#### Curriculum vitae

### **DONALD THOMAS HORNSTEIN**

(W) (919) 962-4133 dhornste@email.unc.edu

# **EMPLOYMENT**

Primary academic appointments

### AUBREY L. BROOKS PROFESSOR OF LAW, UNC

July 2005-present

#### Special Academic Honors (Service and Teaching):

2018 UNC Pro Bono Publico Faculty Member of the Year

2014 UNC Law Faculty Award for Public Service

Featured in "What the Best Law Teachers Do," Harvard University Press (2013)

Recipient of three University-wide Teaching Awards: The James M. Johnston Teaching Excellence Award (2012); The William C. Friday Award for Excellence in Teaching (April 2010)(both for undergraduate teaching); and The Distinguished Teaching Award for Post-Baccalaureate Instruction (April 1999)

Eight-Time Recipient of the Frederick B. McCall for Teaching Excellence at the Law School, in 2012, 2008, 2005, 2003, 2001, 2000, 1999 & 1989

#### Special Academic Honors (Academics/Research)

Twice Recognized for National Top 10 Law Review Articles on Environmental Law Recipient of 1-Year Fulbright Award (East Africa)

Reef Ivey II Research Professor of law	1993-2005
Associate Professor of Law	1989- 1993
Visiting Associate Professor of Law	1987 -1989

# Secondary, administrative, and courtesy academic appointments

ASSOCIATE DEAN FOR FACULTY, UNC LAW SCHOOL	1994-1996
FULBRIGHT SENIOR LECTURER IN LAW	1996-1997

University of Asmara, Eritrea (Africa)

SENIOR LECTURER, DUKE LAW SCHOOL
SENIOR LECTURER, Nicholas School of Environment, DUKE
2002, 2004, 2005, 2006
2012-2015; 2017

FACULTY MEMBER, UNC CURRICULUM IN THE ENVIRONMENT

AND ECOLOGY (UNC College of Arts & Sciences) 2008-present

# Legal, non-academic positions

ASSOCIATE, ARNOLD & PORTER. Washington, DC.	1985 - 198
APPELLATE ATTORNEY, U.S. DEP'T OF JUSTICE	1983 - 1985
Environment & Natural Passurass Division, Washington, D.C.	

Environment & Natural Resources Division, Washington, D.C.

LAW CLERK, Judge Abner Mikva 1982 - 1983

U.S. Court of Appeals, Washington, D.C.

# SIGNIFICANT ADMINISTRATIVE SERVICE

Member &/or Chair, Numerous Law School Committees

State of North Carolina  (Re)Appointed by NC Insurance Commissioner Mike Causey to One-Year Terms, Board of Directors, North Carolina Insurance Underwriting Association/NC Coastal Wind Pool (Re)Appointed by NC Insurance Commissioner Wayne Goodwin to	2017, 2018
One-Year Terms, Board of Directors, NC Coastal Wind Pool,	2016 2010
North Carolina's \$400-\$500-million residual coastal property insurer Chair, Mitigation Sub-Committee, NC Coastal Wind Pool	2016-2010 2015-2019
Appointed by Then-Speaker (NC House), Joe Hackney, to Special Legislative Study Commission on Hurricane Insurance in	
North Carolina, NC General Assembly	2008-2009
University	
(Re-)Appointed by Chancellor Carol Folt as Chair, University	
Scholarship, Awards, and Financial Aid Committee	2015-2019
Appointed by Provost James Dean as Chair, Provost's	
Task Force on the Environment	2015
Appointed by Provost James Dean to UNC MOOC Task Force	2014
Appointed by Chancellor Holden Thorpe as Chair,	2012 2014
University Scholarship, Awards, and Financial Aid Committee	2013-2014
Appointed by Chancellor, University "Water-Theme" Committee	2012
Appointed by Provost to UNC Academic Plan Implementation Committee	2012
Appointed by Provost, UNC Academic Plan Subcommittee 1	2012
Appointed by Provost, Enrollment Excellent Task Force &	2010
Enrollment Excellence Implementation Committees	2007-2007
Member, University's Scholarship Committee	2008-2013
Appointed by Chancellor James Moeser as Chair,	2000 2013
Chancellor's Labor Licensing CodeAdvisory Committee (LLCAC)	2008
Member, Chancellor's LLCAC	1998-2008
Member, UNC Environmental Curriculum Committee	2007
(Reporting to Then-Dean of College Holden Thorp)	
Chair, University Teaching Awards Subcommittee	2006-2007
On Lifelong Mentoring	
Member, Chancellor's Faculty Advisory Committee,	1997-2004
Carolina Environmental Program	
Member, Chancellor's "Vision" Committee	1995-1996
Delegate, UNC Faculty Council	Spring 1995, 2017
Law School	
Overall Faculty Advisor, Holderness Moot Court	2007-present
Chair, Faculty Speakers Committee	2015-2016; 2009-2011
Chair, Taft Professor Search Committee, UNC Law School	2007
Chair, International Committee, UNC Law School	2006
Chair, Academic Affairs Committee, UNC Law School	2005
Chair, Dean's Special Committee on Masters of Law Degree	2004
Associate Dean for Faculty	1994-1996

