

A review of the genus *Acompsia* Hübner, 1825, with description of new species (Gelechiidae)

PETER HUEMER* & OLE KARSHOLT**

* Tiroler Landesmuseum Ferdinandeum, Naturwissenschaftliche Sammlungen, Feldstraße 11a, A-6020 Innsbruck, Austria. E-mail: p.huemer@tiroler-landesmuseum.at

** Zoologisk Museum, University of Copenhagen, Universitetsparken 15, DK-2100 Copenhagen, Denmark. E-mail: Okarsholt@zmuc.ku.dk

Abstract. The Palaearctic genus *Acompsia* is revised and two subgenera are considered: *Acompsia* Hübner, 1825 and *Telephila* Meyrick, 1923. Altogether 17 species are dealt with in detail and genitalia and adults are figured. 7 new species are described: *Acompsia* (*A.*) *pyrenaella* sp. n. (Spain: Pyrenees), *A.* (*A.*) *ponomarenkoae* sp. n. (Albania, Greece), *A.* (*A.*) *schepleri* sp. n. (Turkey), *A.* (*A.*) *fibigeri* sp. n. (Turkey), *A.* (*A.*) *bidzilyai* sp. n. (Russia: Transbaikalia), *A.* (*A.*) *caucasella* sp. n. (Russia: Caucasus) and *A.* (*T.*) *syriella* sp. n. (Syria). Lectotypes for *A. maculosella* (Stainton, 1851), *A. dimorpha* Petry, 1904 and *A. minorella* (Rebel, 1899) and a neotype for *A. tripunctella* ([Denis & Schiffermüller], 1775) are designated.

Zusammenfassung. Die paläarktische Gattung *Acompsia* wird revidiert und zwei Untergattungen werden berücksichtigt: *Acompsia* Hübner, 1825 und *Telephila* Meyrick, 1923. Insgesamt 17 Arten werden detailliert behandelt und Genitalien sowie Adulte abgebildet. 7 neue Arten werden beschrieben: *Acompsia* (*A.*) *pyrenaella* sp. n. (Spanien: Pyrenäen), *A.* (*A.*) *ponomarenkoae* sp. n. (Albanien, Griechenland), *A.* (*A.*) *schepleri* sp. n. (Türkei), *A.* (*A.*) *fibigeri* sp. n. (Türkei), *A.* (*A.*) *bidzilyai* sp. n. (Russland: Transbaikalien), *A.* (*A.*) *caucasella* sp. n. (Russland: Kaukasus) und *A.* (*T.*) *syriella* sp. n. (Syrien). Lectotypen für *A. maculosella* (Stainton, 1851), *A. dimorpha* Petry, 1904 und *A. minorella* (Rebel, 1899) sowie ein Neotypus für *A. tripunctella* ([Denis & Schiffermüller], 1775) werden designiert.

Key words. Lepidoptera, Gelechiidae, *Acompsia*, revision, new species.

Acompsia is a genus of 17 species of gelechiid moths whose members are mainly distributed in montane areas of Europe. The definition of the genus is somewhat disputed and pending on authors includes or excludes taxa of *Telephila* Meyrick, 1923 (see below). However, the taxonomy of species was regarded as well known until very recently. The discovery of a new species in the Italian Alps (Huemer 1998) revealed a number of additional taxonomic problems within the genus. Specimens hitherto assigned to *A. tripunctella* frequently proved misidentified and sometimes turned out to belong to undescribed taxa. Consequently a review of the genus appeared necessary.

Abbreviations of museums and private collections:

BLDZ – coll. G. Baldizzone, Asti, Italy; BUSZ – coll. J. Buszko, Toruń, Poland; BMNH – The Natural History Museum, London, UK; DEI – Deutsches Entomologisches Institut im ZALF e. V., Eberswalde, Germany; GRÜN – coll. T. Grünwald, Landshut, Germany; HEND – coll. H. Hendriksen, Fårevejle, Denmark; MNG – Museum der Natur, Gotha, Germany; NHMW – Naturhistorisches Museum, Vienna, Austria; TLMF – Tiroler Landesmuseum Ferdinandeum, Innsbruck, Austria; ZMKU – Zoological Museum, University of Kiev, Ukraine; ZMUC – Zoologisk Museum, University of Copenhagen, Denmark; ZMUH – Zoological Museum, University of Helsinki, Finland; ZSM – Zoologische Staatssammlung, Munich, Germany.

