# Nathaniel A. Throckmorton, Ph.D.

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## **CURRENT POSITION**

Associate Professor, William & Mary Fall 2020–Present

### **EDUCATION**

Ph.D. Economics, Indiana University

M.A. Economics, Indiana University

B.S. Mathematics and Economics, University of Wisconsin–Stevens Point

May 2006

#### Refereed Publications

- 1. "The Matching Function and Nonlinear Business Cycles" with Joshua Bernstein and Alex Richter, *Journal of Money, Credit, and Banking*, forthcoming
- 2. "A Simple Explanation of Countercyclical Uncertainty" with Joshua Bernstein, Mike Plante, and Alex Richter, *American Economic Journal: Macroeconomics*, October 2024, Volume 16(4), Pages 143-171
- 3. "Valuation Risk Revalued" with Oliver de Groot and Alex Richter, *Quantitative Economics*, May 2022, Volume 13, Pages 723-759
- 4. "Complementarity and Macroeconomic Uncertainty" with Tyler Atkinson, Mike Plante, and Alex Richter, *Review of Economic Dynamics*, April 2022, Volume 44, Pages 225-243
- 5. "Cyclical Net Entry and Exit" with Joshua Bernstein and Alex Richter, *European Economic Review*, July 2021, Volume 136
- 6. "The Zero Lower Bound and Estimation Accuracy" with Tyler Atkinson and Alex Richter, *Journal of Monetary Economics*, November 2020, Volume 115, Pages 249-264
- 7. "Uncertainty Shocks in a Model of Effective Demand: Comment" with Oliver de Groot and Alex Richter, *Econometrica*, July 2018, Volume 86, Pages 1513-1526
- 8. "The Zero Lower Bound and Endogenous Uncertainty" with Mike Plante and Alex Richter, *Economic Journal*, June 2018, Volume 128, Pages 1730-1757
- 9. "Forward Guidance and the State of the Economy" with Ben Keen and Alex Richter, *Economic Inquiry*, October 2017, Volume 55, Pages 1593–1624
- 10. "Is Rotemberg Pricing Justified by Macro Data?" with Alex Richter, *Economics Letters*, December 2016, Volume 149, Pages 44-48
- 11. "The Consequences of an Unknown Debt Target" with Alex Richter, European Economic Review, August 2015, Volume 78, Pages 76-96
- 12. "The Zero Lower Bound, the Dual Mandate, and Unconventional Dynamics" with Bill Gavin, Ben Keen, and Alex Richter, *Journal of Economic Dynamics and Control*, June 2015, Volume 55, Pages 14-38
- 13. "The Zero Lower Bound: Frequency, Duration, and Numerical Convergence" with Alex Richter, *The B.E. Journal of Macroeconomics*, January 2015, Volume 15, Pages 157-182
- 14. "Accuracy, Speed and Robustness of Policy Function Iteration" with Alex Richter and Todd Walker, *Computational Economics*, December 2014, Volume 44, Pages 445-476

March 2025

# OTHER PUBLICATIONS

"Job vacancy, unemployment relationship clouds 'soft landing' prospects" with Alex Richter, *Dallas Fed Economics*, February 2023

"Entry, Exit of Firms Amplify the Business Cycle" with Joshua Bernstein and Alex Richter, *Dallas Fed Economics*, July 2020

"The Production Process Drives Fluctuations in Output and Uncertainty" with Tyler Atkinson, Mike Plante, and Alex Richter, *Dallas Fed Economics*, June 2020

"COVID-19's Unprecedented Impact Alters U.S. Labor Market" with Joshua Bernstein and Alex Richter, *Dallas Fed Economics*, June 2020

"Fed's Effective Lower Bound Constraint on Monetary Policy Created Uncertainty" with Mike Plante and Alex Richter, *Economic Letter*, November 2017, Volume 12, Number 11

### WORKING PAPERS

"COVID-19: A View from the Labor Market" with Joshua Bernstein and Alex Richter

"The Business Cycle Mechanics of Search and Matching Models" with Joshua Bernstein and Alex Richter