1993-2019

# **EDUCATION**

UNIVERSITY OF OREGON

J.D. 1981

School of Law Eugene, Oregon

Honors: Editor-in-Chief, Oregon Law Review

Order of the Coif

Certificate, Ocean & Coastal Law Program

UNIVERSITY OF CALIFORNIA, LOS ANGELES

B.A. 1972

Los Angeles, California

Honors: Magna cum laude

Special Distinction in History 1971 National Intercollegiate Debating Champion

# **PUBLICATIONS**

#### **BOOKS**

Environmental Law & Policy: A Casebook (Sept. 2013) (Univ. of N.C. Press)

#### **ELECTRONIC BOOKS/COURSES**

An Introduction to Environmental Law, Coursera Massive Open Online Course, https://www.coursera.org/learn/environmental-law (free enrollment required)(2013). Introductory Video (no enrollment required, produced by Charles Story), at https://www.youtube.com/watch?v=7IINB8a8jAE. 20,000-50,000 students worldwide.

### **ARTICLES**

Donald T. Hornstein, *Resiliency Rising: Changes in the Law and Economics of Natural Disasters* (2018-2019) (in prep)

Donald T. Hornstein, Resiliency and Ratemaking: Public Utilities and Natural Disasters (2018-2019) (in prep)

Donald T. Hornstein, *Lessons From U.S. Coastal Wind Pools About Climate Finance and Politics*, 43 Boston College Environmental Affairs Law Review 345 (Winter 2016/2017)

Donald T. Hornstein, *The Insurance Industry on the Cusp of COP 21: Lessons From Flood Insurance Reform in the US and UK* (Fall 2015), in <u>Future Directions of Consumer Flood Insurance in the UK: Reflections Upon the Creation of Flood Re</u> (Johanna Hjalmarsson, ed), <a href="https://www.southampton.ac.uk/assets/imported/transforms/content">https://www.southampton.ac.uk/assets/imported/transforms/content</a> <a href="block/UsefulDownloads">block/UsefulDownloads</a> <a href="Download/5833464F560E457BBB32BE07A53B9419/58175">Downloads</a> <a href="Download/5833464F560E457BBB32BE07A53B9419/58175">Downloads</a> <a href="Download/5833464F560E457BBB32BE07A53B9419/58175">Downloads</a> <a href="Download/5833464F560E457BBB32BE07A53B9419/58175">Downloads</a> <a href="Download/5833464F560E457BBB32BE07A53B9419/58175">Downloads</a> <a href="Download/5833464F560E457BBB32BE07A53B9419/58175">Downloads</a> <a href="Download/5833464F560E457BBB32BE07A53B9419/58175">Download/5833464F560E457BBB32BE07A53B9419/58175</a> <a href="Report\_v4\_WEB.pdf">Report\_v4\_WEB.pdf</a>

Donald T. Hornstein, Insurance at the Energy-Water Nexus, 48 U. Rich. L. Rev. 1033 (2014).

Donald T. Hornstein, *The Balkanization of CAT Property Insurance: Financing and Fragmentation in Storm Risks*, 11 Rutgers J. Law & Pol'y 9 (2013)

Donald T. Hornstein, *Resiliency, Adaptation and The Surprising Upsides of Ex Post Facto Lawmaking*, 89 N.C. L. Rev. 1549 (2011)

Donald T. Hornstein, *The Environmental Role of Agriculture in an Era of Carbon Caps*, 20 Health Matrix: Journal of Law and Medicine 145 (2010)

