Stephanie N Kivlin

Department of Ecology and Evolutionary Biology
University of Tennessee
576 Dabney
Knoxville, TN, 37996

Phone: (830) 237-3276
Email: skivlin@utk.edu
Website: https://kivlinlab.github.io

Professional Appointments

Scientific Director — February 2024 –
University of Tennessee Genomics Core

Associate Professor — August 2023 –
University of Tennessee, Knoxville, TN

Director of Graduate Studies — July 2023 –
Ecology and Evolutionary Biology Department
University of Tennessee, Knoxville, TN

Assistant Professor — January 2018 – July 2023
University of Tennessee, Knoxville, TN

Postdoctoral Researcher — August 2015 – December 2017
University of New Mexico, Albuquerque, NM
Advisor: Jennifer Rudgers

Postdoctoral Researcher — May 2012 – August 2015
University of Texas, Austin, TX
Advisor: Christine Hawkes

Education

Ph.D. Ecology and Evolutionary Biology — May 2012
University of California - Irvine, Irvine, CA
Advisor: Kathleen Treseder

B.S. Microbiology and Ecology, Evolution, & Behavior — December 2007
University of Texas, Austin, TX
Departmental Honors
Thesis advisor: Christine Hawkes

Research Grants and Fellowships

* Undergraduate student, † Graduate student, ‡ Postdoctoral Researcher

In Review

2025 - 2029	$500,000	NERC-NSF: Putting the N in n-dimensional plant range estimations with global change. JS Lynn (PI) and **SN Kivlin (co-PI)**

Active Funding

2025 - 2026	$46,400	UTK Energy and Environment. When, where, and how do mycorrhizal fungi affect plant biomass? **SN Kivlin (PI)**, J.D. Edwards‡, J.A. Schweitzer, N.G. Smith, J.K. Bailey, C.N. Barnes† and A. Cheiab‡.
2024 - 2029	$1,200,000	NSF CAREER: *Spatiotemporal Dynamics of Plant-Mycorrhizal Fungal Symbioses at Continental Scale.* **SN Kivlin (PI)**.
2024 - 2028	$1,500,000	NSF AccelNet-Implementation Phase I: *MICROBENet-Net Multi-institute Collaborative Research on Belowground plant microbial interactions Networks of Networks*. BA Sikes (PI) **SN Kivlin (co-PI)**, AT Classen (co-PI), AE Zanne (co-PI). *UTK Share: $50,477*
2023 - 2025	$200,000	USDA-USFS contract: *Soil microbiome scaling across USFS Forest Inventory and Analysis plots*. **SN Kivlin (PI)**.
2022 - 2027	$3,585,809	NSF: Integrative Biology: *The potential for mutualism reorganization in the Anthropocene*. S Kalisz (PI), **SN Kivlin (co-PI)** and NG Smith (PI). *UTK Share: $2,332,789*
2021 - 2025	$996,998	DOE: *Potential for advanced snowmelt timing and summer drought to decouple plant and mycorrhizal fungal phenology and biogeochemical cycling*. **SN Kivlin (PI)**, Co-PIs AT Classen (co-PI), P Sorenson (co-PI), EL Brodie (co-PI), H Steltzer (co-PI), D Inouye (co-PI), and BN Sulman (co-PI). *UTK Share: $566,576*
2021 - 2025	$1,266,589	NSF Macrosystems Biology: *Linking plant and mycorrhizal fungal communities across scales*. S Fei (PI), R Phillips (co-PI), **SN Kivlin (co-PI)**, J Parker (co-PI), and G Domke (co-PI). *UTK Share: $531,974*
2024	$3,000	UTK Faculty Research Assistants Funding Award (FRAF)

Completed Funding

2024	$1,500	UTK Summer Research Assistants Funding Award (SRAF)
2024	$66,500	UTK SARIF: *Illumina NextSeq in the UT Genomics Core*. **SN Kivlin (PI)**, VA Brown (co-PI).

2019-2024	$500,000	USDA NIFA: *Optimizing plant-soil microbial interactions through crop diversification to enhance sustainability in southeastern croplands*. S Jagadamma (PI), J Lee (co-PI), **SN Kivlin (co-PI)**, A McClure (co-PI), L Duncan (co-PI). *UTK Share: $150,500*
2023	$1,800	UTK Open Publishing Support Fund
2023	$1,800	UTK Open Publishing Support Fund
2023	$2,250	UTK Faculty Research Assistants Funding Award (FRAF)
2023	$1,750	UTK Faculty Research Assistants Funding Award (FRAF)
2019-2022	$190,345	NSF SG: *Impacts of long-term warming on plant and microbial control of soil carbon cycling*. **SN Kivlin (PI)** and L Souza (co-PI). *UTK Share: $178,500*
2020-2022	$22,791	NSF Supplemental Request: *Impacts of long-term warming on plant and microbial control of soil carbon cycling.* **SN Kivlin (PI)**
2021	$692,495	NSF MRI: *Acquisition of an Illumina NovaSeq 6000 to support high-throughput sequencing collaborative research and integrated training*. F Loeffler (PI), **SN Kivlin (co-PI)**, J Beever (co-PI), M Staton (co-PI), and S Ripp (co-PI).
2020	$14,350	Texas Ecological Laboratory: *Characterizing interannual shifts in fungal leaf symbionts across environmental and biotic gradients in Texas grasslands*. **SN Kivlin (PI)**
2019	$110,334	UTK SARIF: *Replacement of the EEB Bioinformatics Data Analysis Server*. EP Derryberry (PI), **SN Kivlin (co-PI)**, M Papes (co-PI), and B O'Meara (co-PI).
2019	$12,944	Texas Ecological Laboratory: *Characterizing interannual shifts in fungal symbionts across environmental and biotic gradients in Texas grasslands*. **SN Kivlin (PI)**
2019	$5,655	NIMBioS Working Group: *Creating a framework to interpret and model plant and mycorrhizal fungal traits at the global scale*. **SN Kivlin (PI)**, C Iversen (co-PI), AE Zanne (co-PI).
2018	~$55,000	DOE JGI: *Utilizing microbial functional response to follow soil carbon and nutrient cycling recovery and resilience following the November 2016 fire in the Great Smoky Mountains National Park*. K Hughes (PI) and **SN Kivlin (co-PI)**.
2018	$8,875	Texas Ecological Laboratory: *Characterizing arbuscular mycorrhizal fungi across environmental and biotic gradients in Texas grasslands*. **SN Kivlin (PI)**
2018	$498	Breedlove, Dennis Award, UTK. *The effects of chronic urbanization and fire on belowground plant-fungal symbioses in the Great Smoky Mountains National Park*. VR Harpe* (PI) and **SN Kivlin (faculty advisor)**
2018	$294	Breedlove, Dennis Award, UTK. *The effects of chronic urbanization and fire on aboveground plant-fungal*

