Java Darleen Villano

Curriculum vitae

University of Connecticut, Department of Mathematics 341 Mansfield Rd Storrs, CT 06269 \frown +1 (860) 486 8071 \bowtie javavill@uconn.edu \bowtie javavillano.crd.co/

Academic Positions

2019–2025 University of Connecticut, Graduate Student.

Education

2019–2025 **Ph.D. Mathematics**, *University of Connecticut*, Storrs, CT.

Advisors: David Reed Solomon and Damir D. Dzhafarov

2015–2019 **B.A. Mathematics with Logic Minor**, *University of California, Berkeley*, Berkeley, CA.

Research Interests

Branches of computability theory, such as computable structure theory, algorithmic randomness, and reverse mathematics.

Publications

The Ginsburg–Sands theorem and computability theory, *Benham*, *H. et al*, *Advances in Mathematics*, to appear.

Preprints

- 2024 Computable categoricity relative to a c.e. degree, Villano, J.D., submitted.
- 2023 Normality, relativization, and randomness, Calvert, W. et al, submitted.

Conferences Invited To

Summer 2024 **Computable Structure Theory and Interactions**, Technische Universität Wien, Vienna, Austria.

Upcoming - Presentation title: TBA

Spring 2024 **The New England Recursion and Definability Seminar**, Dartmouth College, Hanover, NH.

Upcoming - Presentation title: Computable categoricity relative to a c.e. degree

Spring 2024 **Joint Mathematics Meeting**, AMS Special Session on Computable Mathematics: A Special Session Dedicated to Martin D. Davis, San Francisco, CA.

Presentation title: Computable categoricity relative to a c.e. degree

I received support from the AMS (American Mathematical Society) to attend.

- Spring 2023 A Convergence of Computable Structure Theory, Analysis, and Randomness, BIRS 5-Day Workshop, Banff International Research Station, Banff, Alberta, Canada.
 - I received support from BIRS (Banff International Research Station) to attend.
- Spring 2022 **AMS New England Graduate Student Conference**, Brown University, Providence, RI.

Presentation title: Priority arguments

Conferences Attended

- Spring 2024 **ASL North American Annual Meeting**, Iowa State University, Ames, IA. *Upcoming Presentation title*: Computable categoricity relative to a c.e. degree
- Spring 2024 AMS New England Graduate Student Conference, Brown University, Providence, RI.

 Upcoming Presentation title: Topology in the Reverse Math Zoo
- Spring 2024 17th International Conference on Computability, Complexity, and Randomness, Nagoya University, Nagoya, Japan.

 *Presentation title: Computable categoricity relative to a c.e. degree I received support from the organizers to attend.
- Spring 2023 **Computability and Combinatorics Summer School and Conference**, UConn Hartford, Hartford, CT.
- Spring 2023 Association of Symbolic Logic Winter Meeting at the Joint Mathematics Meeting, Boston, MA.

 I received support from the ASL (Association of Symbolic Logic) to attend.
- Summer 2022 **IMS Graduate Summer School in Logic**, National University of Singapore, Singapore.

I received support from the National University of Singapore to attend.

Seminar Presentations

- Spring 2024 **The Ginsburg–Sands theorem and computability theory**, *SIGMA Seminar*, University of Connecticut, Storrs, CT.
- Spring 2024 **Normality and Randomness**, *SIGMA Seminar*, University of Connecticut, Storrs, CT.
 - Fall 2023 **Randomness and Hausdorff dimension**, *SIGMA Seminar*, University of Connecticut, Storrs, CT.
 - Fall 2023 **Computable categoricity relative to a c.e. degree**, *Connecticut Logic Seminar*, University of Connecticut, Storrs, CT.
 - Fall 2022 When does the existence of an isomorphism imply the existence of a computable isomorphism?, SIGMA Seminar, University of Connecticut, Storrs, CT.

Teaching Experience

2023-2024 Course Instructor for Math 1071Q (Calculus for Business and Economics), *University of Connecticut*, Storrs, CT.

2019-2022 Teacher Assistant, University of Connecticut, Storrs, CT.

- o Fall 2022: Math 1132Q (Calculus II)
- o Spring 2022: Math 1132Q (Calculus II)
- o Fall 2021: Math 1131Q (Calculus I)
- o Spring 2021: Math 1132Q (Calculus II)
- o Fall 2020: Math 1132Q (Calculus II)
- Spring 2020: Math 1132Q (Calculus II)
- o Fall 2019: Math 1131Q (Calculus II)

Outreach

2022-2024 President of the UConn Chapter of the Association of Women in Mathematics, *University of Connecticut*, Storrs, CT.

Fall 2022 **Speaker at the Mathematics Continued Conference**, *University of Connecticut*, Storrs, CT.

The Mathematics Continued Conference seeks to give undergraduate students interested in math an opportunity to learn about graduate school and current research done by graduate students and faculty.

Summer 2020 **Course Tutor for SSS Math Program**, *University of Connecticut*, Storrs, CT. Student Support Services (SSS) is a federally funded program at UConn which serves incoming students who are first-generation to college and/or come from communities underserved in higher education.

Languages

English Advanced proficiency in reading, writing, and speaking Second language learned, learned in 2003

Tagalog Intermediate proficiency in reading, writing, and speaking

Native language