

Postdoctoral Research Associate in Integrated Crop Pollination and Pest Management

The Pennsylvania State University seeks a Postdoctoral Research Associate to participate in a multidisciplinary, multi-state effort focused on developing resilient and sustainable crop pollination with wild bees (www.icpbees.org). The work at Penn State will be focused in pumpkin fields and apple orchards. The position will be housed at the University Park campus, in the Department of Entomology, University Park, Pennsylvania. Work will also occur from the Fruit Research and Extension Center, Biglerville, Pennsylvania, about a 3 hour drive from University Park, and a center of tree fruit production in the state and the region. Commercial field settings are typically comprised of diverse high-value horticultural cropping systems, nested in forested or urbanizing landscape with significant elevation relief.

We seek a highly motivated scientist to conduct and supervise studies that define the community composition and abundance of bees in pumpkin and apple crops in Pennsylvania, and the value of wild bees for providing pollination services in these crops. Studies will also evaluate effects of landscape, habitat manipulation, and supplementation with managed bees on bee abundance and pollination services. The candidate will collaborate on estimating nest density with trapping studies and with molecular methods for social species. Additional collaboration will involve Extension educational efforts, including developing an Integrated Crop Pollination demonstration site for apples, and participation in studies that enable economic evaluations. The successful candidate will work well with personnel in labs that advance IPM in vegetable and orchard crops through studies in applied ecology and Extension Educational programs with a wide range of pest and beneficial arthropod species.

The position requires a Ph.D. in Entomology or Ecology, and knowledge of agricultural systems. Knowledge of bee biology and identification, pollination biology, landscape and statistical analyses, immunoassays, and molecular tools used for haplotyping, will be of value for competing for this position. The position requires a valid driver's license, extensive field work, including early-morning hours, and overnight travel during pollination seasons for apples (April and early May) and pumpkins (mid-July through August). The candidate must possess excellent communication and organizational skills and demonstrate evidence of effective writing through peer-reviewed publications.

This is a full-time, appointment available for one year with the opportunity for renewal contingent on availability of federal funds. Start date is late winter or early spring of 2013. Interested applicants should send a letter of interest, curriculum vitae, contact information for three references, and examples of publications via email at sjf4@psu.edu, to Shelby Fleischer, Department of Entomology, 501 ASI Building, The Pennsylvania State University, University Park, PA 16802. Also send a second copy via email at djb134@psu.edu, to David Biddinger, Fruit Research and Extension Center, P.O. Box 330, 290 University Dr. Biglerville, PA 17307. Employment will require successful completion of background check(s) in accordance with University policies.