		symbioses in the Great Smoky Mountains National Park. J Turner* (PI) and **SN Kivlin (faculty advisor)**
2018	~$55,000	Department of Energy Joint Genomes Institute Community Science Program: *Plant-fungal symbiont decoupling affects soil carbon-degrading gene expression*. M Mann† (PI), **SN Kivlin (co-PI),** JAM Moore‡ (co-PI) and JA Rudgers (co-PI).
2018	~$55,000	DOE Joint Genomes Institute Community Science Program: *Microbial contributions to soil carbon storage under long-term warming*. **SN Kivlin (PI)**, JAM Moore‡ (co-PI), J Harte (co-PI), and JA Rudgers (co-PI)
2018	$3,500	RMBL Research Fellowship: *Connecting Microbial Composition Responses Observed in EcosystemS (MICROBES) to long-term soil carbon cycling under global change*. **SN Kivlin (PI)**
2015 - 2017	$98,090	NIH: CETI Pilot Program *How does climate change alter the activities of pathogens and symbionts to affect host health?* JA Rudgers (PI), **SN Kivlin (co-PI)**, and ME Kazenel (co-PI)
2014 - 2017	$829,482	NSF DEB *The potential for climate-induced disruption of plant-microbe symbioses along altitudinal gradients.* JA Rudgers (PI), DL Taylor (co-PI) **SN Kivlin (senior personnel)**, RL Sinsabaugh (co-PI), and J Harte (co-PI).
2010 - 2012	$111,000	EPA Science To Achieve Results Fellowship: *How well can fungi migrate under a changing climate?*
2009	$2,500	UC Reserves System: Mildred Mathias Grant
2006 - 2007	$1,000	University of Texas Co-op Society: Undergraduate research fellowship
2005	$3,000	University of Texas Co-op Society: GOES Scholarship

Notable Awards

2023	University of Tennessee Chancellor's Award for Professional Promise in Research and Creative Activity
2022	University of Tennessee, College of Arts and Sciences Mid-Career Research Award
2013	FESIN: Postdoctoral travel award
2011	ESA Microbial Ecology Section: Graduate travel award
2010	NSF Graduate Research Fellowship: Honorable mention
2009	NSF Graduate Research Fellowship: Honorable mention
2008	ESA Microbial Ecology Section: Undergraduate travel award

Publications

* Undergraduate student, † Graduate student, ‡ Postdoctoral Researcher

Citations: 5405, h-index: 35, i10-index: 57

Manuscripts in review

Qin, Clara, S Kumar, J Elhance, B Manley, A Corrales, A Polyakov, J Stewart, **SN Kivlin**, I Odriozola, T Vetrovsky, P Kohout, P Baldrian, ET Kiers, M Van Nuland. In review. High-resolution range mapping of mycorrhizal fungal species reveals systematic biases in their protection. *Conservation Letters*

Andres, H, **SN Kivlin**, BA Sikes, AE Zanne, and AT Classen. In review. Reducing interdisciplinary roadblocks through multi-network collaboration on plant-fungal interactions. *Ecological Bulletin*

Wooliver, R‡, **SN Kivlin** and S Jagadamma. In review. Microbial communities and their association with soil health indicators under row cash crop and cover crop diversification: A case study. *Frontiers in Microbiology*

Coffman, KR†, VG Salmon, J Kumar, CM Iversen, **SN Kivlin**, and KJ Walters. In review. Fine roots of plants in organic soils occupy a distinct niche within the root economics space. *New Phytologist*

Vought, OK†, **SN Kivlin**, H Shulman‡, PO Sorensen, DW Inouye, I Ibanez, P Falb*, K Rand, and AT Classen. In revision. Earlier snowmelt reduces the strength of carbon sink in montane meadows. *Journal of Ecology.*

Cat, LA†, ME Gorris, JT Randerson, **SN Kivlin**, and KK Treseder. In review. The biogeography of soil- and airborne fungi in the Southwestern US in relation to climate. *ISME Communications*

Bialic-Murphy, L, LG van Galen‡, J Mutz, **SN Kivlin**, EA Perkowski‡, NG Smith, LK Werden, J van den Hoogen, T Lauber, TW Crowther, and S Kalisz. In review. Fungal diversity-plant productivity relationships in the Anthropocene. *Nature Plants*

Wooliver, R‡, **SN Kivlin**, and S Jagadamma. In revision. Diverse plant residues drive opposing mechanisms for soil carbon stabilization following drought. *Soil Biology and Biochemistry*

Barnes, CN†, JD Parker, J Pullen, JD Edwards‡, G Schilling, D Valet, RP Phillips, S Fei, MK McCormick, JA Fordyce, JK Bailey, and **SN Kivlin**. In revision. Tree mycorrhizal associations influence belowground processes more than tree richness. *Journal of Ecology*

Perkowski, EA‡, K Carroll, J Mutz‡, S Chatterjee†, X Yang, L Bialic-Murphy, **SN Kivlin**,

S Kalisz, and NG Smith. . In revision. Negative effects of an allelopathic invader on leaf-level photosynthesis of two coexisting native plant species increases in strength as the growth season progresses. *Functional Ecology*

Mutz, J‡, **SN Kivlin**, NG Smith, JM Heberling, S Chatterjee†, and S Kalisz. In revision. Allelopathic invader alters root fungal composition, physiology, and biomass allocation across multiple native plant species. *Journal of Ecology*

McGill B, M Jarzyna, R Diaz, CN Barnes†, FH Diaz, E Economo, C French, O Hagen‡, H James, **SN Kivlin**, S Lahiri, J Lennon, R Mascarenhas, L Ohyama, J Okie, DL Rabosky, K Zhu, M Hickson, and R Gillespie. In review. A call to develop a coherent discipline of biodiversity science to address global change. *PNAS*

Shulman, HB‡, JAM Pyle‡, AT Classen, D Inouye, R Simberloff†, P Sorensen, WS Thomas IV*, JA Rudgers, and **SN Kivlin**. In review. Phosphorus limitation shapes metabolic strategy of fungal-bacterial partnerships in montane meadow soil. *mBio*

Souza, L, AT Classen, JA Rudgers, CML Miller†, JAM Pyle‡, R Simberloff†, JA Fordyce, J Harte, and **SN Kivlin**. In review. Experimental ecosystem warming temperatures decouple interactions between plants and soil microbes. *PNAS*

Published Manuscripts

(70) Segal, EC†, and **SN Kivlin**. In press. Determinants of plant-mycorrhizal fungal distributions and function under global change. *Annual Review of Ecology, Evolution, and Systematics* 56

(69) Edwards, JD‡, MR Kazenel†, Y Luo, JS Lynn†, R McCulley, L Souza, JA Rudgers, and **SN Kivlin**. 2025. Warming disrupts relationships between plants and endophytic fungi. *Global Change Biology* 31:e70207.

