

CURRICULUM VITAE (updated 2023)

NAME: Hilary Swain
TITLE: Executive Director
ADDRESS: Archbold Biological Station
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CITIZENSHIP: United States
BIRTH: September 30, 1956
Aberdeen, Scotland
STATUS: Married, two children

EDUCATION:

Ph.D. University of Newcastle upon Tyne, U.K. 1981. Zoology.
Dissertation: Behavioral Ecology of the Goldeneye, *Bucephala clangula*.
B.Sc. University of Newcastle upon Tyne, U.K. 1977. Zoology.
First Class Honors.

PROFESSIONAL INTERESTS:

- Conservation Biology
- Florida Ecosystems
- Geographical Information Systems and Remote Sensing
- Biodiversity
- Environmental Education
- Agro-ecology

PROFESSIONAL EXPERIENCE:

1995-present **Executive Director.** Archbold Biological Station, Florida.
1995-present **Associate Research Professor.** Department of Biological Sciences, Florida Institute of Technology.
1995 **Associate Professor.** Department of Biological Sciences, Florida Institute of Technology.
1990-1995 **Assistant Professor.** Department of Biological Sciences, Florida Institute of Technology.
1986-1989 **Adjunct Assistant Professor.** Department of Biological Sciences, Florida Institute of Technology.
Research Scientist. Marine Resources Council, East Central Florida.
1983-1985 **Assistant Regional Officer.** Nature Conservancy Council, West Midlands Region, England.
1982-1983 **Natural Environment Research Council Postdoctoral Research Fellow.** University of Aberdeen, Scotland.
1981 **Graduate Research Assistantship.** School of Forest Resources, University of Maine.
1978-1981 **Research Studentship.** Funded by the Science and Engineering Research Council. Department of Zoology, University of Newcastle upon Tyne, England.

Responsibility

RESEARCH INTERESTS AND ADMINISTRATIVE EXPERIENCE:

Executive Director of Archbold Biological Station, an independent facility which conducts

extensive ecological research on its 8,800-acre scrub preserve on the Lake Wales Ridge and at its 10,500-acre working cattle ranch, Buck Island Ranch. Supervisory responsibility for 64 staff plus graduate students and interns. Research interests in the application of the scientific principles of conservation biology to reserve design and management, and planning for endangered species. Research for local and state agencies on ecosystem analysis, conservation biology, including endangered species management and design of protected areas, waterfowl and wading bird populations, and the utilization of computer geographical information systems for natural resources management. Extensive liaison with local, state, and federal agencies over conservation issues for a wide variety of Florida ecosystems. Major role in the conservation implementation for the Florida Wildlife Corridor.

TEACHING EXPERIENCE:

- Co-PI NSF sponsored “The Virtual Field” (2020 – current) to deploy remote and virtual learning opportunities at US field stations – with the Organization of Biological Field Station.
- Co-PI NSF sponsored faculty teaching enhancement program – Project FIRST and Project FIRST II – to promote inquiry-based learning in undergraduate education with 20 faculty in Florida universities and colleges. 1998-2004.
- Graduate courses and upper level undergraduate courses in Conservation Biology, Behavioral Ecology, and Evolutionary Biology. Managed the development of new large enrollment Freshman Biology class. Advisor for graduate and undergraduate Biological Research. 1986-1995
- Major advisor for 1 Ph.D. and 10 Masters students and service on a further 8 Ph.D. and 19 Masters committees. 1988-1995.