- Donald T. Hornstein, *The Road Also Taken: Lessons From Organic Agriculture for Market-And Risk-Based Regulation*, 56 Duke L. Journal 1541 (2007)
- Donald T. Hornstein, *The Data Wars, Adaptive Management, and the Irony of "Sound Science"*In <u>Rescuing Science From Politics</u>, Wendy E. Wagner, ed. (Cambridge University Press) (Summer 2006)
- Donald T. Hornstein, *Complexity Theory, Adaptation, and Administrative Law,* 54 Duke L. Journal. 100 (2005)(selected among 10 best published environmental law articles in 2006)
- Donald T. Hornstein, *Rescuing Science From Politics*, in <u>A New Progressive Agenda for Public Health and the Environment</u>, Christopher H. Schroeder & Rena Steinzor, Eds., Carolina Academic Press, 2005
- Donald T. Hornstein, Accounting for Science: The Independence of Public Research in the New, Subterranean Administrative Law, 66 Law & Contemporary Problems 227 (2003)
- Donald T. Hornstein, From Beef to Bove: Are Cultural Preferences in International Trade Legitimate?, In Global View (UNC University Center for International Studies ed., Spring 2001)
- Donald T. Hornstein, Environmental Sustainability and Environmental Justice at the International Level: Traces of Tension And Traces of Synergy, 10 Duke Envt'l Law & Policy Forum 168 (Spring 1999)
- Donald T. Hornstein, *Self-Interest, Politics, and the Environment: A Response to Professor Schroeder*, 9 Duke Envt'l Law & Policy Forum 61 (Fall 1998)
- Donald T. Hornstein, *Paradigms, Process, and Politics: Risk and Regulatory Design,* in Priority Setting And The National Social Agenda (Resources for the Future, 1994)
- Donald T. Hornstein, Lessons from Federal Pesticide Regulation on the Paradigms and Politics of Environmental Law Reform, 10 Yale Journal on Regulation 369-446 (1993)
- Donald T. Hornstein, *Reclaiming Environmental Law: A Normative Critique of Comparative Risk Analysis*, 92 Columbia Law Review 562-633 (1992)
- Donald T. Hornstein, Comment, Indian Fishing Rights Return to Spawn: Toward Environmental Protection of Treaty Fisheries, 61 Oregon Law Review 93 (1982)

# **REPORTS**

- Donald T. Hornstein, *The Environment@Carolina: A Report to Executive Vice Chancellor and Provost James Dean*, The Provost's Task Force on the Environment (Dec. 2015)
- Donald T. Hornstein, Douglas A. Kysar, Thomas O. McGarity, Sidney A. Shipiro, Special Report, Hurricane Katrina, Broken Levees: Why They Failed, Ctr. for Progressive Reform (Sept. 2005)
- Donald T. Hornstein, Report to the Office of Technology Assessment, U.S. Congress, Exploring the Synopticism/Incrementalism Frontier: The Role of Innovation and Experimentation in the Federal Clean Air Act, Clean Water Act, and Resource Conservation and Recovery Act (July 1994)

Donald T. Hornstein, Report to the Administrative Conference of the United States, Regulating Pesticides: FIFRA Registration, Reregistration, Suspension, & Cancellation Procedures (1993)

### OTHER PUBLICATIONS/MOST RECENT SELECTED MEDIA EXPOSURE

Minnesota Public Radio (in-depth interview on disaster insurance) Jan. 10, 2018 National Public Radio (Marketplace)(interview on climate insurance) Jan. 1, 2018 New York Times (article on disasters and insurance companies), Dec. 11, 2017

"Best Bet For the Beach Plan," Editorial Co-Authored with UNC Law Graduate Daniel Peterson, and run numerous times/place in July/August 2009 during legislative debate on House Bill 1305, including the Raleigh News & Oberver, Winston-Salem Journal, and Asheville Citizen-Times

Donald T. Hornstein, *Written Statement on Comparative Risk analysis in the States*, in Testimony before the Subcommittee on Technology, Environment, and Aviation, Committee on Science, Space & Technology, U.S. House of Representatives, Washington, D.C. (February 3, 1994)

# (Selected) INVITED PRESENTATIONS

"Integrating Insurance, Resilience, and Mitigation," (July 20, 2018) (Day-Long Presentations to Staff and Interns, NC Insurance Underwriting Association, Cary, NC)

"National Disaster Financing," SPOTLIGHT presentation to UNC Law Alumnae, Troutman Sanders Law Firm (June 2018)

"Modeling Resilience for Insurers," Kings College/UNC Department of Geography Climate Seminar (April 16, 2018)(UNC)

"Insurance, Risk, Reinsurance, and Catastrophe Bonds," presentation to Prof. Greg Chacklis' Graduate Class in Environmental Risk Analysis, UNC School of Public Health (March 28, 2018)

"Resilience and Insurance," MIT Resilience Executive Education for ARUP Corporation, Cambridge, Mass (March 21, 2018).