"A New Way to Quantify the Effect of Uncertainty" with Alex Richter

"Are Nonlinear Methods Necessary at the Zero Lower Bound?" with Alex Richter

"Income Inequality and Current Account Imbalances" with Michael Kumhof, Claire Lebarz, Romain Ranciere, and Alex Richter

## Works in Progress

"Is Low Fertility in East Asia Inflationary? A Fiscal Limit Perspective" with Hyunduk Suh

"Nonlinear Macro" with Jawand Singh and Stephen Vasiljevic (https://github.com/nathrock/nonlinear-macro)

"Macroecon-Tools" with Jawand Singh (https://pypi.org/project/macroecon-tools/)

"QE Transmission: Spend More or Work Less" with Ronald Mau and Alex Richter

### TEACHING EXPERIENCE

William & Mary: Time Series Econometrics (Spring 2025), Intermediate Macro (Fall 2014–Spring 2020, Fall 2021–Spring 2023, Spring 2024, Spring 2025), Advanced Macro (Fall 2017, Fall 2019, Spring 2022, Spring 2023, Spring 2024), Macro Capstone (Spring 2019, Fall 2021, Fall 2023), International Macro (Fall 2014, Fall 2023), Independent Study (Spring 2015, Spring 2017, Spring 2020, Summer 2022)

**Society for Computational Economics:** An Introduction to Nonlinear Solution and Estimation Techniques (June 2022)

Bank of Japan: Nonlinear Solution and Estimation Methods Mini-course (March 2018)

University of St Andrews: Nonlinear Solution and Estimation Methods Mini-course (March 2017)

**DePauw University:** Statistics (Spring 2014), Introduction to Economics (Fall 2013, Spring 2014), Money and Banking (Fall 2013)

Auburn University: Money and Banking (Summer 2013)

**Indiana University:** Money and Banking (Fall 2012, Spring 2013), Intermediate Macro (Summer 2012), Policy Function Iteration Mini-course (with Alex Richter, March 2012), Intro to Macro (Fall 2010), Intro to Micro (Spring 2010/2011/2012), MATLAB for Economists Mini-course (August 2010)

# Previous Positions

Assistant Professor, William & Mary, Economics Department	Fall 2014–Spring 2020
Visiting Assistant Professor, DePauw University, Economics Department	t Spring 2014
Visiting Instructor, DePauw University, Economics Department	Fall 2013
Visiting Scholar, Federal Reserve Bank of St. Louis	July 2013
Visiting Instructor, Auburn University, Economics Department	Summer 2013
Associate Instructor, Indiana University, Economics Department	Spring 2010–Spring 2013
Visiting Economist, U.S. Congress, The Joint Committee on Taxation	AugDec. 2011 and Aug. 2012
Research Assistant, Indiana University, Economics Department Eric Leeper, Todd Walker, and George von Furstenberg	Summers 2010, 2011, and 2012
Teaching Assistant, Indiana University, Economics Department	Fall 2008–Fall 2009
Marketing Analyst, Renaissance Learning, Inc.	July 2006–July 2008
Research Assistant, UW-Stevens Point, Mathematics Department	Summer 2005
Research Assistant, Central Wisconsin Economic Research Bureau	June 2003–August 2005

### Professional Service

Editorial Board: Computational Economics (2023-Present)

**Advisory Council:** Society for Computational Economics (2022-Present)

**Program Committee:** Midwest Macroeconomics Meeting (Spring 2024); Annual Symposium of the Society for Nonlinear Dynamics & Econometrics (SNDE 2018, 2019, 2022, 2023); International Conference of Computing in Economics and Finance (CEF 2021, 2022)

Referee Service: Review of Economic Studies; AEJ: Economic Policy; Review of Economics and Statistics; Journal of Monetary Economics; Journal of the European Economic Association; Economic Journal; Review of Economic Dynamics; Journal of Money, Credit and Banking; Journal of Applied Econometrics; European Economic Review; Journal of Business & Economic Statistics; Journal of Economic Dynamics & Control; Economics Bulletin; International Journal of Central Banking; Economics Letters; Economic Modelling; Economic Inquiry; Oxford Bulletin of Economics and Statistics; Journal of Macroeconomics; Macroeconomic Dynamics; Economic Theory; International Finance; Studies in Nonlinear Dynamics & Econometrics; Computational Economics; The Oxford Handbook of Computational Economics and Finance; Applied Economics; LABOUR

Member: American Economic Assoc., Econometric Society, SNDE, Society for Computational Econ.

