

Robert J.S. McDonald – Curriculum Vitae  
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<http://mathrjism.com/>

## Education

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<b>University of Connecticut</b> <i>Doctoral Program in Mathematics</i> Thesis Advisor: Álvaro Lozano-Robledo Thesis Title: <i>Torsion Subgroups of Elliptic Curves over Function Fields</i> Research Interests: algebraic number theory, arithmetic geometry, elliptic curves, Galois representations	<b>Storrs, CT</b> 2013 – 2019
<b>Eastern Connecticut State University</b> <i>Undergraduate Program, B.S. in Mathematics</i>	<b>Willimantic, CT</b> 2006 – 2007, 2011 – 2013
<b>Quinebaug Valley Community College</b> <i>Undergraduate program, A.S. in Engineering Science</i>	<b>Danielson, CT</b> 2008 – 2011

## Honors

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<b>University of Connecticut:</b> Louis J. DeLuca Outstanding Teaching Assistant Award	April 2019
<b>University of Connecticut:</b> Summer Research Fellowship	March 2018
<b>University of Connecticut:</b> Doctoral Dissertation Fellowship	December 2017
<b>University of Connecticut:</b> Connie Strange Graduate Community Award	May 2016

## Teaching Experience

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<b>Yale University</b> <i>Lecturer</i> Fall 2019: Integral Calculus Fall 2019: Multivariable Calculus	<b>New Haven, CT</b> Fall 2019 – Present
<b>University of Connecticut</b> <i>Instructor &amp; Teaching Assistant</i>	<b>Storrs, CT</b> 2013 – Present
<b>Instructor</b> Summer 2015: BRIDGE Calculus Spring 2016: Calculus for Business Fall 2016: Calculus for Business Fall 2017: Calculus for Business Spring 2018: Calculus for Business Fall 2018: Applied Linear Algebra	<b>Teaching Assistant</b> Fall 2013: Calculus II Spring 2014: Calculus II Fall 2014: Calculus II Spring 2015: Calculus I Fall 2015: Calculus II Summer 2016: CTNT Summer School GA Summer 2016: Calculus for Business Spring 2017: Calculus II Summer 2018: CTNT Summer School GA
<b>Eastern Connecticut State University</b> <i>Internship in College Teaching – Geometry</i>	<b>Willimantic, CT</b> Fall 2012

Papers (available at <https://mathrjism.com/#research>)

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**Torsion Subgroups of Elliptic Curves over Function Fields of Genus 0**

(in [Journal of Number Theory Volume 193](#))

**Torsion Subgroups of Elliptic Curves over Function Fields of Genus 1**

(submitted, current draft: <https://mathrjism.com/TorsionFunctionFieldsGenus1.pdf>)

**Talks Given**

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Seminar Talks

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| <b>Torsion of Elliptic Curves over Function Fields of Genus 0 and 1</b><br><i>Five College Number Theory Seminar, Amherst College</i> | March 5, 2019     |
| <b>Torsion Subgroups of Elliptic Curves over Function Fields</b><br><i>Algebra Seminar, University of Connecticut</i>                 | November 28, 2018 |
| <b>Torsion Subgroups of Elliptic Curves over Function Fields</b><br><i>Number Theory Seminar, Boston University</i>                   | December 11, 2017 |
| <b>ABC and Fermat for Polynomials</b><br><i>SIGMA Seminar, University of Connecticut</i>  | April 1, 2017     |
| <b>The Fermat Equation for Polynomials</b><br><i>Undergraduate Math Club Talk, University of Connecticut</i>                          | Spring 2017       |

Conference Talks

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| <b>Torsion Subgroups of Elliptic Curves over Function Fields of Genus 1</b><br><i>AMS Sectional Meeting, Hartford, CT</i>                        | April 14, 2019   |
| <b>Torsion Subgroups of Elliptic Curves over Function Fields</b><br><i>2019 Joint Math Meetings, Baltimore, MD</i>                               | January 19, 2019 |
| <b>Torsion Subgroups of Elliptic Curves over Function Fields</b><br><i>2018 Automorphic Forms Workshop, Tufts University</i>                     | March 20, 2018   |
| <b>Torsion Subgroups of Elliptic Curves over Function Fields of Genus 0</b><br><i>Maine-Québec Number Theory Conference, University of Maine</i> | October 14, 2017 |

