PSALLUS VARIABILIS (FALLÉN) AND P. ALBIPENNIS (FALLÉN), TWO EUROPEAN PLANT BUGS ESTABLISHED IN NORTH AMERICA, WITH NOTES ON TAXONOMIC CHANGES (HEMIPTERA: HETEROPTERA: MIRIDAE)

A. G. Wheeler, Jr. and E. Richard Hoebeke

(AGW) Bureau of Plant Industry, Pennsylvania Department of Agriculture, Harrisburg, Pennsylvania 17110; (ERH) Department of Entomology, Cornell University, Ithaca, New York 14853.

Abstract.—The Palearctic phyline mirids Psallus variabilis (Fallén) and P. albipennis (Fallén) were collected and found established on Long Island, New York, in 1981–1982. These are the first substantiated records for variabilis in North America and the first published record of a breeding population of albipennis in North America. On Long Island, adults and nymphs of P. variabilis were collected from staminate inflorescences of scrub oak, Quercus ilicifolia Wang.; adults also were taken from Q. coccinea Muenchh. and several other plants. Adults and nymphs of P. albipennis were collected from leaves and stems of common sagewort, Artemisia campestris L.

The adult and fifth-instar nymph of both species are described and illustrated; the male genitalia of each species also are illustrated. A review of the European literature discussing host plants and seasonal history is presented for both species. In addition, an unpublished record of *P. albipennis* from Minnesota is given. *Psallus waldeni* Knight is proposed as a junior synonym of *P. albipennis*, new synonymy; and *albipennis* is formally transferred from *Plagiognathus* to *Psallus*, new combination.

As part of the USDA-APHIS "High Hazard Pest Survey" program, Hoebeke (1980) identified the mirid *Psallus variabilis* (Fallén), based on a specimen collected at Oyster Bay, Long Island, N.Y. Although Van Duzee (1889) had reported this European plant bug from Ontario and later (1894) from New York, Knight (1927), after examining Van Duzee's specimens, considered them to represent a native species, *Lepidopsallus rubidus* var. *atricolor* Knight. The Long Island collection thus is the first New World record for *P. variabilis*.

We visited the Oyster Bay area in May 1981 and 1982 to confirm the establishment of *P. variabilis* and to determine its host range. On the Long