CONSERVATION EXPERIENCE:

- Gubernatorial Appointee, 2000-2006, Acquisition and Restoration Council, State of Florida, responsible for guiding land acquisition and land management under Florida’s Preservation 2000 and Florida Forever programs.
- Gubernatorial Appointee, 2006-2008, Chair, Babcock Ranch, Inc., State of Florida.
- Responsible for land acquisition and land management of scrub habitats at Archbold Biological Station. Participation in acquisition and management of protected areas of the Lake Wales Ridge. Oversee land management of a 10,500-acre working cattle ranch, the MacArthur Agro-ecology Research Center, devoted to research on sustainable agriculture.
- Board of Directors, Florida Chapter of The Nature Conservancy (1995-2000).
- Chair (1990-1994) of the Brevard County Environmentally Endangered Lands Selection Committee responsible for a \$55 million program to select lands for acquisition in east central Florida.
- Two-year position with the Nature Conservancy Council, the government wildlife and conservation agency in Great Britain. Primary duties included: providing advice to, and liaising with government, scientists and land managers, and voluntary and statutory conservation bodies; planning, supervising and conducting ecological surveys; casework on matters affecting sites of nature conservation value; and the management of nature reserves.
- Winston Churchill Traveling Fellowship (1979) to examine the status and conservation breeding waterfowl in the prairie and tundra regions of Canada and the U.S.A.
- Study tour of West Africa (1983) to provide an internal report to the government of the Ivory Coast on the country’s system of parks and protected areas.
- British Council Expedition (1977) with Diponegoro University to Central Java, Indonesia. Fieldwork on the coral reefs and fisheries off the island of Karimunjawa.

PROFESSIONAL SERVICE:

- Leadership Committee, LTAR Program USDA. 2016-2018
- Board of Directors, National Ecological Observatory Network, 2010-2014.
- Member, South Eastern Ecological Observatory Network, planning for the National Ecological Observatory Network, 2005-2015.
- Board of Directors, NatureServe, 2009-2015.
- World Wildlife Fund Technical Advisory Body for Lake Okeechobee Ranch Program. 2004- 2005
- Secretary, External Advisory Council, School for Natural Resources and the Environment, University of Florida. 2004-2008
- Committee Co-Chair, Research Infrastructure Committee for National Ecological Observatory Network (NEON)
- Meeting of 100 scientists for Long Term Ecological Research network (LTER) strategic planning effort, NSF. 2004
- President, Organization of Biological Field Stations, 2000-2002
- Natural Resources Advisory Commission, Board of County Commissioners, Highlands County, 1999-2020
- Long Range Planning Committee, American Institute of Biological Science, 1999-2001
- Ecological Society of America (ESA) Conference, Local Programs Committee, Ecological Society of America, 1999-2000
- Conference Committee, American Institute of Biological Sciences/Smithsonian Institution Year 2000 Conference, 1999-2000
- Council of Advisors for Research & Extension in Natural Resources, University of Florida, 1998-present
- Secretary, Long-term Studies Section, Ecological Society of America, 1998-2001
- Wading Bird Working Group, St. John's River Water Management District, 1998-2000
- Member at Large, Board of Directors, Organization of Biological Field Stations, 1998-1999
- Board of Directors, American Institute for Biological Sciences, 1997-1999
- Finance Committee, American Institute of Biological Sciences, 1997-1999
- Board of Trustees, Florida Chapter, The Nature Conservancy, 1995-2000
- Vice Chair, Nongame Wildlife Adv. Council, FL Fish and Game Commission, 1995-1996
- Secretary, Society for Conservation Biology, 1993-1996
- Technical Advisory Committee, National Estuary Program, EPA, 1992-1994
- Chair, Biodiversity Advisory Committee, National Estuary Program, EPA, 1992-1994
- Chair, Environmental Endangered Lands Selection Committee, Brevard County, 1990-1995

SELECTED ADDITIONAL PROFESSIONAL EXPERIENCE:

- National Ecological Observatory Network (NEON) Design Consortium meetings; Los Angeles, CA, 4-6 January 2005, Boston, MA, 14-18 March 2005; Estes Park, CO, 6-10 June 2005
- National Science Foundation, IGERT Panel review, Washington, DC, 27 – 28 January 2005.
- National Science Foundation, Co-PI for a national award to AIBS for development of a Project Execution Plan for the National Ecological Network. 2004-2005
- National Science Foundation 20-year review panel for LTER. Meetings 12 August 2001 Washington, DC, University of New Mexico Albuquerque, 25-27 October
- Organized a joint congressional briefing on invasive species by OBFS and the National Association of Marine Labs (NAML) on Capitol Hill, 20 February 2001.
- Organized the first NEON (National Ecological Observation Network) Workshop for the National Science Foundation, Archbold Biological Station, 9-12 January 2000.
- Moderator for American Institute of Biological Sciences' Congressional Roundtable Series