**Conferences and Workshops Attended**

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| <b>AMS Sectional Meeting</b><br><i>University of Connecticut Hartford, Hartford, CT</i>                          | April 2019       |
| <b>Northeast Consortium for Quantitative Literacy XXII Meeting</b><br><i>Bay Path University, Longmeadow, MA</i> | March 2019       |
| <b>2019 Joint Math Meetings</b><br><i>Baltimore, MD</i>  | January 2019     |
| <b>Connecticut Summer School in Number Theory (CTNT)</b><br><i>University of Connecticut, Storrs, CT</i>         | May 2018         |
| <b>Automorphic Forms Workshop</b><br><i>Tufts University, Boston, MA</i>   | March 2018       |
| <b>Arizona Winter School: Iwasawa Theory</b><br><i>University of Arizona, Tucson, AZ</i>                         | March 2018       |
| <b>Maine-Québec Number Theory</b><br><i>University of Maine, Orono, ME</i>                                       | October 2017     |
| <b>MSRI Summer School: Automorphic Forms and Langlands Program</b><br><i>MSRI, Berkeley, CA</i>                  | July/August 2017 |

<b>Seventh Upstate New York Number Theory Conference</b> <i>Binghamton University, Binghamton, NY</i>	May 2017
<b>Arizona Winter School: Perfectoid Spaces</b> <i>University of Arizona, Tucson, AZ</i>	March 2017
<b>Connecticut Summer School in Number Theory</b> <i>University of Connecticut, Storrs, CT</i>	August 2016
<b>Arizona Winter School: Arithmetic Geometry</b> <i>University of Arizona, Tucson, AZ</i>	March 2016
<b>BU/Keio University Workshop 2015</b> <i>Boston University, Boston, MA</i>	September 2015
<b>Elliptic Curves @ UConn</b> <i>University of Connecticut, Storrs, CT</i>	May 2014
<b>Advanced Technological Education (ATE) 2013 Conference</b> <i>American Association of Community Colleges, Washington DC</i>	Fall 2013

## Service

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<b>Directed Reading Program, UConn Math Dept.</b> <i>Mentor</i>	Spring 2018 – Spring 2019
<b>Graduate Student Mentor Program, UConn Math Dept.</b> <i>TA Network Coordinator</i>	Summer 2015 – Spring 2019
<i>Mentor</i>	Fall 2014 – Spring 2019
<b>New Teaching Orientation, UConn Math Dept.</b> <i>Speaker</i>	Fall 2014 – Fall 2017
<i>Mentor</i>	Fall 2014 – Fall 2017
<b>Panelist</b>	
Applying to Grad School, Finding an Advisor – <i>CTNT Conference, UConn</i>	June 1, 2018
Fall 2017 Investigations in STEM Forum – <i>Three Rivers Community College</i>	December 4, 2017
Grad Life Q&A – <i>SIGMA Seminar, UConn</i>	February 2, 2017
Choosing a Thesis Advisor – <i>SIGMA Seminar, UConn</i>	April 21, 2016
Studying for Preliminary Exams – <i>SIGMA Seminar, UConn</i>	December 11, 2015
Preparing for Math Graduate School – <i>Math Club, UConn</i>	April 22, 2015
Spring 2014 Investigations in STEM Forum – <i>Quinebaug Valley CC</i>	April 21, 2014
<b>Poster Session, ATE 2013 Conference</b>	October 24, 2013

## References

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**Keith Conrad**, [kconrad@math.uconn.edu](mailto:kconrad@math.uconn.edu)  
**Thomas DeFranco**, [tom.defranco@uconn.edu](mailto:tom.defranco@uconn.edu) (Teaching Reference)  
**Álvaro Lozano-Robledo**, [alvaro.lozano-robledo@uconn.edu](mailto:alvaro.lozano-robledo@uconn.edu)  
**Amit A. Savkar**, [amit.savkar@uconn.edu](mailto:amit.savkar@uconn.edu) (Teaching Reference)  
**Liang Xiao**, [xiaoliangmit@gmail.com](mailto:xiaoliangmit@gmail.com)