"Weather Catastrophes and NCIUA Financing," Presentation to Professor Gavin Smith's Disaster Management Graduate Class, UNC School of City & Regional Planning (Sept. 27, 2017)

"Insurance and Resiliency: The Mitigation Finance Connection." Keynote Noontime Address to Southeast Regulatory Association Annual Conference, Asheville, NC (April 24, 2017)

Keynote Address, *The Role of Insurers in Loss Mitigation – Lessons from Health, Automobile, and Property Insurance,* Chartered Property Casualty Underwriter, North Carolina Annual Meeting, NC State University, Raleigh, NC (March 2, 2017)

"Update on the National Flood Insurance Program," Shape of the Coast Symposium, UNC School of Law Festival of Legal Learning (Feb. 10, 2017).

"Insurance and the Physical Resiliency Frontier," Presentation at the World Bank, Washington, D.C. (Jan. 6, 2017)

"The Reinsurance Finance/Mitigation Link," Presentation at the Office of Management and Budget, The White House, Washington, D.C. (Jan. 5, 2017).

"Opening Address, Insurance and Maritime Risk," UNC Center on Coastal Resiliency Maritime Risk Symposium, UNC (Nov. 14, 2016)

"Climate Risk, Insurance, and Reinsurance," Carolinas Climate Resilience Conference, Charlotte, NC (Sept. 14, 2016)

"Climate Change and How Insurance Saves the World, Or Doesn't," Keynote Address, Annual Meeting, NC Chartered Property & Casualty Underwriters Ass'n, (scheduled for March 23, 2016)

"Diversity and the Role of the UNC Scholarship, Awards, and Financial Aid Program," Panel Presentation, FAC Diversity/Community Comm. Mtg., UNC, (Feb. 2, 2016)

"The Role of the Curriculum in Toxicology in UNC's Newest, Campus-Wide Environmental Initiative, The Environment@Carolina," Annual Retreat, Curriculum in Toxicology, Friday Center, UNC (Jan 8, 2016)

"Connecting International Insurance-Linked Securities Financing to Water Hedging Products in Power Plant Resilience," 1-hour workshop presentation to Characklis Lab, UNC (Dec. 4, 2015)

"The Financing of State Residual Wind Pools," 1-hour presentation at Symposium, Who Will Pay? - The Public and Private Insurance Implications of Climate Change's Drastic Challenges, Boston College Law School (Nov. 4, 2015)

"Climate Change and Silent Sam," Annual UNC University Day Kemp Plummer Battle Lecture, UNC Dialectic & Philanthropic Societies (Oct. 13, 2015)

"Reinventing the 21st Century Research University Through The Environment@Carolina, UNC's Major, Cross-Campus Environmental Initiative," 1 1/2-hour presentation to the Board of Visitors, UNC Institute for the Environment (Oct. 2, 2015)

"The Role of Climate Research in UNC's Newest, Campus-Wide Environmental Initiative, The Environment@Carolina," 1-hour keynote address to the Carolina Climate Change Scientists (Sept. 29, 2015)

"Climate Change, International Finance, and Insurance -- Part of the Problem or Part of the Solution," Invited Keynote Presentation, University of Southampton, UK (August 26, 2015)

"Comparing the U.S. and U.K. Approaches to Flood Insurance," Invited 1-Hour Panel Presentation, Quadrant House, Middle Temple, London, UK (August 25, 2015)

"Financing the North Carolina Coastal Wind Pool," 1-Hour Presentation to ENVR 890, Graduate Seminar in Managing Environmental Financial Risk, UNC Department of Environmental Sciences & Engineering (April 15, 2015)

"Disconnect of Climate Risk Data with Insurance and Reinsurance," presentation at a two-day conference held by the Center for Law, Environment, Adaptation & Resources on Private Property, Information Disclosure, and the Roles of Insurance and Government (March 19, 2015)

"Financing Storm Mitigation the Same Way We Finance Third-Party Solar-Energy Installations," Presentation at the NC Clean Tech Summit, 2-Day Conference at the UNC Friday Center (Feb. 19-20, 2015)

"Climate Change Adaptation and Insurance: The Surprising \$100-Billion Place Where the Rubber Meets the Road in Climate Change Economics and Politics, 2-Hour General Public Presentation as part of Friday Center's, "What's the Big Idea" Series (Oct. 9, 2014)

"Insurance Finance and Insurance-As-Governance: Lessons From Catastrophe Insurance," UNC Law School Faculty Seminar (April 11, 2014)

"MOOCs and the Future of University Teaching: Turning Down the Hype," 45-Minute Panel Presentation, UNC Graham Memorial Hall (Oct. 1, 2013)