(68) Hughes KW, JA Franklin, JA Schweitzer, **SN Kivlin**, A Case*, M Aldrovandi, PB Matheny, and AN Miller. In press. Post-fire oak mycorrhizal associations are dominated by Russula, Laccaria, and Thelephora/Tomentella but not Cortinarius. *Mycological Progress*

(67) Russell, AE, SJ Hall, R Bedoya, **SN Kivlin**, and CV Hawkes. In press. Tree species controls over nitrogen and phosphorus cycling in a wet tropical forest. *Bulletin of the Ecological Society of America*

(66) Lazar, A†, RP Phillips, **SN Kivlin**, GD Bending, and RM Mushinski. 2024. Understanding the ecological versatility of *Tetracladium* spp. in temperate forest soil. *Environmental Microbiology* 26:e7001.

(65) Russell, AE, SJ Hall, R Bedoya, **SN Kivlin**, and CV Hawkes. 2024. Tree species controls over N and P cycling in a wet tropical forest. *Ecological Monographs* e1639.

(64) Fahey, C‡, D Choi, J Wang, G Domke, JD Edwards‡, S Fei, **SN Kivlin**, L LaRue, M McCormick, W McShea, RP Phillips, J Pullen, and JD Parker. 2024. Tree diversity increases productivity via enhanced canopy structural complexity in two tree diversity-ecosystem function experiments. *Ecology*

(63) Xiang, Q-Y, **SN Kivlin**, DE Soltis, S Yu, H Chu, PS Soltis, and Y Zhao. 2024. Mapping microbial diversity onto the phylogeny of associated plant species. *Frontiers in Plant Science* 15:1421637.

(62) Lennon, J, RZ Abramoff, SD Allison, RM Burckhardt, KM DeAngelis, JP Dunne, SD Frey, P Friedlingstein, CV Hawkes, BA Hungate, S Khurana, **SN Kivlin**, NM Levine, S Manzoni, AC Martiny, JBH Martiny, N Nguyen, M Rawat, D Talmy, K Todd-Brown, M Vogtm, WR Wieder, and E Zakem. 2024. Priorities, opportunities, and challenges for integrating microorganisms into Earth system models for climate change prediction. *mBio* e00455-24.

(61) Edwards, J‡, S Love†, RP Phillips, S Fei, G Domke, J Parker, JA Schweitzer, JK Bailey, JA Fordyce, and **SN Kivlin**. 2024. Impacts of archival methods on soil microbial communities. *Soil Biology and Biochemistry* 191:109329.

(60) Trautwig AN†, MR Jackson†, **SN Kivlin**, and KA Stinson. 2023. Reviewing ecological implications of mycorrhizal fungal interactions in the Brassicaceae. *Frontiers in Plant Science* 14:1269815.

(59) Love, SJ†, JD Edwards‡, CN Barnes†, TW d'Entremont†, AM Hord†, AG Nytko†, NB Sero†, SL Bayliss‡, **SN Kivlin** and JK Bailey. 2023. Understanding plant-microbial interactions across scales in the Anthropocene: Current approaches, gaps, and future directions. *PLoS Climate* 2:e0000320.

(58) d'Entremont, TW† and **SN Kivlin**. 2023. Specificity in plant-mycorrhizal fungal relationships: prevalence, parameterization, and prospects. *Frontiers in Plant Science* 14:1260286.

(57) Lang, A‡, EA LaRue, **SN Kivlin**, J Edwards‡, R Phillips, J Gallion, N Kong, JD Parker, MK McCormick, G Domke, and S Fei. 2023. Forest structural diversity is linked to soil microbial diversity. *Ecosphere* 14:e4702.

(56) Roche, MD†, I Pearse, H Sofaer, G Spyreas, **SN Kivlin**, and S Kalisz. 2023. Mutualism disruption: Physiological mechanism of invasion impact is evident across heterogeneous environmental conditions and varying invasion intensity. *Ecography* e06434.

(55) Aguilar-Trigueros, CA, F Krah, WK Cornwell, AE Zanne, N Abrego, IC Anderson, CJ Andrew, P Baldrian, C Bassler, A Bissett, VB Chaudhary, B Chen, Y Chen, M Delgado-Baquerizo, C Deveautour, E Egidi, H Flores-Moreno, J Golan, J Heilmann-

Clausen, S Hempel, Y Hu, H Kauserud, **SN Kivlin**, P Kohout, DR Lammel, FT Maestre, A Pringle, J Purhonen, BK Singh, SD Veresoglou, T Vetrovsky, H Zhang, MC Rillig, and JR Powell. 2023. Biogeographical drivers of offspring size and shape for an entire Kingdom. *Ecology Letters*

(54) Singh, S†, M Mayes, **SN Kivlin** and S Jagadamma. 2023. How Birch effect differs in mechanisms and magnitudes due to soil texture. *Soil Biology and Biochemistry* 179:108973.

(53) Wooliver, R‡, **SN Kivlin**, and S Jagadamma. 2022. Links among crop diversity, microbial diversity, and soil organic carbon: Mini review and case studies. *Frontiers in Microbiology* 13:854247.

(52) **Kivlin SN**, M Mann†, JS Lynn†, M Kazenel†, DL Taylor, and JA Rudgers. 2022. Grass identity shapes fungal symbiont composition across six steep altitudinal gradients. *ISME Communications* 2:1-11.

(51) Fei, S, **SN Kivlin**, G Domke, I Jo, E LaRue, and RP Phillips. 2022. Impacts of global change on the coupling of plant and mycorrhizal fungal associations. *New Phytologist* 234:1960-1966.

(50) **Kivlin SN,** VR Harpe*, JH Turner*, JAM Moore‡, LC Moorhead‡, KK Beals†, MM Hubert†, M Papes, and JA Schweitzer. 2021. Arbuscular mycorrhizal fungal response to fire and urbanization in the Great Smoky Mountains National Park. *Elementa: Science of the Anthropocene* 9:00037.

(49) Gabor, C, **SN Kivlin**, J Hua, N Bickford, and T Wright. 2021. Understanding organismal capacity to respond to anthropogenic change: Barriers and solutions. *Integrative and Comparative Biology* 61:2132-2144.

(48) Yaffar D†, CE Defrenne‡, KG Cabugao‡, J Child, N Carvajal, **SN Kivlin**, and RJ Norby. 2021. Root trait strategies related to phosphorus acquisition in five tropical species of Puerto Rico. *Frontiers in Forest Ecology* 4:698191.

