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| Radmila SazdanovicDepartment of Mathematics, College of Sciences, NC State University, Raleigh NC rsazdan@ncsu.edu https://sazdanovic.wordpress.ncsu.edu/ |  |

Mathematician and a conceptual artist

Specializing in low dimensional topology, applications of algebraic topology in data analysis, with a focus on knot theory and categorification. Her artwork is inspired by her research and explores the interplay of art, nature, culture, math, and science.

Education

Ph.D. Mathematics, 2010, George Washington University, Washington DC

Experience

2021 Associate Professor NC State University

**2013-2021** Assistant professor NC State University

**Summer 2018 Immersive Scholar Creative Residency**, The "Visualizing Digital Scholarship in Libraries and Learning Spaces" Andrew W. Mellon Foundation Grant.

**2010-2013** Postdoctoral Fellow MSRI Berkeley; University of Pennsylvania, Philadelphia PA

**2005-2010** Presidential Merit Fellow, George Washington University, Washington DC

Selected honors and awards

**2020 Outstanding Extension and Engagement Award**, NC State University

**2020 MSRI Summer Research for Women in Mathematics** Program Summer 2021

**2020-2022 AIM SQUARES** grant 2020-2022

**2019 NSF DMS grant:** Computational topology and categorification of cancer genomic data

**2018** **Immersive Scholar Creative Residency**, The "Visualizing Digital Scholarship in Libraries and Learning Spaces" Andrew W. Mellon Foundation Grant.

Publications

* Research: 1 book, 44 journal papers, 2 book chapters

S. Jablan, R.Sazdanovic, “LinKnot: Knot Theory by Computer”, World Scientific edition “On Knots and Everything” 21 (2007) pp. 500 ISBN 978-981-277-223-7

* Art: 12 publications
1. H. Russell, R. Sazdanovic, Mathematics and Art: Unifying Perspectives, accepted to Handbook of Arts and Sciences, Springer, to appear in June 2021.
2. R. Sazdanovic, Visualizations and visual thinking in mathematics, To appear in On Visualization. A Multicentric Critique beyond Infographics, Erna Fiorentini, James Elinks (editors) Series "Kultur: Forschung und Wssenschaft", LIT Verlag ISBN 3-643-90535-2
3. R. Sazdanovic, Fisheye View of Tessellations, Bridges: Mathematical Connections in Art, Music and Science, Conference Proceedings, (2012)361–364.
4. R. Sazdanovic, Diagrammatics in Art and Mathematics, Symmetry 4, (2012) 285-301.
5. S. Jablan, Lj. Radovic, R. Sazdanovic, Knost and Links in Architecture, Pollack Periodica, Vol. 7 (2012), 65-76.
6. S. Jablan, Lj. Radovic, R. Sazdanovic, A. Zekovic, Knots in Art, Symmetry 4, (2012) 302-328.
7. R. Sazdanovic, "Experience-centered approach and Visuality in the Education of Mathematics and Physics" Kaposvar University, Kaposvar, (2012) ISBN 978-963-9821-52-1
8. Jablan, R. Sazdanovic R. Discovering symmetry of knots by using program LinKnot, Symmetry: Art and Science, The Journal of ISIS-Symmetry, 1-4 (2004) 102--110.
9. R. Sazdanovic, M. Sremcevic, Hyperbolic Tessellations by tess, Symmetry: Art and Science, 1-4 (2004) 226-229.
10. R. Sarhangi, S.Jablan, R. Sazdanovic, Modularity in Medieval Persian Mosaics: Textual, Empirical, Analytical and Theoretical Considerations, Bridges: Mathematical Connections in Art, Music and Science}, Conference Proceedings, (2004) 281-293.
11. J. Barrallo, R. Sazdanovic, Computer Sculpture: A Journey Through Mathematics, Bridges: Mathematical Connections in Art, Music and Science, Conference Proceedings, (2002) 54.
12. R. Sazdanovic, M. Sremcevic, Tessellations of the Euclidean, Elliptic and Hyperbolic Plane, Symmetry: Art and Science, 2 (2002) 229-304.