"Water Issues in North Carolina," UNC Incoming Public Policy Scholars Orientation (August 2013)

- "The Balkanization of CAT Property Insurance," Rutgers Insurance Law Symposium (March 2013)
- "Drinking Water as a Human Right" Keynote Speaker, Engineers Without Borders Annual Banquet, UNC Chapter (January 2013)
- "Financing Fat Tails: The Economics of Reinsurance and CAT Bonds in Catastrophe Financing," Insurance Law Faculty Workshop, Rutgers Center for Risk (October 2012)
- "Commencement Address," 2011 Commencement Ceremony for the UNC Curriculum in Environment and Ecology (May 2011)
- "Relationship Between Coastal Insurance and Mitigation Measures," NC State Legislature, Legislative Study Commission, Winter 2008-2009
- "Confronting Moral Hazard in Hurricane Insurance Design: The Case of Incentivizing Mitigation," Presentation at the Annual Meeting, Society of Risk Analysis, Boston, Mass (December 2008)
- "Insurance, Financing, and Natural Disasters," Duke Law School Work-in-Progress Workshop (May 2008)
- "When We Get It Right," May 2008, Commencement Address to UNC Law School graduating class of 2008, upon receiving the 2008 McCall Outstanding Faculty Award
- "Economic Approaches to Mitigating Climate Change," NC Climate Summit, NC School of Science and Mathematics (April 2008)
- "Climate Change: Scientific, Legislative, and International Developments," February 2008, 10<sup>th</sup> Annual Environmental Law Symposium, Continuing Education Program, Friday Center
- "Risk Assessment: The Intersection Between Environmental Justice and the Law of Risk Assessment," February 2007, Environmental Justice Speaker Series, Lewis & Clark Law School, Portland, Oregon (Podcast)
- "Economic Instruments in Environmental Law," February 2007, 9th Annual Environmental Law Symposium, Continuing Education Program, Friday Center
- "Symposium on the Regulation of Food: Organic Agriculture and the Architecture of Risk Assessment," November 2006, Duke Law Journal Annual Administrative Law Symposium
- "Cellular Automata and Complexity Theory," Presentation to Triangle Complexity Group, UNC Fall 2006
- "Collaborative Natural Resources Management in an Adversarial Landscape: Adaptive Management and the New Federal Data Amendments," April 2005, Duke Law School
- "Genetic Algorithms and Their Application to Complex Legal Systems," November 2005, Duke Law Journal Annual Administrative Law Symposium
- "Collective Action: Prisoner's Dilemma or Assurance Games," Third Annual Cummings Colloquium On Environmental Law, Duke Law School, March 25-26 1998
- "Conflict and Cooperation over International Watercourses: The Case of the Nile River," Feb 25, 1998, Natural Resources and Environmental Law Advanced Seminar, Stanford Law School, California
- "Conflict and Cooperation Over International Watercourses," Feb. 26, 1998, Institute for International

- Studies, Stanford University, California
- "Renegotiating the Nile," Feb. 19, 1998, Brown Bag Seminar, Duke Environmental Law Society, Duke Law School
- "Financing the Environment: Lender Liability and Brownfields Redevelopment in North Carolina And in Federal Programs," Feb. 1998, UNC School of Law Annual Continuing Education Program, Friday Center
- "Prospects and Possibilities for Sustainable Development in Emerging Nations," Two-Day lecture Delivered at the University of Asmara, Asmara, Eritrea (Africa), December 1995
- "Environmental Justice for Health Professionals," UNC School of Public Health, June 1, 1995
- "Environmental Justice and the Legal System," Society for Risk Analysis, Research Triangle Chapter, October 31, 1994, Conference on Environmental Risk Equity: Is Life Fair," Friday Center
- "Keynote Address: Current Theoretical Inquiries on Environmental Protection and Their Effect On Shaping Legal Practice in North Carolina," Annual Meeting of the Environmental Law Section, NC Bar Association, April 29, 1994, Blowing Rock, NC
- "Beyond the McNollGast Hypothesis: Empirical and Theoretical Dimensions of Federal Environmental Legislation," Presentation at the Annual Meeting of the Public Choice Society, Austin, Texas April 1994

# PROFESSIONAL AFFILIATIONS AND ACTIVITIES

Admitted to practice law in North Carolina and the District of Columbia. Member of the Bar of the U.S. Supreme Court and of most federal courts of appeals (and have also argued in most appellate courts). Author of Supreme Court amicus brief in State of *North Carolina ex rel. Roy Cooper v. Tennessee Valley Authority* (2011)