Justin Booz

justinbooz.com

Education

2025 - present Candidate, Doctor of Philosphy, Geomatic Engineering

ETH Zurich, Department of Civil, Environmental and Geomatic Engineering, Zurich, Switzerland

2020 - 2021, 2022 - 2025 Dual Master of Landscape Architecture // Master of Design Studies: Mediums (computational design)

Harvard University, Graduate School of Design, Cambridge, Massachusetts, USA

Distinction

2016 - 2020 Bachelor of Arts, Architecture

Columbia University in the City of New York, New York, NY, USA

magna cum laude

Professional Experience

2025 - present	PhD Researcher, Planning Landscape and Urban Systems (PLUS), ETH Zurich
	ETH Zurich, Department of Civil, Environmental and Geomatic Engineering, Zurich, Switzerland
2021 - present	Research Assistant, Harvard University, Cambridge, MA: Office for Urbanization (Waldheim), Craig Douglas, Karen Lee Bar-Sinai
	Al development, sensor design and prototyping, simulations and modeling, drawings and renderings, archival research
2021 - 2025	Design Intern // Landscape Designer // Freelance Designer, Studio Zewde, New York, NY
	notable projects: Chalet Africain (CH), Dia: Beacon (USA), Bal Harbor Shops (USA), Miller Prize (USA), more available on request
2024 - 2025	Designer and Research Assistant, Responsive Environments and Artifacts Lab/NVIVIA, Cambridge, MA
	narrative development and drawings
2019 - 2020	Technical Intern, Mayor Bill De Blasio, Office of Environmental Remediation, New York, NY
	site analysis, documentation, research, social media
2016 - 2019	Graphic Designer, Columbia University, New York, NY: Office of Global Programs, Columbia College, Community Impact
	visual communications material, copywriting, editing, transcription
2013 - 2015	Advisory Board Member (appointed), Greenheart International, Chicago, IL
	pedagogical support for Camp Greenheart, urban agriculture networking, Oxfam guidance and collaboration
2012 - 2015	Co-Founder and Director (elected), The Cooperation Operation, Chicago, IL

Teaching

2025 Adjunct Faculty, University of Cincinnatti, College of Design, Architecture, and Planning, Cincinatti, OH

LAND7056 History of Landscape Architecture`

2025 Workshop Instructor, University of Cincinnatti, College of Design, Architecture, and Planning, Cincinatti, OH

Smart City Design with AI, Topic: Introduction to classifier models in python and ArcGIS

organization leadership, design, construction, fundraising, public relations, communications

2021 - 2025 Teaching Assistant, Harvard University, Graduate School of Design, Cambridge, MA

MLA Thesis (Waldheim); Atmospheric Encounters, LA Core II, and Rep II (Douglas); Digital Media Workshop (Dept. of LA)

The Impact of Freshwater Runoff and Eutrophication in Tala Bay, Gulf of Aqaba, Jordan, Department of Sustainable Development (Columbia)

2022 - Present Visiting Design Review Critic

Harvard University, Columbia University, Paris School of Architecture, Wentworth Institute of Technology

Research & Publications		
2025 (Working)	Artificial Intelligence and the Future of Landscape Pedagogy, TAD Journal (with Kira Clingen, Sang Cho, Tom Sterling)	
2025 (Working)	Pyrotechnics: Implementation of Artificial Intelligence in the Design of Post-Disaster Landscapes, ACADIA Journal of Architectural Computing	
2025	Sensing the Living City: A Scalable Platform for Monitoring the Electrophysiology of Urban Forests, Journal of Digital Landscape Architecture	
2025	A Machine Learning Model to Identify Historic Wetlands in an Area of Critical Environmental Concern, Journal of Digital Landscape Architecture	
2023	Claiborne Avenue Research (New Orleans, LA), presented to the Emerson Collective	
2019	Urban Eco-Acoustics May Drive Passerine Speciation, Department of Ecology, Evolution, and Environmental Biology (Columbia)	

Lectures & Exhibitions

2019

2025	Sensing the Living City: A Scalable Platform for Monitoring the Electrophysiology of Urban Forests, JoDLA Conference, Dessau, Germany
2025	A Machine Learning Model to Identify Historic Wetlands in an Area of Critical Environmental Concern, JoDLA Conference, Dessau, Germany
2025	Digital Tools and the Future of Landscape Architecture: Exploring New Frontiers, Panel, International Federation of Landscape Architects
2025	Landscape Architecture in the Age of Planetary Computation, School of Planning Lecture Series, University of Cincinnatti, Cincinnatti, USA
2025	Cool Forest, collaboration with SCAPE, Venice Biennale 2025, Venice, Italy
2024	Sensing the Living City: A Scalable Platform for Monitoring the Electrophysiology of Urban Forests, Landscape Technology Forum, Harvard

