



## Five species of spider mites (Acari: Prostigmata: Tetranychidae) from Japan with descriptions of two new species

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### Abstract

Two new species of the spider mite family Tetranychidae are described and illustrated from Japan: *Oligonychus camelliae* n. sp. from *Camellia japonica* L. (Theaceae) at Shinobuyama, Fukushima, Honshu, and *Tetranychus misumaiensis* n. sp. from *Apios* sp. (Fabaceae) at Misumai, Sapporo, Hokkaido. *Oligonychus rubicundus* Ehara is a valid species differing from *O. formosanus* Lo by the shape of the peritreme and aedeagus, and *O. shinkajii* Ehara is regarded as a junior synonym of *O. modestus* (Banks). A Japanese mite *Eutetranychus africanus* (Tucker) has so far been referred to *E. orientalis* (Klein) in error.

**Key words:** Acari, Tetranychidae, *Eutetranychus*, *Oligonychus*, *Tetranychus*, new species, Japan

### Introduction

In recent years several taxonomic reports on the spider mite family Tetranychidae from Japan have been published (Ehara, 1999; Ehara & Yamaguchi, 2001; Ehara & Ohashi, 2002, 2005; Saito *et al.*, 2004; Ehara & Gotoh, 2006, 2007). Thus a total of eighty-seven species of spider mites were previously known to occur in Japan. This paper is concerned with five species belonging to the genera *Eutetranychus*, *Oligonychus* and *Tetranychus* from this country, including two new species which are described and illustrated.

### Material and methods

The collected mites were preserved in 70% ethyl alcohol and later mounted in Hoyer's medium on glass slides for examination. Mites were examined under an Olympus BHS compound microscope equipped with phase contrast system. Drawings were made using a camera lucida attached to the microscope.

The setal notations used in the description generally follow Lindquist's (1985) system. The measurements are given in micrometers. The mean is followed by the measurement of the holotype in parentheses. The holotypes and part of the paratypes are deposited in the collections of the National Museum of Nature and Science, Tokyo (NSMT); the remainder of the paratypes is retained in the Kyoto University Museum (KUM).

### *Eutetranychus africanus* (Tucker)

*Anychus africanus* Tucker, 1926: 5, pl. 4, figs. A–G. [Type locality: Durban, Natal; type host: orange, lemon and frangi-