
27. JOINT INTERNATIONAL MEETING OF THE AMERICAN MATHEMATICAL SOCIETY AND THE ROMANIAN MATHEMATICAL SOCIETY, JUNE 27-30, 2013, ALBA IULIA.
28. THE FOURTEENTH INTERNATIONAL CONFERENCE ON APPLIED MATHEMATICS AND COMPUTER SCIENCE, CLUJ-NAPOCA ROMANIA, AUGUST 29-31, 2013.
29. THE 9TH INTERNATIONAL CONFERENCE ON APPLIED MATHEMATICS, BAIA MARE, 25-28 SEPTEMBER, 2013.
30. THE 11TH ROMANIAN GERMAN SEMINAR ON APPROXIMATION THEORY AND ITS APPLICATIONS, 29 MAY-1JUNE, 2014, SIBIU.
31. OBERSEMINAR RHEIN-RUTH, WUPPERTAL UNIVERSITY, 18 JULY, 2014
32. GLOBAL NETWORK CONFERENCE ON EMERGENCY MEDICINE, MOHAMMED BIN RASHID ACADEMIC MEDICAL CENTER, DUBAI, 25TH-29TH, APRIL 2014.
33. THIRD INTERNATIONAL CONFERENCE ON NUMERICAL ANALYSIS AND APPROXIMATION THEORY, CLUJ-NAPOCA, SEPTEMBER 17-20, 2014.



34. The 14th INTERNATIONAL CONFERENCE ON MATHEMATICS AND ITS APPLICATIONS, TIMISOARA 4-7 NOVEMBER, 2015.
35. THE 12TH INTERNATIONAL CONFERENCE ON APPROXIMATION THEORY AND ITS APPLICATIONS, 26-29 MAY, 2016, SIBIU.
36. 15TH INTERNATIONAL CONFERENCE ON APPLIED MATHEMATICS AND COMPUTER SCIENCE 5-7 JULY, 2016, CLUJ-NAPOCA.
37. INTERNATIONAL CONFERENCE ON DIFFERENTIAL GEOMETRY, ALGEBRA AND ANALYSIS, NOVEMBER 15-17, JAMIA MILLIA ISLAMIA, INDIA.
38. THE 9TH EDITION OF "GHEORGHE VRANCEANU" CONFERENCE ON MATHEMATICS AND INFORMATICS, DECEMBER 6TH, 2016, BACAU.
39. THE ROMANIAN-GERMAN SEMINAR ON APPROXIMATION THEORY AND ITS APPLICATIONS, 21-22 APRIL 2017, ORADEA, ROMANIA
40. INTERNATIONAL CONFERENCE ON MATHEMATICS: AN ISTANBUL MEETING FOR WORLD MATHEMATICIANS, 3-6 JULY, ISTANBUL, TURKEY, 2018
41. FOURTH INTERNATIONAL CONFERENCE ON NUMERICAL ANALYSIS AND APPROXIMATION THEORY, CLUJ-NAPOCA, SEPTEMBER 6-9, 2018.
42. INTERNATIONAL CONFERENCE ON RECENT ADVANCES IN PURE AND APPLIED MATHEMATICS, 23-25 OCTOBER, NEW DELHI, 2018
43. INTERNATIONAL CONFERENCE CONSTRUCTIVE THEORY OF FUNCTIONS, 3-8 JUNE, 2019 SOZOPOL, BULGARIA
44. THE 13TH ROMANIAN-GERMAN SEMINAR ON APPROXIMATION THEORY AND ITS APPLICATIONS, TECHNICAL UNIVERSITY OF CLUJ-NAPOCA FACULTY OF AUTOMATION AND COMPUTER SCIENCE, DEPARTMENT OF MATHEMATICS, 3-6 JULY, 2019, CLUJ-NAPOCA, ROMANIA.
45. THE INTERNATIONAL CONFERENCE ON APPROXIMATION THEORY AND ITS APPLICATIONS, 10-13 OCTOBER, 2019, SIBIU
46. INTERNATIONAL CONFERENCE ON RESEARCH FRONTIER IN SCIENCES (ICRFS-21), 5-6TH FEB 2021, G H RAISONI COLLEGE OF ENGINEERING, NAGPUR, INDIA (Keynote speaker)
47. 19TH INTERNATIONAL CONFERENCE ON FUNCTIONAL EQUATIONS AND INEQUALITIES, BEDLEWO, POLAND, SEPTEMBER 19-21, 2021.
48. CONFERENCE "RECENT DEVELOPMENTS IN MATHEMATICAL ANALYSIS" ON THE OCCASION OF FRANCESCO ALTOMARE'S 70TH BIRTHDAY, SEPTEMBER 23-24, 2021
49. FIFTEENTH FRENCH-ROMANIAN COLLOQUIUM ON APPLIED MATHEMATICS, 28 AUGUST – 3 SEPTEMBER 2022, TOULOUSE, FRANCE
50. FUNCTIONAL ANALYSIS, APPROXIMATION THEORY AND NUMERICAL ANALYSIS, MATERA, ITALY, JULY 5-8, 2022
51. APPROXIMATION THEORY, METHODS AND APPLICATIONS (ATMA2023), PADOVA (ITALY) JANUARY 18-20, 2023 (INVITED SPEAKER).
52. 20TH INTERNATIONAL CONFERENCE ON FUNCTIONAL EQUATIONS AND INEQUALITIES, BEDLEWO, POLAND, SEPTEMBER 17-23, 2023.

Visits under Erasmus program



1. June 15-29, 2009, "Duisburg-Essen University", Germany
2. November 14-28, 2011, "Duisburg-Essen University", Germany
3. April 15-27, 2013, "Duisburg-Essen University", Germany
4. July 8-20, 2014, "Duisburg-Essen University", Germany
5. September 18-26, 2015, Technological Educational Institute of Thessaly, Greece
6. May 14-19, 2017 at University of Architecture, Civil Engineering and Geodesy, Sofia, Bulgaria
7. June 15-23, 2018, Technological Educational Institute of Thessaly, Greece
8. 28 May-3 June 2019, University of Architecture, Civil Engineering and Geodesy, Sofia, Bulgaria
9. July 21-30, 2019 Ateneo de Manila University, Philippines
10. May 24-31, 2021, University of Thessaly din Grecia
11. May 23-31, 2022, Universitas Airlangga, Indonesia
12. May 3-9, 2023, Universidade de Evora Portugal
13. June 13-20, 2023, Universitas Airlangga, Indonesia
14. November 6-12, 2023, University of Latvia, Latvia
15. February 12-16, 2024, University of Jyvaskyla, Finland

Bibliometrics

Database	number	h-index	cit
MathSciNet	150		
Scopus	142	19	980
Scholar		22	1531
Web of Science	129	18	841

Date: March 1, 2024