2024 Sensing the Living City: A Scalable Platform for Monitoring the Electrophysiology of Orban Porests, Landscape Technology Forum, Har 2024 Omnipresence: Machine Vision in the Adversarial City, Solo exhibition and talk, Harvard University, Cambridge, MA

2022 Dia: Beacon Design Drawings (with Studio Zewde), Group Exhibition, Dia: Chelsea, New York, NY

Technical Abilities

Programming Languages Python, C++, C#, R

Machine Learning/Al Supervised, Semi-Supervised, Unsupervised, Reinforcement, Surrogate Modelling

Simulation computational fluid dynamics, pyro

Physical Computing Circuit Development, Prototyping, PCB manufacturing, Sensor Development, IoT, Networking

Graphic Design Photoshop, Illustrator, InDesign CAD/CAM Rhino, AutoCAD, Revit, Blender

Rendering V-Ray, Lumion, Twinmotion, Redshift, Enscape, Cycles

Special Effects Blender, Cinema4D, Houdini, Red Giant, Maya

Game Engines Unreal Engine, Unity
Video AfterEffects, Premier

GIS ArcGis Pro, CityEngine, Google Earth, ArcPy

Drone/UAV Piloting, Programming, Photogrammetry, Gaussian Splatting, NeRFs

Physical Computing Arduino, Raspberry Pi, Adafruit Feather

Environmental Analysis Soils, Water, Topographic

Fabrication Woodworking, Metalworking, 3D Printing, Laser Cutting, CNC, Soldering, Clay, Foam, Large-Format Printing

Languages

English Native
French Fluent, C1
German Beginner, A1

Awards, Grants, Fellowships

2025 MDes: Mediums Domain Prize

2025 Norman T. Newton Prize, Department of Landscape Architecture
2024 Dean's Scholar, Harvard University Graduate School of Design

2023 Penny White Project Fund Grantee, Harvard University Graduate School of Design

2020 Dean's Scholar, Harvard University Graduate School of Design
2019 Columbia Global Scholar, Columbia University in the City of New York
2018 Beesen Global Research Fellow, Columbia University in the City of New York

2018 Center for French and Francophone Studies Fellow, Columbia University in the City of New York

2016 Full Merit Scholarship, Columbia University in the City of New York

Avocations & Hobbies

Since 2020 Cross-Country Running

Since 2010 Cycling
Since 2009 Mycology
Since 2008 Circuit Bending
Since 2006 Cooking
Since 2006 Gardening

Press

Cochran, Sam. 2024. "Tour an Out of This World Home in the Swiss Alps." Architectural Digest. December 4, 2024. https://www.architecturaldigest.com/gallery/tour-an-out-of-this-world-home-in-the-swiss-alps.

Alexander, Tieg. "The Coop Op Transforms Toxic Waste Site into Community Garden." Greenheart Transforms 1 January 2014: 1-2. Online.

Bellware, Kim. "Cooperation Operation Turns Former Toxic Waste Site Into Pullman Community Garden." Huffington Post 19 August 2013: 1-2. Online.

Cynic, Aaron. "Coop Op Transforms a Vacant Lot in South Chicago." The Christian Science Monitor. The Christian Science Monitor, 01 Nov. 2013. Web. 14 Dec. 2013.

Goldhammer, Zachary. "In Pullman, The Sunflower Also Rises." Chicago Weekly 25 April 2013: 1-3. Online. Goldhammer's article also appears on City Farmer News.

Jones, Sylvia L. "'Coop Op' Turns Pullman Eyesore into Community Asset." ABC7 Chicago. ABC7 News, 30 Aug. 2014. http://abc7chicago.com/society/coop-op-turns-pullman-eyesore-into-community-asset/288010/

Maher, Sean. "BEST ECOLOGICAL ARK: Cooperation Operation" Southside Weekly 25 September 2013: Print.

Pfeifer, Jamison. "The Pullman Punk Ethic." Chicago Weekly 1 March 2013: 1-2. Online.

Richardson, Whitney. "Chicago 'Cooperation Operation' to Transform South Side Lot into Creative Farm-scape." Agrarian Trust 4 May 2013: 1-2. Online.article also appears on the Greenhorns website

Sánchez, Erika L. "Pullman Residents Turn Former Toxic Waste Site into Community Garden." DNAinfo Chicago 19 August 2013: 1-3. Online.

Saunders, Luke. "Bumper Crop in Food Desert." Grinnell Review 2 January 2014: 1. Online.

Vogel, Erin. "Cooperation Operation Fights Food Desert in South Side Neighborhood." RedEye 22 July 2013: 1-3. Online. Vogel's article also appears in The Sun Sentinel.