# Grants, Fellowships, and Awards

Faculty Grant, William & Mary, Arts & Sciences	Fall 2024–Spring 2025
Open Access Funding (\$3,620), William & Mary, Libraries	Fall 2023
Tang Associate Fellowship, William & Mary, Economics Department	Fall 2021–Spring 2024
Coco Faculty Fellowship, William & Mary, Arts & Sciences	Fall 2020–Spring 2021
Travel Grant (\$2,700) Univ. of Tokyo, Center for International Research on the Japanese Economy	Summer 2019
International Travel Grant (\$500) William & Mary, Reves Center for International Studies Fall 2014,	Spring 2018, Summer 2019
Tang Assistant Fellowship, William & Mary, Economics Department	Fall 2017–Summer 2018
Research Computing Allocation (\$24,374) Extreme Science and Engineering Discovery Environment (XSEDE)	July 2017-June 2018
Seminar Development Grant, William & Mary, Economics Department	Summer 2017
Summer Research Award, William & Mary, Arts & Sciences	Summers 2015 and 2017

W. Phillip Saunders Award for Best Associate Instructor
Indiana Univ., Economics Department

Graduate Fellowship, Indiana Univ., Economics Department

Fall 2008–Spring 2013

Kenneth W. Boylan Scholarship, UW–Stevens Point, Mathematics Department

Fall 2005

Distinguished Student Award, UW–Stevens Point, College of Letters and Science

Spring 2005

John C. Seramur Scholarship, UW–Stevens Point, Division of Business and Economics

Spring 2005

#### Research Presentations

**2023:** Computing in Econ. and Finance, Université Côte d'Azur; Seminar, Virginia Commonwealth Univ.; Spring Macro Workshop, North Carolina State Univ.

**2022:** Liberal Arts Macro Workshop, Middlebury College; Computing in Econ. and Finance, Southern Methodist Univ.; Midwest Macro, Utah State Univ.; Brownbag Lunch Talk, Bank of Canada; SNDE, Virtual

**2021:** Southern Econ. Assoc., Houston; Seminar, UNC–Chapel Hill; Liberal Arts Macro Workshop, Univ. of Richmond; Society for Economic Dynamics, Univ. of Minnesota; Intl. Assoc. for Applied Econometrics, Erasmus School of Economics; Computing in Econ. and Finance, Keio Univ.

2020: Seminar, Bank of Finland

**2019:** SNDE, Dallas Fed; Seminar, Univ. of Tokyo; Seminar, Keio Univ.; Computing in Econ. and Finance, Carleton Univ.; Seminar, Univ. of Washington

**2018:** Midwest Macro, Vanderbilt Univ.; SITE: Asset Pricing Theory and Computation, Stanford Univ.; Society for Economic Dynamics, ITAM, Mexico City; Seminar, Richmond Fed

**2017:** Liberal Arts Macro Workshop, Davidson College; Computing in Econ. and Finance, Fordham Univ.; CEPR Macro Modeling and Model Comparison Network, Goethe Univ. Frankfurt; Seminar, NC State Univ.; Seminar, Univ. of Glasgow; Seminar, Univ. of St Andrews

2016: Midwest Macro, Kansas City Fed; American Econ. Assoc., San Francisco

**2015:** Quantitative Macro Workshop, Reserve Bank of Australia; Southern Econ. Assoc., New Orleans; Computing in Econ. and Finance, Taipei; Georgetown Center for Econ. Research Biennial Conf., Washington, D.C.; Midwest Macro, Washington Univ.; Seminar, William & Mary