- “Using Science in Habitat Conservation Plans”, Washington, D.C. 8 February 1999.
- External Panel reviews for field stations funded by National Science Foundation including Organization for Tropical Studies, National Center for Ecosystem Analysis and Synthesis, Rocky Mountain Biological Laboratory, Sedgwick Reserve, University of California Santa Barbara, and University of Virginia Coastal Research Center.
 - Environmental Defense Fund Panel Member, to review the Endangered Species Act.
 - Reviewer for *Ibis*, *Bioscience*, *Animal Behavior*, *Auk*, *Wildfowl*, *Journal of Animal Ecol.*, *Conservation Biology*, *Photogrammetric Engineering & Remote Sensing*, *Natural Areas Journal*.
 - Editor, Proceedings of the Biodiversity of the Indian River Lagoon, Bull. Mar. Sci., 1995.
 - Consulting Editor for the Fifth Nordic Ornithological Congress, 1985.
 - Chair for sessions at meetings of the Society for Conservation Biology, Natural Areas Association, Ecological Society of America, ACES, International Association for Landscape Ecology.
 - Invited speaker (among many): Florida Native Plant Society; Florida Land Acquisition Partnership Workshops; University of British Columbia, University of Florida, University of Utah, Florida International University, University of Central Florida, University of South Florida, Gulf Cost University.

AWARDS:

- Florida Wildlife Federation Conservationist of the Year 2013
- Maker, Women Who Make America, 2012
- Guardian of the Everglades, 2012
- Fellow, American Association for the Advancement of Science, 2000
- Chairman’s Award, The Nature Conservancy, Florida Chapter for the Brevard County Environmentally Endangered Lands Program, 1996
- Conservation Colleague Award, The Nature Conservancy, Florida Chapter, 1995
- Natural Environment Research Council U.K. Post-Doctoral Award, 1981-1983
- Science and Engineering Research Council Post-Doctoral Award, 1981
- Young Award, highest undergraduate degree performance in the Natural Sciences, University of Newcastle upon Tyne, U.K., 1977

AFFILIATION TO PROFESSIONAL SOCIETIES:

- Ecological Society of America
- American Institute of Biological Sciences
- Fellow, American Association for the Advancement of Science

CONTRACTS AWARDED:

Year	Title	Funding Agency	P.I.(s)	Funding
2023-2025	An Integrated Laboratory Facility to Improve Research Capacity at Archbold Biological Station	National Science Foundation	A.David E.Boughton H.Swain	\$564734
2022-2023	Collaborative Long-Term Agro-Ecosystem (LTAR) efforts: Livestock Grazing in Rangelands and Pastures	USDA, Agricultural Research	H. Swain	\$511,0460
2021-2022	Collaborative Long-Term Agro-Ecosystem (LTAR) efforts: Livestock Grazing in Rangelands and Pastures	USDA, Agricultural Research	H. Swain	\$511,0460
2020-2021	Collaborative Long-Term Agro-Ecosystem (LTAR) efforts: Livestock Grazing in Rangelands and Pastures	USDA, Agricultural Research	H. Swain	\$523,090
2020-2021	RAPID: The Virtual Field: Educational mitigation for the Covid-19 Pandemic	National Science Foundation	C. Luke, Kari O’Connel, H Swain	\$199,030
2019-2020	Collaborative Long-Term Agro-Ecosystem (LTAR) efforts: Livestock Grazing in Rangelands and Pastures	USDA, Agricultural Research	H. Swain	\$523,090
2015-2018	FSML: Next generation instrumented buoy for Lake Annie.	National Science Foundation	H. Swain	\$181,897
2018-2019	Collaborative Long-Term Agro-Ecosystem (LTAR) efforts: Livestock Grazing in Rangelands and Pastures	USDA, Agricultural Research	H. Swain	\$523,090
2017-2019	Collaborative Long-Term Agro-Ecosystem (LTAR) efforts: Livestock Grazing in Rangelands and Pastures	USDA, Agricultural Research	H. Swain	\$523,090