(47) Singh, S†, S Jagadamma, J Liang, **SN Kivlin**, JD Wood, G Wang, CW Schadt, JI DuPont, P Gowda, and M Mayes. 2021. Soil moisture sensitivity on microbial processing of soil organic carbon in different textured soils. *Frontiers in Environmental Science* 9:682450.

(46) Singh S†, MA Mayes, A Shekoofa, **SN Kivlin**, S Bansal, and S Jagadamma. 2021. The influence of field soil water variation on microbial mineralization of soil organic carbon. *Scientific Reports* 11:1-13.

(45) **Kivlin SN**, CV Hawkes, M Papes, KK Treseder, and C Averill. 2021. The future of microbial ecological niche theory and modeling. *New Phytologist* 231:508-511.

(44) **Kivlin SN**, AP Smith, BN Sulman, and E Buscardo. 2021. Editorial: When and where do mycorrhizal fungi predict ecosystem biogeochemical cycles and recovery from disturbance? *Frontiers in Forests and Global Change* 4:33.

(43) Dickey, JR†, R Swenie†, S Turner†, CC Winfrey†, D Yaffar†, A Padukone†, KK Beals†, KS Sheldon, and **SN Kivlin**. 2021. Do microorganisms obey macroecological rules? *Frontiers in Ecology and Evolution* 9:196.

(42) Defrenne, CE‡, E Abs‡, A Corderio†, L Dietterich‡, M Hough‡, J Jones‡, **SN Kivlin**, W Chen, D Cusack, A Franco, A Khasanova, D Stover and AL Romero-Olivares. 2021. The Ecology Underground Coalition: Building a collaborative future of belowground ecology and ecologists. *New Phytologist* 229:3058-3064.

(41) Bialic-Murphy, L‡, NG Smith, P Voothuluru‡, R McElderry‡, M Roche†, S Cassidy†, **SN Kivlin**, and S Kalisz. 2021. Invasion-induced root-fungal disruptions alter native plant physiology, carbon and nitrogen use efficiencies, and performance. *Ecology Letters* 24:1145-1156.

(40) Kalisz S, **SN Kivlin**, and L Bialic-Murphy‡. 2021. Allelopathy is pervasive in invasive plants. *Biological Invasions* 23:367-371.

(39) Roche M†, I Pearse, L Bialic-Murphy‡, **SN Kivlin**, H Sofaer, and S Kalisz. 2021. Negative effects of an allelopathic invader on individual AM fungal plant species scale to community-level responses. *Ecology* 102:e03201.

(38) Lyons, KG, JA Rudgers, DL Taylor, **SN Kivlin**, M Mann†, M Lenihan*, O Royball*, K Carroll*, and K Keynoso*. 2021. Culturable root endophytes under experimental warming and along elevational gradients in the Rocky Mountains. *Fungal Ecology* 49:101002.

(37) Rudgers, JA, ME Afkhami, L Bell-Dereske‡, YA Chung, K Crawford, **SN Kivlin**, M Mann†, and M Nunez. 2020. Climate disruption of plant-microbe interactions. *Annual Reviews in Ecology, Evolution and Systematics* 51:561-586.

(36) Kokkoris, V, PM Antunes, C Fahey‡, J Fordyce, **SN Kivlin**, Y Lekberg and MM Hart. 2020. Covariation between plant and arbuscular mycorrhizal fungal communities: what is the evidence? *New Phytologist* 228:828-838.

(35) **Kivlin, SN.** 2020. Global mycorrhizal fungal range sizes vary within and among mycorrhizal guilds but are not correlated with dispersal traits. *Journal of Biogeography* 47:1994-2001.

(34) Beals, KK†, JAM Moore‡, **SN Kivlin**, SLJ Bayliss†, CY Lumibao‡, LC Moorhead‡, M Patel†, JL Summers†, IM Ware†, JK Bailey, and JA Schweitzer. 2020. Predicting plant-

soil feedback in the field: competitive interactions affect growth more than stress or disturbance. *Frontiers in Ecology and Evolution* 8:191.

(33) Hughes, KW, A Case*, PB Matheny, **SN Kivlin**, RH Petersen, AN Miller, and T Iturriaga. 2020. Secret lifestyles of the post-fire fungus Sphaerosporella. *American Journal of Botany* 107:876-885. *** Featured on cover*

(32) Hawkes CV, M Shinada*, and **SN Kivlin**. 2020. Historical climate legacies on soil respiration persist despite 4 years of extreme change in rainfall. *Soil Biology and Biochemistry* 143:107752. *** Editor's Choice Article of the Year*

(31) **Kivlin, SN** and CV Hawkes. 2020. Spatial and temporal turnover of soil microbial communities is not linked to function in a primary tropical forest. *Ecology* 101:e02985.

(30) **Kivlin, SN**, S Fei, S Kalisz, and C Averill. 2020. Microbial Ecology meets Macroecology: Developing a process-based understanding of microbial role in global ecosystems. *Bulletin of the Ecological Society of America* e01645.

(29) Tipton, L[‡], G Zahn[‡], E Datlof[†], **SN Kivlin**, P Sheridan, AS Amend, and NA Hynson. 2019. Fungal aerobiota communities are unaffected by environmental conditions over a thirteen-year time series from Mauna Loa Observatory. *Proceedings of the National Academy of Sciences* 116:25728-25733.

(28) Averill, C, JMT Bhatnagar, M Dietz, WD Pearse, and **SN Kivlin**. 2019. Global imprint of plant mycorrhizal associations on plant nutrient use efficiency traits. *Proceedings of the National Academy of Sciences* 116:23163-23168.

(27) Lynn, JS[†], MR Kazenel[†], **SN Kivlin,** and JA Rudgers. 2019 Context-dependent biotic interactions predict plant abundance across steep environmental gradients. *Ecography* 42:1600-1612.

(26) Kazenel, MR[†], **SN Kivlin**, JS Lynn[†], DL Taylor, and JA Rudgers. 2019. Altitudinal gradients do not predict responses of plant symbionts to experimental warming. *Ecology* 100:e02740.

(25) **Kivlin, SN**, MR Kazenel[†], JS Lynn[†], DL Taylor, and JA Rudgers. 2019. Plant identity influences foliar endophytes more than elevation in the Colorado Rocky Mountains. *Microbial Ecology* 78:688-698.

(24) Sulman, BN, E Shevliakova, ER Brzostek, **SN Kivlin**, S Malyshev, DNL Menge, and X Zhang. 2019. Diversity in nitrogen acquisition strategies enables enhanced terrestrial carbon storage. *Global Biogeochemical Cycles* 33:501-523.
** Top 10 Downloaded Article of the Year

(23) **Kivlin, SN**, RA Bedoya, and CV Hawkes. 2018. Heterogeneity in arbuscular

mycorrhizal fungal communities may contribute to inconsistent plant-soil feedback in Neotropical rainforests. *Plant and Soil* 432:29-44.

