

Dung beetle diversity affects Florida livestock producers

March 6 2012

Dung beetles are important to healthy cattle pasture ecosystems as they provide for nutrient recycling, removal of waste products from the soil surface and assist in the reduction of pestiferous flies.

Numerous exotic [dung beetles](#) have been accidentally or intentionally introduced to the North American continent and several of these have become established.

In "Indigenous and Exotic Dung Beetles (Coleoptera: Scarabaeidae and Geotrupidae) Collected in Florida Cattle Pastures," which will appear in the next issue of *Annals of the Entomological Society of America*, [entomologists](#) from the University of Florida surveyed for the presence and distribution of dung beetles on four cattle farms in north central Florida over a 3.5-yr period, and they identified 39 species from 20 genera, with a total of 62,320 beetles collected in traps.

Although most were natives, six exotic species were found as well, including four of the six most commonly collected species. Furthermore, none of these exotics were intentionally introduced to Florida.

This study provides evidence that each of these farms exhibited dynamic and unique dung beetle diversity.

According to the authors, many [livestock producers](#) request information on rearing dung beetles, but they are unaware that in most cases they already have a complementary assemblage of dung beetles on their farms,

and that their herd management practices greatly influence the effectiveness of these beetles.

The study also offers a profile of dung beetle activity of much longer duration than others published in the United States, and it documents that variations between sites can be substantial. Four of the six most commonly collected beetles were introduced species, suggesting that either a niche was available for these species on cattle farms in Florida or that these species displaced the more generalist and perhaps adaptive [native species](#).

More information: entsoc.org/Pubs/Periodicals/Ann

Provided by Entomological Society of America

Citation: Dung beetle diversity affects Florida livestock producers (2012, March 6) retrieved 16 June 2024 from <https://phys.org/news/2012-03-dung-beetle-diversity-affects-florida.html>

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.