2016-2017	Ecological Research and Conservation	Mitchell Foundation	H. Swain	\$5,000
2017-2018	Ecological Research and Conservation	Mitchell Foundation	H. Swain	\$5,000
2015-2018	CSBR: Natural History Collections: Transforming accessibility to the rich, site-based, multi-taxon collection of Archbold Biological Station	National Science Foundation	H. Swain	\$449,164
2014-2019	Collaborative Long-Term Agro-Ecosystem (LTAR) efforts: Livestock Grazing in Rangelands and Pastures	USDA, Agricultural Research	H. Swain	\$128,180
2014-2015	Activities for Archbold Biological Station on the Lake Wales Ridge in FY 2014-2015	Florida Fish and Wildlife Conservation Commission	H. Swain	\$22,297
2013-2015	Restoration of Rand and Generator House Building Roofs at Archbold Biological Station Phase 1I	Division of Historical Resources	H. Swain	\$348,724
2013	Highlands – Hicoria Restoration	Highlands County	H. Swain K. Main	\$84,971
2011-2013	Environmental Education Facility	Southwest Florida Water Management District	H. Swain	\$272,000
2011	Interpretive Displays-design and installation of educational exhibits, and a demonstration garden to education visitors to the new Adrian Archbold Center	Southwest Florida Water Management District	H. Swain	\$49,987
2010-2011	Expanding Historic Education at Archbold Station Project	Division of Historical Resources	H. Swain	\$19,350
2011-2012	Activities for Archbold Biological Station on the Lake Wales Ridge	Florida Fish and Wildlife Conservation Commission	H. Swain	\$17,500
2010-2013	Assessing Trade-offs Among Ecosystem Services in a Payment-for-Water Services Program on Florida Ranchland	Environmental Protection Agency	H. Swain	\$480,836
2009-2010	Archbold Biological Station; Green Building Initiative Planning Grant	The Kresge Foundation	H. Swain	\$100,000
2009-2010	Activities for Archbold Biological Station on the Lake Wales Ridge	Florida Fish and Wildlife Conservation Commission	H. Swain	\$17,500
2008-2011	Field Station Marine Lab- Increasing Capacity for Research and Education at Archbold Biological Station	National Science Foundation	H. Swain	\$299,000
2008-2009	Activities for Archbold Biological Station on the Lake Wales Ridge	Florida Fish and Wildlife Conservation Commission	H. Swain	\$17,500
2008	Lake Wales Ridge and the Environmental History of Florida		H. Swain	2,000
2007	Seminole Tribe of Florida, Non-Invasive Survey of Black Bear Population-- Brighton Reservation	Private	H. Swain	\$25,350
2007-2008	Activities for Archbold Biological Station on the Lake Wales Ridge	Florida Fish and Wildlife Conservation Commission	H. Swain	\$17,500
2006-2007	Restoration of Main Building Roof at Archbold Biological Station Phase 1	Florida Division of Historic Resources	H. Swain	\$350,000
2006-2007	Re-roofing of the Storehouse to restore the roof to its original material and appearance.	National Science Foundation	H. Swain	\$237,000
2006-2007	Assessing portfolio effectiveness and predicting outcomes in ecoregional conservation.	The Nature Conservancy R.J.Kose Project	D. Wilcove H. Swain	
2006-2009	Environmental Quality Incentives Program (EQIP)	United States Department of Agriculture	H. Swain K. Main	\$144,705
2006-2007	Lake Wales Ridge monitoring tasks 2005-2006	Florida Fish and Wildlife Conservation Commission	H. Swain R. Bowman E. Menges K. Main	\$17,000
2006	Grasslands Reserve Program; at the Reserve	USDA – Grasslands Reserve Program	H. Swain	\$175,340
2005 – ongoing	Wetland Reserve Program; Mary's Creek at the Reserve	USDA – Wetlands Reserve Program	H. Swain	\$971,000
2005-2008	Market-based program for environmental services on south Florida ranch lands	USDA – Conservation Innovation Grant through World Wildlife Fund	S. Lynch L. Shabman P. Bohlen H. Swain	\$272,878 share of \$999,923 award
2005-2008	"Scientific Exploration on a FL Cattle Ranch" a middle school science curriculum for grades 6-8	Florida Cattlemen's Association	H. Swain	\$10,500
2005-2006	LWR monitoring tasks 2006-2007	Florida Fish and Wildlife Conservation Commission	H. Swain R. Bowman R. Pickert E. Menges K. Main	\$17,000
2005 - 2007	Hurricane Impact Assessment in Sand Pine Scrub in South Central Florida	Division of Forestry	H. Swain	\$25,000