(22) Sulman, BN, JAM Moore‡, R Abramoff, C Averill, **SN Kivlin**, K Georgiou, B Sridhar, M Hartman, G Wang, WR Wieder, MA Bradford, Y Luo, M Mayes, E Morrison, WJ Riley, A Salazar, JP Schimel, J Tang, and AT Classen. 2018. Multiple models and experiments underscore large uncertainty in soil carbon dynamics. *Biogeochemistry* 141:109-123.

(21) Lekberg, Y, JD Bever, RA Bunn, RM Calaway, MM Hart, **SN Kivlin**, JN Klironomos, BG Larkin, JL Maron, KO Reinhart, M Remke, and WH van der Putten. 2018. Relative importance of competition and plant soil feedbacks, their context dependency and implications for coexistence. *Ecology Letters* 21: 1268-1281.

(20) Russell, AE, **SN Kivlin** and CV Hawkes. 2018. Tropical tree species effects on soil pH and biotic factors and the consequence for macroaggregate dynamics. *Forests* 9: 184.

(19) **Kivlin, SN**, JS Lynn†, MR Kazenel†, KK Beals†, and JA Rudgers. 2017. Biogeography of plant-associated fungal symbionts in mountain ecosystems: A meta-analysis. *Diversity and Distributions* 23: 1067-1077.

(18) Hawkes, CV, BG Waring, JD Rocca, and **SN Kivlin**. 2017. Historical climate controls soil respiration responses to soil moisture. *Proceedings of the National Academy of Sciences* 114: 6322-6327.

(17) Bell-Dereske, L†, C Vesbach, **SN Kivlin**, SM Emery, and JA Rudgers. 2017. A leaf endophyte alters belowground microbial communities in Great Lakes dunes. *FEMS Microbiology Ecology* 93: fix036.

(16) **Kivlin, SN** and CV Hawkes. 2016. Tree species, spatial heterogeneity, and seasonality drive soil fungal abundance, richness, and composition in Neotropical rainforests. *Environmental Microbiology* 18(12): 4662-4673.

(15) **Kivlin, SN** and CV Hawkes. 2016. Temporal and spatial variation of soil bacteria richness, composition, and function in a Neotropical rainforest. *PLoS ONE* 11(7): e0159131.

(14) Ranelli, LB*, W Hendricks*, JS Lynn†, **SN Kivlin**, and JA Rudgers. 2015. Biotic and abiotic predictors of fungal symbiont distributions in grasses of the Colorado Rockies. *Diversity and Distributions* 21: 962-976.

(13) **Kivlin, SN** and KK Treseder. (invited) 2015. Initial phylogenetic relatedness of saprotrophic fungal communities affects subsequent litter decomposition rates. *Microbial Ecology* 69: 748-757.

(12) **Kivlin, SN**, GC Winston, ML Goulden, and KK Treseder. (invited) 2014. Environmental filtering affects soil fungal community composition more than dispersal limitation at regional scales. *Fungal Ecology* 12: 14-25.

(11) Rudgers, JA, **SN Kivlin**, KD Whitney, MV Price, NM Waser, and J Harte. 2014. Responses of high-altitude graminoids and soil fungi to 20 years of experimental warming. *Ecology* 95: 1918-1928.

(10) **Kivlin, SN** and KK Treseder. (invited) 2014. Soil extracellular enzyme activities correspond with abiotic factors more than fungal community composition. *Biogeochemistry* 117: 23-97.

(9) **Kivlin, SN**, BG Waring†, C Averill†, and CV Hawkes. (invited commentary) 2013. Tradeoffs in microbial carbon allocation may mediate soil carbon storage in future climates. *Frontiers in Terrestrial Microbiology* 4: 261.

(8) **Kivlin, SN**, SM Emery, and JA Rudgers. (invited) 2013. Fungal symbionts alter plant responses to global change. *American Journal of Botany* 100: 1445-1457.

(7) Hawkes, CV, **SN Kivlin**, J Du*, and VE Eviner. 2013. The temporal development and additivity of plant-soil feedback in perennial grasses. *Plant and Soil* 369: 141-150.

(6) Worchel, ER†, HE Giauque†, and **SN Kivlin**. 2013. Fungal symbionts alter plant drought response. *Microbial Ecology* 65: 671-678.

(5) Todd-Brown, K, F Hopkins, **SN Kivlin**, JM Talbot, and SD Allison. 2012. A framework for representing microbial decomposition in coupled climate models. *Biogeochemistry* 109: 19-33.

(4) **Kivlin, SN**, CV Hawkes, and KK Treseder. 2011. Global diversity and distribution of arbuscular mycorrhizal fungi. *Soil Biology and Biochemistry* 43: 2294-2303.

(3) Treseder, KK, **SN Kivlin**, and CV Hawkes. 2011. Evolutionary trade-offs among decomposers may constrain responses to nitrogen. *Ecology Letters* 14: 933-938.

(2) Hawkes, CV, **SN Kivlin**, JD Rocca, V Huguet, MA Thomsen, and KB Suttle. 2011. Fungal community responses to precipitation. *Global Change Biology* 17: 1637-1645.

(1) **Kivlin, SN** and CV Hawkes. 2011. Differentiating between effects of invasion and diversity: impacts of aboveground plant communities on belowground fungal communities. *New Phytologist* 189: 526-535

Book Chapters

(2) **Kivlin, SN** and JA Rudgers. 2019. Effects of warming on fungal leaf endophytes: impacts on physiology, species richness, and composition. In J. Mohan (Ed.) *Ecosystem Consequences of Soil Warming*. Elsevier.

(1) **Kivlin, SN**, R Muscarella, CV Hawkes, and KK Treseder. 2017. The predictive power of ecological niche models for global arbuscular mycorrhizal fungal biogeography. In L Tedersoo (Ed.) *Biogeography of Mycorrhizal Symbiosis*. Springer-Verlag.

Other Publications

(1) Gabor, C, **SN Kivlin**, J Hua, N Bickford, and T Wright. 2019. Understanding organismal capacity to respond to anthropogenic change: Barriers and solutions. NSF White Paper for Reintegrating Biology.

