

Frankliniella

Generic diagnosis

Female macropterous, sometimes wings reduced. Head usually a little wider than long; maxillary palps 3-segmented; eyes usually with 5 pigmented facets; ocellar setae I present; setae III variable in position, usually elongate. Antennae 8-segmented (rarely 7); segment I without paired dorso-apical setae, III and IV with sense-cones forked, III–VI with some microtrichia on both surfaces. Pronotum usually with two pairs of long setae at anterior margin and two pairs of long posteroangular setae; usually five pairs of posteromarginal setae, S2 setae elongate with extra pair S1 medially. Mesonotum with median pair of setae usually near posterior margin; campaniform sensilla present. Metanotum with varied sculpture; median pair of setae usually at anterior margin; campaniform sensilla present or absent. Fore wing, when fully developed, with complete setal row on first and second veins; posteromarginal fringe cilia wavy. Prosternal ferna weakly connected at middle; basantra membranous, without setae; prospinasternum broad and transverse. Mesosternum with sternopleural sutures complete; endofurca with spinula. Metasternal endofurca without spinula. Tarsi 2-segmented. Tergites without craspeda; tergite II with three lateral marginal setae; IV or V–VIII with paired ctenidia, VIII with ctenidia anterolateral to spiracles; IX with MD setae well-developed, two pairs of campaniform sensilla present or anterior pair absent; tergite X with longitudinal split complete. Sternites without craspeda or discal setae (sternite II rarely with one or two discal setae); sternite I with three microsetae near anterior margin; sternite II with two pairs of posteromarginal setae, III–VII with three pairs, all posteromarginal setae arising at posterior margin; laterotergites without discal setae. Male tergite IX with posteroangular setae often stout; sternites III–VII each with a pore plate.

Relationship data

Thripidae sub-family Thripinae: this is a diverse group involving more than 230 genera. This is one of nine genera recognised in the *Frankliniella* genus-group (Mound, 2002). All of the species have ocellar setae pair I present in front of the first ocellus, paired ctenidia are present on the abdominal tergites, and on tergite VIII the ctenidia are antero-lateral to the spiracles. The only other members of this genus-group recorded from China are *Firmothrips*, *Parabaliiothrips* and *Yaobinthrips*.



intonsa head & thorax



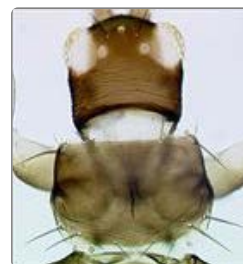
intonsa tergite VIII-IX



schultzei head & pronotum



schultzei tergites VII-IX



tenuicornis head & pronotum



tenuicornis meso & metanota



tenuicornis tergites VIII-IX



occidentalis head & thorax



occidentalis tergites VII-VIII



cephalica antennal segment III



williamsi sternites I-III

Biological data

Members of this genus are associated with a very large number of different plant species, and some are highly polyphagous. Although usually associated with flowers, some species breed both in flowers and on young leaves. A few species are important horticultural pests, and these are also vectors of the crop-damaging tospovirus diseases.

Distribution data

Most species of this genus are from the New World, particularly from the Neotropics (Nakahara, 1997), but several have become widespread around the world, and one aberrant species (*zizaniophila*) is endemic to China (Mirab-balou *et al.*, 2014).

Nomenclatural data

Frankliniella Karny, 1910: 46. Type species *Thrips intonsa* Trybom 1895, by subsequent designation of Hood, 1914: 37.

With nearly 240 species, this is one of the largest genera of Thysanoptera (ThripsWiki, 2018). Most of the species are from the New World, but the 11 below have been listed from China. Judging from the description, *hainanensis* is the same species as *schantzei*, as is the reference from China of *gossypii* Shiraki.

cephalica (Crawford DL, 1910: 135). (*Euthrips*)

hainanensis Zheng & Feng, 2009: 173.

intonsa (Trybom, 1895: 182). (*Thrips*)

lilivora Kurosawa, 1937: 269.

occidentalis (Pergande, 1895: 392). (*Euthrips*)

pallida (Uzel, 1895: 101). (*Physopus*)

schantzei (Trybom, 1910: 151). (*Physopus*)

tenuicornis (Uzel, 1895: 99). (*Physopus*)

tritici (Fitch, 1855: 385). (*Thrips*)

williamsi Hood, 1915: 19.

zizaniophila Han & Zhang, 1982: 210.

References

Mirab-balou M, Tong XL & Chen XX (2014) Re-description of aquatic grass-inhabiting thrips, *Frankliniella zizaniophila*, with remarks on its systematic position within the genus *Frankliniella* (Thysanoptera). *Journal of Insect Science* **14** (154): 1–7.

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Nakahara S (1997) Annotated list of the *Frankliniella* species of the world (Thysanoptera: Thripidae). *Contributions on Entomology, International* **2**: 355–389.

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