2005-2006	LWR monitoring tasks for FFWCC	Florida Fish and Wildlife Conservation Commission	H. Swain R. Bowman M. Deyrup R. Pickert E. Menges	\$48,678
2004-2006	Project FIRST 2, Faculty Institute for Reforming Science Teaching through Field Stations	University of Oregon via NSF-EHR	H. Swain	\$95,000
2005-2007	Restoration of scrub and cutthroat grass communities on the Lake Wales Ridge	US Fish and Wildlife Service Private Stewardship Grant Program	H. Swain	\$36,357
2004-2005	LIDAR flight for Archbold Biological Station	National Science Foundation (Supplement)	H. Swain E. Menges	\$10,000
2004-2006	Support for Archbold Biological Station, education program for the Ranch	Archbold Charitable Trust	H. Swain	\$50,000
2004-2008	FSML Expansion of Research Infrastructure at ABS	National Science Foundation	H. Swain	\$187,496
2003-2004	State of the Scrub – review of rare species on the LWR	Princeton University, USFWS, FFWCC	H. Swain D. Wilcove W. Turner	
2002-2003	NSF-Society for Conservation Biology	National Science Foundation	H. Swain	\$15,000
2002-2004	FSML Planning Grant for a Major New Land Addition at ABS	National Science Foundation	H. Swain	\$25,000
2002-2004	Best Management Practices for Beef Cattle Operations	South Florida Water Management District	P. Bohlen H. Swain	\$280,000
2001-2006	Faculty Institutes for Reforming Science Teaching II	National Science Foundation through Univ. of Oregon	J. Hodder D. Ebert-May H. Swain	\$95,650
2000-2001	Lake Placid Scrub Mitigation Project	Mr Alton Rogers South West Florida Water Management District	H. Swain	\$37,851
2000-2001	Use of IKONAS satellite imagery for vegetation mapping at MAERC	IFAS, University of Florida	H. Swain	\$7,900
2000-2001	FSML: Classroom and Laboratory Improvements for Archbold Biological Station	National Science Foundation	H. Swain P. Bohlen R. Bowman E. Menges	\$126,000
1999-2001	Best Management Practices for Beef Cattle Operations	South Florida Water Management District	P. Bohlen H. Swain	\$280,000
1999-2000	NSF's NEON Workshop at Archbold Biological Station, Jan 9-12, 2000	National Science Foundation	H. Swain	\$75,000
1999-2000	Supporting a new Research Biologist at Archbold Biological Station	Archbold Charitable Trusts	H. Swain	\$40,000
1998-1999	Conservation and Environmental Education for the Florida Scrub; Enhancing WWW Facilities at Archbold Biological Station	E.O. Dunn Foundation	H. Swain	\$10,000
1998-1999	A New Generation of Fire Research Equipment for Archbold Biological Station	National Science Foundation	H. Swain K. Main E. Menges	\$50,000
1998-1999	GIS Vegetation Mapping for the Lake Wales Ridge	U.S. Fish and Wildlife Service	H. Swain K. Main E. Menges R. Pickert	\$10,000
1998-1999	Faculty Institutes for Reforming Science Teaching Through Field Stations	National Science Foundation through Univ. of Oregon	J. Hodder D. Ebert-May H. Swain M. Deyrup	\$10,000
1997-1998	FSML Computer Network Facilities Improvement at Archbold Biological Station, Florida	National Science Foundation	H. Swain	\$149,000
1996-1998	Management Plan for the Lake Placid Scrub	Florida Game and Fresh Water Fish Commission	H. Swain K. Main	\$35,000
1997-1999	Best Management Practices for Beef Cattle Operations	South Florida Water Management District	H. Swain L. Collins	\$296,000
1995-1996	Use of Artificial Wetlands by Wading Birds	National Estuary Program, Environmental Protection Agency	H. Swain	\$49,000
1994-1997	Beef Cattle Ranching Research: Experimental Pastures	South Florida Water Management District	G.T. Bancroft J.W. Fitzpatrick H. Swain	\$450,000
1994-1995	Development of IRL Management Plan for Wading Birds	National Estuary Program	H. Swain	\$20,500
1993-1995	Scrub Jay Habitat Conservation Plan	USFWS through Brevard Co. Natural Resources Management Div.	H. Swain	\$150,000