Invited Seminars and Conference Presentations

Texas Tech University ASM: Keynote Speaker, Lubbock, TX	2025
Cary Institute of Ecosystem Science, Millbrook, NY	2024
New Phytologist Fungal Invasions Symposium, Campinas, Brazil	2024
Canadian Society of Ecology, Vancouver, Canada	2024
University of California, Davis. Remote	2024
Tulane University, Biology Department, New Orleans, LA	2023
Colorado State University, Biology Department, Fort Collins, CO	2023
Texas A&M, Corpus Christi, Biology Department, Corpus Christi, TX	2023
North Carolina State Univ, Dept. of Plant and Microbiology, Raleigh, NC	2022
The Global Soil Biodiversity Initiative. Remote	2022
International Conference on Mycorrhizas 11, Beijing, China. Remote	2022
International Union on Microbiomes, Rotterdam, Netherlands. Remote	2022
University of Texas, Austin, Dept. of Integrative Biology, Austin, TX	2022
Fifth Traits Workshop, Keynote Speaker, Knoxville, TN	2022
University of Montreal. Remote	2021
Swedish University of Agricultural Sciences. Remote	2021
DOE Watershed SFA All Hands Meeting. Remote	2021
ETH Zurich, Global Ecology Group. Zurich, Switzerland	2021
University of Hawaii, Manoa, Fungal Ecology Group. Manoa, HI	2021
Univ. of California, Riverside, Dept. of Plant Pathology. Riverside, CA	2020
Purdue University, Dept of Forestry. West Layfette, IN	2020
Indiana University, Dept. of Biology. Bloomington, IN	2020
University of New Hampshire. Dept. of Natural Resources. Durham, NH	2019
Kellogg Biological Station. Hickory Corners, MI	2019
Army Research Laboratory. Adelphi, MD	2019
Ecological Society of America Conference. Louisville, KY	2019

ASM Meeting. San Francisco, CA	2019
University of Louisville, Department of Biology. Louisville, KY	2019
UTK Plant Research Council. Knoxville, TN	2019
SSSA International Soils Meeting. San Diego, CA	2019
Mississippi State University, Biological Sciences. Starkville, MS	2018
Trinity University, Department of Biology. San Antonio, TX	2017
Ecological Society of America Conference. Portland, OR	2017
University of Maryland, Department of Biology. College Park, MD	2017
University of Georgia, Department of Plant Biology. Athens, GA	2017
University of Tennessee, Ecology and Evolutionary Biology. Knoxville, TN	2017
Mycological Society of America Conference. Berkeley, CA	2016
University of Texas, Department of Integrative Biology. Austin, TX	2016
Baylor University, Department of Biology. Waco, TX	2013
Mycological Society of America Conference. Austin, TX	2013
Association for Tropical Biology and Conservation. San Jose, Costa Rica	2013
University of Texas -Tyler, Department of Biology. Tyler, TX	2012

Invited and Organized Symposia and Working Groups

American Academy for Microbiology *Microbes in Models* Working group. Participant	2022
Linking macroecology and macroeveolution. NSF-funded working Group: Co-organizer.	2022
Ecology Underground Live webinar to complete virtual Ecological Society of America meeting: Co-organizer.	2020
NIMBioS Plant-fungal trait working group: Organizer.	2020
Ecological Society of America: Co-organizer: Ignite Symposium: *Harnessing the data revolution to link soil ecology and Earth System Models*.	2020
American Society of Naturalists: Co-organizer: Keynote Symposium. *Predicting population persistence and coexistence in the Anthropocene*	2020
Ecological Society of America: Co-organizer: Symposium. *Understanding macroecological rules of microbial distributions and their consequences for ecosystems*.	2019
INTERFACE working group to integrate microbial composition into carbon cycling models. (invited)	2017
MPG Ranch working group to create a conceptual framework for plant	2016

soil feedback under global change. (invited)

INTERFACE working group to integrate microbial composition into carbon cycling models. (invited) 2016

Ecological Society of America: Moderator and Co-organizer: organized oral session. *Contributions of plant-soil feedback to coexistence.* 2015

Enzymes in the environments Research Coordination Network *Linking microbial composition and ecosystem function*. (invited) 2012

Ecological Society of America: Co-organizer: organized oral session *Linking microbial function and soil moisture.* 2011

Teaching Experience

Lecturer	Univ. Tennessee	Multivariate Statistics	Fall 2023
Lecturer	Univ. Tennessee	Plant-microbial distribution	Spring 2023
Lecturer	Univ. Tennessee	Core Ecology (Graduate)	Fall 2022-2025
Lecturer	Univ. Tennessee	Advanced Bioinformatics	Fall 2021
Lecturer	Univ. Tennessee	General Ecology	Fall 2020
Lecturer	Univ. Tennessee	Macroecology	Fall 2019, Sp 2020
Lecturer	Univ. Tennessee	Ecosystem Ecology	Spring 2018-2022
Lecturer	Univ. Tennessee	Ecosystem Ecology Lab	Spring 2018
Guest lecturer	Univ. Texas	Microbial Ecology	Spring 2013-2017
Teaching Assistant	Univ. CA-Irvine	Host-Parasite Coevolution	Fall 2010
Teaching Assistant	Univ. CA-Irvine	Organisms to Ecosystems	Spring 2009
Teaching Assistant	Univ. CA-Irvine	Field Ecology Methods	Winter 2009
Teaching Assistant	Univ. CA-Irvine	Intro to Scientific Writing	Fall 2009

International and External Teaching

Soil Ecology Course, Wageningen University, Netherlands Spring 2025
Multivariate Statistics, Colorado State University Fall 2023

Mentoring

Junior Faculty

Jacob Suissa (Committee Chair: 2023-), Zach Burcham (Microbiology Department: 2025-).

Postdoctoral researchers

Jessica Moore (2018-2019), Leigh Moorhead (2018-2019), Lalasia Bialic-Murphy (2020), Rachel Wooliver (2020-2024), Joe Edwards (2022-), Hannah Shulman (2022-),

Jessie Mutz (2023-2025), Daniel Garry (2024-2025).

Graduate Students
Caitlin Barnes: co-advised with Joe Bailey (2021-)
Tyler d'Entremont (2022-)
Ella Segal (2022-)
Jessica Hammonds, MS (2023-2025)

Graduate student committees

Daniela Yaffar (2018-2020), Morgan Roche (2018-2020), Shikha Singh (2019-2020), Jacob Moutouama (2018-2022), Kyla Linn (2019-2022), Alex Neild (2021-2022), Elliot Goldstein (2020-2022), Zhixu Lu (2021-2022), Sarah Love (2020-2025), Sophia Turner (2020-2024), Chance Noffsinger (2021-2025), Sarah Ortiz, UT-Austin (2021-2025), Mareli Sanchez-Julia, Tulane University (2022-2023), Django Grootmeyers (2022-), Snehanjana Chaterjee, Texas Tech University (2023-), Suraksha Adhikari (2025-).