Invited Talks

* Research: 147
* Art and Extension:
* Demo and talk at Liberact V conference, NC State, Raleigh, NC 11/19
* Tess-celestial: digital exhibition and interactive web-application 08/18

 <https://ncsu-libraries.github.io/tess-celestial/>

* Sonia Kovalevska Day- speaker 04/18
* Presentation at State of the Sciences: Live!, Raleigh, NC 04/18
* Coffee and Viz, Hunt Library, Raleigh, NC 03/18
* Reboot Number Theory 2017 - Duke University, Durham, NC 07/2017
* Swim lecture at Duke University, Durham, NC 06/17
* NC Science Festival, Raleigh, NC, 04/17
* SPM-EMS-AMS Joint Meeting, Porto, Portugal 06/15
* Perspectives on Art Education, University of Applied Arts, Vienna, Austria 05/15
* NCSU Mathematics of Science, Industry and Culture MoSaIC Festival, Raleigh, NC 03/15
* Visualization – a critical survey of the concept conference at Humboldt-Universität Berlin, Institut für Kunst- und Bildgeschicht, Berlin, Germany 04/14
* Science GEMS, University of Pennsylvania, Philadelphia, PA 2012, 2013
* Bridges: Mathematical Connections in Art, Music and Science, Towson, MD 07/12
* Joint mathematics Meeting, Session on Arts and Mathematics, Boston, MA 01/12
* Math Art Summit, Royal Flemish Academy of Belgium, Brussels, Belgium 05/12
* Knotted Math, Wiskunst, Ghent, Belgium 05/11
* DIMACS Workshop on Algorithmic Mathematical Art, Rutgers, NJ, 05/09
* The International Society for the Interdisciplinary Study of Symmetry Conference, Tihany-Budapest, Hungary 11/04
* Matomium, Museum of African Art Tervuren , Brussels, Belgium 03/02

Exhibitions

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* Permanent exhibitions:
* Roads, triptych, D.H. Hill library, NC State university, Raleigh, NC 2020-
* Institute for Mathematics and Applications, Minneapolis, MN 2014-
* University of Pennsylvania, Philadelphia PA 2013-
* George Washington University, Washington, DC 2010-
* University of Pennsylvania, Philadelphia PA
* Solo exhibitions:
* Liquid State, Raleigh, NC Fall 2019
* 130 Years of the Mathematics Department, Raleigh NC 11/19
* Tess-celestial: digital exhibition and interactive web-application 08/18

<https://ncsu-libraries.github.io/tess-celestial/>

* Arquitectura UPV Donostia-San Sebastián, Spain, July 2013
* ICME Edinburgh, Scotland, July 2012
* Burrisson Gallery, University of Pennsylvania, Philadelphia February 2012
* Royal Flemish Academy of Belgium, Brussels, Belgium May 2010
* Selected group exhibitions and collaborations:
* Women Making (Art) With Math exhibition, Dana art Gallery, Wellesley, MA 12/19
* Eridanus, JMM, Boston 2012
* [Triptique, JMM, New Orelans with the AfterMoon Studio 2011](http://www.ams.org/mathimagery/displayimage.php?pid=384)
* Institut Henri Poincare, Paris, France 2010
* [Tying and untying, JMM, San Francisco 2010 with Victor Stipsic, Marko Vujic.](http://www.bridgesmathart.org/art-exhibits/jmm10/stipsic.html)
* Knotting Mathematics and Art exhibition in the Museum of Science and Industry, Tampa, Florida 2007

Collaborations and extension

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* **All the Possibilities...Reflections on a Painting by Vernon Pratt** Interview for a Documentary movie, co-directed by Marsha Gordonand Louis Cherry, 2019.
* Exploring Math Through Art NC State Think and do video

[https://www.youtube.com/watch?v=ONeeDvlSFU0](Exploring%20Math%20Thorugh%20Art%20NC%20State%20Think%20and%20do%20video%20available%20at%20https%3A/www.youtube.%20com/watch?v=ONeeDvlSFU0)

* Interview for the Girls’ Angle Bulletin, Volume 6, No. 2, 3 2012, 2013
* Cover of the Girls’ Angle Bulletin Vol 6, No. 2 2012
* Girls Angle Women in Mathematics Video Series [http://www.girlsangle.org/](http://www.girlsangle.org/%202010) 2010