1993-1994	Utilization of Coastal Marshes by Wading Birds	St. Lucie County	H. Swain	\$20,500
1993-1994	Utilization of Coastal Marshes by Wading Birds	St. Lucie County	H. Swain	\$8,000
1993-1994	Management of IRL Wetlands for	National Estuary Program, Environmental Protection Agency	H. Swain	\$10,500
1993-1994	Stormwater Outfalls to Indian River Lagoon	St. Johns Water Management District	G. Zarillo H. Swain	\$7,000
1992	GIS Analysis for the South Beaches Study	Coastal Planning and Engineering	H. Swain	\$10,500
1991-1992	Remote Sensing Methodologies for Estuarine Conditions	Technological Research and Development Corp.	H. Swain G. Zarillo D. Tamir R. Olsen	\$50,000
1991-1992	Impact of Impounded Marsh Management on Wading Bird Populations	St. Lucie County	H. Swain J. Shenker	\$24,000
1991	Conservation Plan for the City of Rockledge	City of Rockledge	H. Swain	\$3,500
1991	Land Use Assessment for the City of Stuart	Micromap Corporation	H. Swain	\$1,610
1990-1991	Best Management Practices for the Turkey Creek Basin	St. Johns River Water Management District	H. Swain A. Pandit	\$48,000
1990-1992	G.I.S. Land Use Mapping for the Indian River Lagoon Basin	St. Johns River Water Management District	H. Swain	\$76,000
1990-1991	Integrated Curriculum for Tropical Deforestation	Pew Charitable Trust	A. Woods H. Swain	\$15,000
1988	G.I.S. Turkey Creek Basin Study	East Central Florida Regional Planning Council	H. Swain D. Barile	\$6,000
1987	G.I.S. Vegetation Mapping for the South Indian River Lagoon Basin	South Florida Water Management District	H. Swain D. Barile	\$20,000
1986	Land Use and Population	South Florida Water Management District	H. Swain K. Glatzel	\$8,000
1981-1983	Foraging Behavior of Shelduck, <i>Tadorna tadorna</i>	Natural Environment Research Council, U.K.	H. Swain	\$30,000
1981	Foraging Strategies of Herring Gulls, <i>Larus argentatus</i>	Science and Engineering Research Council, U.K.	H. Swain	\$30,000
1979-1980	Management of breeding Goldeneye populations in Sweden	Waterfowl Association of Great Britain and Ireland	H. Swain	\$2,000
1978	Conservation of Waterfowl and Wetlands in North America	Winston Churchill Trust	H. Swain	\$4,000