Undergraduate students mentored

University of Tennessee	Brandt Tate, Emily Price, Rosy Harpe (Breedlove-Dennis Funding, Honors Thesis), Jackson Turner (Breedlove-Dennis Funding, EuReCa Honors, Honors Thesis), Morgan Tate, Caleb Keoho (SURIP; Honors Thesis), Keilah Carter (SURIP; Breedlove-Dennis Funding), Nicholas Kiss, Preston Youn, Steven Thomas, Xavier Esslinger (SURIP), Taylor Baxter, Chris Hussey, Kate Loveday (DAR Fellow, SURIP, NSF GRFP), Sean O'Gorman (FRAF Fellow, Aura Fellow), Remy Fitzpatrick (FRAF Fellow)
University of New Mexico	Katherine Anderson
Rocky Mountain Biological Laboratory	Luciana Ranelli (REU), Will Hendricks, Kari Clausen (REU), Drew Freed (REU), Nikki Silva (REU), Ian McCowen (REU), Will Thomas (REU)
University of Texas	Wayne Baumier, Alyssa Hanson, Allison Harvey, Mio Shinada
University of CA-Irvine	Michelle Gonzalez, Amy Chan, Charmaine Doan, Nicole Farr, Bettina Ho

High school students mentored

Bowie High School	Liam Fredlund
Austin High School	Rebecca Martinez

Professional Service

Associate Editor
Elementa: Earth and Ecosystem Science (2022-present)
Global Ecology and Biogeography (2022-2025)

Guest Editor
Frontiers in Forests and Global Change
PLoS ONE

Grant panel review
Department of Energy Terrestrial Ecosystem Science: Tropical Ecosystems, Above-Belowground Interactions, Small Business Innovation and Research
National Science Foundation: Biodiversity on a Changing Planet, Ecosystems, Postdoctoral Fellowship, Rules of Life

Ad-hoc grant review
National Science Foundation: CAREER, Ecosystem Science, Integrative Organismal Systems, Plant Biotic Interactions Program, Polar Programs, Population and Community Ecology, Small Business Innovation Research (SBIR)
Department of Energy SCGSR
Vienna Science and Technology Fund
German-Israeli Foundation for Scientific Research and Development
Netherlands Organisation of Scientific Research: Earth and Life Sciences
The J. William Fulbright Commission
European Research Council
Mexican Research Council: Conacyt
Swiss National Science Foundation: Ambizione
Czech Science Foundation
UK Research and Innovation Funding Service

Book review
Elsevier Soil Science Series

Manuscript review
Applied and Environmental Microbiology, Applied Soil Ecology, Axios, Biogeochemistry, Biological Invasions, Biology Letters, Biotropica, Botany, Communications Earth and Environment, Conservation Biology, Current Microbiology, Diversity and Distributions, Ecological Applications, Ecological Complexity, Ecological Monographs, Ecology, Ecology Letters, Ecosystems, Environmental Microbiology, European Journal of Forest Research, FEMS Microbiology Ecology, Frontiers in Terrestrial Microbiology, Functional Ecology, Fungal Biology, Fungal Diversity, Fungal Ecology, Global Change Biology, The ISME Journal, Journal of Arid Environments, Journal of Biogeography, Journal of Ecology, Journal of Experimental Botany, Journal of Visualized Experiments, mBio, Microbial Ecology, Molecular Ecology, mSphere, mSystems, Mycologia, Mycorrhiza, Nature, Nature Communications, Nature Ecology and Evolution, New Phytologist, Oecologia, Oikos, Pedosphere, Plant and Soil, Plant Ecology, PLoS One, Proceedings of the National Academy of Sciences, Proceedings of the Royal Society B, Pursuit-Undergraduate Journal of the University of Tennessee, Science, Science Advances, Scientific Reports, Soil Biology and Biochemistry, South African Journal of Botany, Tree Physiology.

Professional Society Service
Soil Ecology Society President Elect (2025-)

Ecological Society of America Soil Ecology Section Chair (2023-)

Ecological Society of America Soil Ecology Section Vice Chair (2021-2023)

Ecological Society of America Soil Ecology Section Secretary (2019-2021)

Ecological Society of America Student Section: Local Host for Austin Conference. (2011)

Ecological Society of America Student Section: Women and Minorities Chair (2009-2011)

Professional Society Membership

Ecological Society of America
Mycological Society of America
Society of Conservation Biology

Contributed Presentations

Vought, O[†], **SN Kivlin**, P Sorensen, H Shulman[‡], P Falb, D Inouye, and AT Classen. 2024. The effect of accelerated snowmelt on carbon cycling across a growing season. AGU 2024.

Falb, P*, O Vought[†], H Shulman[‡], K Rand, **SN Kivlin**, P Sorensen, DW Inouye, and A Classen. 2024. Earlier snowmelt drives decreased summer decomposition of labile organic matter in a subalpine meadow. AGU 2024.

Domke, G, B Walters, L Nave, N Aspelin, JD Edwards[‡], S Fei, **SN Kivlin**, A Lang[‡], J Larson, M Pastore, C Perry, and R Phillips. 2024. Advances in soil carbon estimation on forest land in the United States using strategic level inventory data and auxiliary information. USFS FIA PI Meeting.

HB Shulman[‡], O Vought[†], AT Classen, P Sorensen, D Inouye, L Jacobs*, K Rand, A Bermudez, and SN Kivlin. 2024. Advancing snowmelt disrupts mycorrhizal dynamics in a subalpine meadow. DOE PI Meeting, Washington DC.

MK Nallabantu*, HB Shulman[‡], and **SN Kivlin**. 2024. Impact of climate warming on wild

antibiotic cycling in the soil microbiome. UTK EUReCA Undergraduate Symposium.

J Mutz‡, **SN Kivlin**, NG Smith, JM Heberling, S Chatterjee, and S Kalisz. 2024. Allelopathic invader alters root fungal community, physiology, and biomass allocation across multiple native plant species. 109th Annual Ecological Society of America Conference, Long Beach CA.

JD Edwards‡, JD Parker, M McCormick, RP Phillips, S Fei, EA LaRue, G Domke and **SN Kivlin**. 2024. Opposing responses across latitudes drive decoupling between tree and soil fungal communities. 109th Annual Ecological Society of America Conference, Long Beach CA.

CN Barnes†, JD Edwards‡, S Fei, JD Parker, RP Phillips, JK Bailey, and **SN Kivlin**. 2024. Tree mycorrhizal association influences belowground processes more than tree richness. 109th Annual Ecological Society of America Conference, Long Beach CA.

EC Segal† and **SN Kivlin**. 2024. Characterizing mycorrhizal communities along a latitudinal gradient for 11 dominant temperate tree species in the eastern United States. 109th Annual Ecological Society of America Conference, Long Beach CA.

TW d'Entremont† and **SN Kivlin**. 2024. The generality of specificity in plant-mycorrhizal interactions. 109th Annual Ecological Society of America Conference, Long Beach CA.