**2014:** Southern Econ. Assoc., Atlanta; Seminar, Dallas Fed; Dynare Conf., Bank of France; Seminar, Richmond Fed; Western Econ. Assoc. Intl., Denver; Computing in Econ. and Finance, Oslo; Midwest Macro, Univ. of Missouri; Midwest Econ. Assoc., Evanston; Seminar, Bentley Univ.; Seminar, Federal Reserve Board; Seminar, William & Mary; Seminar, Carleton College; Seminar, Wesleyan Univ.

**2013:** Southern Econ. Assoc., Tampa; Seminar, St. Louis Fed; Computing in Econ. and Finance, Vancouver; Seminar, Atlanta Fed; Jordan River Conf., Indiana Univ.; Midwest Econ. Assoc., Columbus

2012: Midwest Macro, Univ. of Notre Dame

2011: Jordan River Conf., Indiana Univ.

### Public Talks

"Nonlinear Macroeconomics", Economics Club, William & Mary

"COVID-19 and the U.S. Economy: A Booster Shot"

Osher Lifelong Learning Institute at William & Mary

"COVID-19 and the U.S. Economy"

Osher Lifelong Learning Institute at William & Mary

November 19, 2020

"Mathematics and Macroeconomics", UW–Stevens Point

November 5, 2020

### MEDIA APPEARANCES

"What the end of the penny means for the economy, your piggy bank, and the way America prices items" by Kevin Williams for *CNBC: The Bottom Line* (2025)

"What's really to blame for inflation? Hampton Roads economists name 3 causes." by Preston Steger for 13News Now, WVEC (2022)

"Pandemic Pockets: Why Work?" by Sarah McConnell for With Good Reason (2021)

"When your research gets really computational, head for W&M's giant abacus" by Joseph McClain for Williamsburg Yorktown Daily (2019)

"When interest rates hit the zero lower bound: a discussion on uncertainty" by Helena Vieira for *LSE Business Review* (2018)

### Advising Experience

Honors Thesis Advisor, Economics Department, William & Mary

Emily Martell, "Comparison of Global Solution Methods to a ZLB Model" Summer 2018–Spring 2019

Student/Faculty Research Grant Advisor

Economics Department, William & Mary Summers 2015, 2017, and 2018

Honors Thesis Advisor, CAMS, William & Mary

Darwin Chen, "Interactions between Fiscal and Monetary Policies" Summer 2016–Spring 2017 Economics Major Advisor, Economics Department, William & Mary Fall 2015–Present

# OTHER SERVICE

Advisor, St Andrews William & Mary Joint Degree Programme	Spring 2025
Chair, Admissions Policy Advisory Committee, William & Mary	Spring 2025
Advisor, College Fed Challenge Team, William & Mary	Summer 2024–Present
Member, Search Committee, Global Research Institute, William & Mary	Spring 2025
Reviewer, Gaither Junior Fellows Program Application, William & Mary	Fall 2023–Fall 2024
Member, Admissions Policy Advisory Committee, William & Mary	Fall 2023–Spring 2024
Advisor, Freshman and Transfer Students, Arts & Sciences, William & Mary	Fall 2016–Present
Chair, Search Committee, Economics Department, William & Mary	Fall 2022
Chair, Sustainability: Carbon Working Group, William & Mary	Fall 2021–Fall 2022
Chair, Sustainability: Carbon Credits Working Group, William & Mary	Fall 2019–Spring 2020
Member, Search Committee, Economics Department, William & Mary	Falls 2016, 2017, 2018, 2019
Advisor, Sustainability: Tribe Carbon Fund Faculty, William & Mary	2019
Coordinator, Economics Seminar, Economics Department, William & Mary	2019
Member, Sustainability: Energy & Emissions Working Group, William & Mattheward Member, Sustainability: Energy & Emissions Working Group, William & Mattheward Member, Sustainability: The State of the	ary Spring 2018