PUBLICATIONS:

- Boeck, M., Gaiser, E., Swain, H.M., Brenner, M., Curtis, J., and Kenney W. 2023. Cyclical browning in a subtropical lake inferred from diatom records. *Frontiers in Ecology and Evolution*, Special Issue Integrating Conservation Biology and Paleobiology to Manage Biodiversity and Ecosystems in a Changing World. Volume 11-2023. <https://doi.org/10.3389/fevo.2023.1020024>
- Paudel, S., Gomez-Casanovas N., Boughton E.H., Chamberlain, S.D., Wagle P, Peterson B.L., Bajgain, R., Starks, P.J., Basara J., Bernacchi C.J., DeLucia E.H., Goodman L.E., Gowda P.H., Reuter, R., Sparks J.P., Swain, H.M., Xiao, X., and Steiner, J.L. 2023. Intensification differentially affects the delivery of multiple ecosystem services in subtropical and temperate grasslands. *Agriculture, Ecosystems and Environment* Volume 348 1 June 2023, <https://doi.org/10.1016/j.agee.2023.108398>
- Boughton, E.H., N. Gomez-Casanovas, H.M. **Swain**, C. Bernacchi, R. K. Boughton, K. Brinsko, H. Li, A. Rivero, E DeLucia, J. Sparks. 2022. Patch-burn grazing impacts forage resources in subtropical humid grazing lands. *Rangeland Ecology & Management* 84(1): 10-21. DOI: [10.1016/j.rama.2022.05.004](https://doi.org/10.1016/j.rama.2022.05.004)
- Williams, M., Welikhe, P., Bos, J., King, K., Akland, M., Augustine, D., Baffaut, C., Beck, E.G., Bierer, A., Bosch, D., Boughton, E., Brandani, C., Brooks, E., Buda, A., Cavigelli, M., Faulkner, J., Feyereisen, G., Fortuna, A., Gamble, J., Hanrahan, B., Hussain, M.Z., Kohmann, M., Kovar, J., Lee, B., Leytem, A., Liebig, M., Line, D., Macrae, M., Moorman, T., Moriasi, D., Nelson, N., Ortega-Pieck, A., Osmond, D., Pisani, O.,