TW d'Entremont† and **SN Kivlin**. 2024. The generality of specificity in plant-mycorrhizal interactions. New Phytologist Symposium, Campinas, Brazil.

SN Kivlin, T d'Entremont†, CV Hawkes, J van den Hoogen‡, TW Crowther, C Averill, B Sikes, AT Classen, and AE Zanne. 2023. Specificity and environmental niche breadth of mycorrhizal fungi may predict their response to global change. 108th Annual Ecological Society of America Conference, Portland OR.

JD Edwards‡, JD Parker, M McCormick, RP Phillips, S Fei, EA LaRue, G Domke and **SN Kivlin**. 2023. Connections and disconnections between soil fungal and tree communities over space and time. 108th Annual Ecological Society of America Conference, Portland OR.

HB Shulman‡, JAM Moore‡, AT Classen, P Sorensen, DW Inouye, L Souza, R Simberloff†, and **SN Kivlin**. 2023. Phosphate availability drives soil microbial P-cycling networks across an elevation gradient. 108th Annual Ecological Society of America Conference, Portland OR.

R Wooliver‡, **SN Kivlin**, A McClure, J Lee, and S Jagadamma. 2021. Outcomes of crop diversification for soil microbial communities, soil health, and crop yields. SSSA Conference.

S Singh†, MA Mayes, S Jagadamma, **SN Kivlin**, C Schadt, J Phillips, and A Shekoofa.

2021. Changes in soil microbial community and function with changes in soil moisture and texture. DOE Conference, Washington DC.

MA Mann, JA Rudgers, **SN Kivlin** and DL Taylor. 2021. Long reads recapitulate composition and resolved unknown taxonomy of environmentally-sequenced plant-associated fungi. The American Society of Microbiology Conference.

SN Kivlin. 2020. Global biogeographical patterns of mycorrhizal fungi. 105th Annual Ecological Society of America Conference.

JAM Moore‡, LC Moorhead‡, VR Harpe*, MM Hubert†, and **SN Kivlin**. 2019. Biodiversity-function relations disrupted: The role of fire and urbanization disturbances in forest ecosystems of the southeastern United States. 104th Annual Ecological Society of America Conference.

M Roche†, IS Pearse, HR Sofaer, **SN Kivlin**, and S Kalisz. 2019. Allelopathic plant invader selectively impacts native plant community by mutualism disruption. 104th Annual Ecological Society of America Conference.

SN Kivlin, R Muscarella, KK Treseder, and CV Hawkes. 2019. Global biogeographic patterns may imply species traits for arbuscular mycorrhizal fungi. 104th Annual Ecological Society of America Conference.

JH Turner*, JAM Moore‡, and **SN Kivlin**. 2019. How does elevation affect arbuscular mycorrhizal fungal abundance across the growing season? UT-Knoxville EureCA symposium.

VR Harpe*, JH Turner*, LC Moorhead‡, JAM Moore‡, and **SN Kivlin**. 2019. Fungal response to wildfire in southeastern forests: effects at the urban-forest interface. Mid-Atlantic Society of Mycologists.

SN Kivlin, JAM Moore‡, LC Moorhead‡, and CV Hawkes. 2019. Soil microbial drought response across ecosystems. Soil Science Society of America Conference.

Kivlin, SN, M Mann†, M Kazenel†, JS Lynn†, and JA Rudgers. 2018. Climate change may differentially disrupt above- and belowground plant phytobiomes. International Phytobiomes Conference.

Kivlin, SN and JA Rudgers. 2017. Mismatch in plant-fungal symbiosis alters both above- and belowground processes. 102nd Annual Ecological Society of America Conference.

Kivlin, SN, JA Rudgers, and BN Sulman. 2017. The predictive promise and pitfalls of incorporating mycorrhizas into Earth system models. 102nd Annual Ecological Society of America Conference.

Lynn, JS†, **SN Kivlin,** MR Kazenel†, and JA Rudgers. 2017. Incorporating biotic interactions improves the prediction of mountain ecosystem species abundance and distribution. 8th International Biogeography Society Conference.

Kivlin, SN, R Muscarella, CV Hawkes, KK Treseder, MR Kazenel†, JS Lynn†, and JA Rudgers. 2016. Climate controls AM fungal distributions from global to local scales. American Geophysical Union Conference.

Kivlin, SN, R Muscarella, CV Hawkes, and KK Treseder. 2016. Global ecological niches of AM fungal species are predicted by climate, not resource levels. Mycological Society of America Conference.

Kazenel, MR †, **SN Kivlin**, DL Taylor, and JA Rudgers. 2016. Assessing the potential for climate-change induced disruption of plant-microbe symbioses in the Rocky Mountains. 101st Annual Ecological Society of America Conference.

Kivlin, SN and CV Hawkes. 2015. Soil microbial functions are controlled by moisture, not vegetation history, in Neotropical rainforests. 100th Annual Ecological Society of America Conference.

Kivlin, SN, R Bedoya, and CV Hawkes. 2014. Arbuscular mycorrhizal fungi influence long-term plant-soil feedback as much as soil pathogens in Neotropical forests. 99th Annual Ecological Society of America Conference.

Kivlin, SN and CV Hawkes. 2013. Belowground carbon allocation to soil fungi differs between tropical species. 98th Annual Ecological Society of America Conference.

Kivlin, SN and KK Treseder. 2012. Phylogenetic relatedness of saprotrophic fungal communities affects decomposition rates. 97th Annual Ecological Society of America Conference.

Kivlin, SN and KK Treseder. 2012. Soil extracellular enzyme activities are mostly influenced by abiotic factors. 2nd Annual Enzymes in the Environment Conference.

Kivlin, SN, GC Winston, ML Goulden, and KK Treseder. 2011. Spatial and temporal controllers of soil and airborne fungal assemblages. 96th Annual Ecological Society of America Conference.

Kivlin, SN and KK Treseder. 2010. Soil fungal biomass and enzyme activities respond to environmental moisture gradients. 13th International Symposium on Microbial Ecology.

Kivlin, SN, KL McGuire, CV Hawkes and KK Treseder. 2010. Biogeography of fungal functional groups: A global synthesis of published DNA sequences. 95th Annual Ecological Society of America Conference.

Kivlin, SN, KL McGuire, CV Hawkes and KK Treseder. 2009. Fungal biogeography and diversity: A global synthesis of published DNA sequences. 94th Annual Ecological Society of America Conference.

Kivlin, SN and CV Hawkes. 2008. Differentiating the effects of invasive species from diversity on arbuscular mycorrhizal fungi. 93rd Annual Ecological Society of America Conference.

Kivlin, SN and CV Hawkes. 2007. Differentiating the effects of invasive species from diversity on arbuscular mycorrhizal fungi. 2nd Annual Central Texas Ecologists Conference.