- Ragosta, J., Reba, M., Saha, A., Sanchez, J., Silveira, M., Smith, D., Spiegel, S., **Swain**, H., Unrine, J., Webb, P., White, K., Wilson, H., Yasarer, L. 2022. P-FLUX: A phosphorus budget dataset spanning diverse agricultural production systems in the U.S. and Canada. *Journal of Environmental Quality*. 04 April 2022
<https://doi.org/10.1002/jeq2.20351>
- Gilliam, F. S., Fourqurean, J. W., Jeffrey, W. H., Swain, H. M., eds. (2022). Environmental Threats to the State of Florida—Climate Change and Beyond. Lausanne: Frontiers Media SA. doi: 10.3389/978-2-88974-332-2
- Lomeu, A., A. Shukla, S. Shukla, G. Kiker, C.-L. Wu, G.S. Hendricks, E.H. Boughton, R. Sishodia, A.C. Guzha, H.M. **Swain**, P.J. Bohlen, D.G. Jenkins, J.E. Fauth. 2022. Using biodiversity response for prioritizing participants and service provisions in a payment-for-water-storage program in the Everglades basin. *Journal Hydrology*, 609, 127618.
<https://doi.org/10.1016/j.jhydrol.2022.127618>
- Goodrich, David, Heilman, Philip, Anderson, Martha; Baffaut, Claire; Bosch, David; Cosh, M.H.; Endale, Dinku; Veith, Tamie; Kleinman, Peter; Langendoen, Eddy; Pierson, Fred; Schomberg, Harry; Smith, Douglas; Strickland, Timothy; Tseegaye, Teferi; Awada, Tala; **Swain**, Hilary; Derner, Justin; Bestelmeyer, Brandon; Bohlen, Marty; Baker, John; Carlson, Bryan; Huggins, David; Archer, David. 2022. Long Term Agroecosystem Research Experimental Watershed Network. *Hydrological Processes March 2022*. DOI: [10.1002/hyp.14534](https://doi.org/10.1002/hyp.14534)
- Williams, M., Welikhe, P., Bos, J., King, K., Akland, M., Augustine, D., Baffaut, C., Beck, E.G., Bierer, A., Bosch, D., Boughton, E., Brandani, C., Brooks, E., Buda, A., Cavigelli, M., Faulkner, J., Feyereisen, G., Fortuna, A., Gamble, J., Hanrahan, B., Hussain, M.Z., Kohmann, M., Kovar, J., Lee, B., Leytem, A., Liebig, M., Line, D., Macrae, M., Moorman, T., Moriasi, D., Nelson, N., Ortega-Pieck, A., Osmond, D., Pisani, O., Ragosta, J., Reba, M., Saha, A., Sanchez, J., Silveira, M., Smith, D., Spiegel, S., **Swain**, H., Unrine, J., Webb, P., White, K., Wilson, H., Yasarer, L. 2021. LTAR Phosphorus Budget Summary. *Ag Data Commons*.
<https://doi.org/10.15482/USDA.ADC/1523365>
- Sullivan, K. L., E. E. Gaiser, H. M. **Swain**. 2021. Dissolved organic carbon as a driver of seasonal and multi-year phytoplankton assembly oscillations in a subtropical monomictic lake. *Limnol. Oceanogr.* 67, S1., S416-S429, Association for the Sciences of Limnology and Oceanography. <https://doi.org/10.1002/lno.12004>
- Paudel, S., A. B. Cobb, E. H. Boughton, S. Spiegel, R. K. Boughton, M. L. Silveira, H. M. Swain, R. Reuter, L. E., Goodman, and J. L. Steiner. 2021. A framework for sustainable management of ecosystem services and disservices in perennial grassland agroecosystems. *Ecosystems* Vol 12 (11). e03837. DOI <https://esajournals.onlinelibrary.wiley.com/doi/full/10.1002/ecs2.3837>
- Pilla, R.M., E. M Mette, C.E. Williamson and 86 co-authors T. V. Zhukova. August 2021. Global data set of long-term summertime vertical temperature profiles in 153 lakes *Scientific Data* 8(1) DOI: [10.1038/s41597-021-00983-y](https://doi.org/10.1038/s41597-021-00983-y)
- Coffin, A.W., **V. Sclater, H. Swain**, G.E. Ponce-Campos, and L. Seymour. 2021. Ecosystem services in working lands of the southeastern USA. *Frontiers in Sustainable Food Systems and Ecosystem Services*. 02 March 2021
<https://doi.org/10.3389/fsufs.2021.541590>
- Doubek, J.P., O. Anneville, G. Dur, A.M. Lewandowska, V.P. Patil, J.A. Rusak, N. Salmaso, C.T. Seltmann, D. Straile, P. Urrutia-Cordero, P. Venail, R. Adrian, M.B. Alfonso, C.L. DeGasperi, E. de Eyto, H. Feuchtmayr, E.E. Gaiser, S.F. Girdner, J.L. Graham, H. Grossart, J. Hejzlar, S. Jacquet, G. Kirillin, M.E. Llamas, S.S. Matsuzaki, E.R. Nodine, M.C. Piccolo, D.C. Pierson, A. Rimmer, L.G. Rudstam, S. Sadro, H.M. Swain, S.J. Thackeray, W. Thiery, P. Verburg, T. Zohary, and J.D. Stockwell. et al. 2021. The extent and variability of storm-induced temperature changes in lakes measured with long-term and high-frequency data. *Limnology and Oceanography*.
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