Check-list of *Acompsia**Acompsia* Hübner, 1825Subgenus *Acompsia* Hübner, 1825

- A.(A.) cinerella* (Clerck, 1759)
A.(A.) pyrenaella sp. n.
A.(A.) antirrhinella (Millière, 1866)
A.(A.) maculosella (Stainton, 1851)
A.(A.) dimorpha Petry, 1904
A.(A.) subpunctella Svensson, 1966
A.(A.) delmastroella Huemer, 1998
A.(A.) muellerrutzi Wehrli, 1925
A.(A.) caucasella sp. n.
A.(A.) minorella (Rebel, 1899)
A.(A.) tripunctella ([Denis & Schiffermüller], 1775)
A.(A.) ponomarenkoae sp. n.
A.(A.) schepleri sp. n.
A.(A.) fibigeri sp. n.
A.(A.) bidilyai sp. n.

Subgenus *Telephila* Meyrick, 1923

- A.(T.) schmidtellus* (Heyden, 1848)
A.(T.) syriella sp. n.

Key to the species (external characters)

Several *Acompsia* species are very similar in external characters, and the key should only be taken as a guideline. In cases of doubt the genitalia should be examined. Females of *A. muellerrutzi*, *A. caucasella* sp. n., *A. schepleri* sp. n., *A. fibigeri* sp. n., *A. bidilyai* sp. n. and *A. syriella* sp. n. are unknown.

1. Segment 2 of labial palpus with scale brush; forewing orange-brown or yellow 2
- Segment 2 of labial palpus slender; forewing brown 3
2. Forewing orange-brown mottled with some black scales *A. schmidtellus*
- Forewing straw yellow mottled with many black scales *A. syriella* sp. n.
3. Forewing unicolorous, without any markings *A. cinerella*
- Forewing with more or less distinct spots 4
4. Forewing light ochreous brown, with dark subterminal fascia *A. caucasella* sp. n.
- Forewing dark brown to greyish brown, rarely dark ochreous brown, without subterminal fascia 5
5. Forewing with dark subcostal patch at about two-thirds *A. maculosella*
- Forewing without subcostal patch 6
6. Forewing with small subbasal patch of dark scales *A. bidilyai* sp. n.
- Forewing without subbasal patch of dark scales 7
7. Forewing light greyish brown, with indistinct light fascia at four fifths *A. minorella*
- Forewing ochreous brown to fuscous grey-brown, without light fascia 8
8. Forewing fuscous grey-brown; female distinctly brachypterous *A. dimorpha*
- Forewing ochreous brown to light greyish brown; female smaller than male, not strongly brachypterous 9
9. Adult small (wingspan male 14–17 mm); forewing dark to light greyish brown, without darker veins and without darker dots along termen 10
- Adult larger (wingspan male 17–24 mm); forewing light ochreous brown or rarely light greyish brown, with or without dark veins, usually with darker dots along termen 12

10. Forewing dark grey-brown with four black spots *A. muellerrutzi*
 – Forewing light greyish brown to shining olive-brown 11
11. Forewing light greyish brown, mottled with light yellow; female of same size as male
 *A. subpunctella*
 – Forewing olive brown, slightly shining; female smaller and more narrow-winged than male
 *A. delmastroella*
12. Forewing (in male) with one black spot 13
 – Forewing (in male) with three black spots 14
13. Forewing with stripes of black scales between veins; apex rounded *A. schepleri* sp. n.
 – Forewing without stripes of black scales; apex weakly pointed *A. fibigeri* sp. n.
14. Forewing with very distinct spots, terminal dots well developed; female about size of male
 *A. antirrhinella*
 – Forewing with distinct though small spots; female smaller than male 15
15. Forewing with or without terminal dots; female slightly brachypterous, with narrower
 forewings than male *A. tripunctella*
 – Forewing with terminal dots; female reasonably brachypterous, with forewing only half as
 broad as in male 16
16. Moderately small moths (male 17–21 mm, female 15 mm); forewing with groups of black
 scales between veins; female reasonably brachypterous, with forewing only half as broad
 as in male (southwestern Europe) *A. pyrenaella* sp. n.
 – Moderately large moths (male 20–24 mm, female 16–17 mm); forewing with scattered
 black scales; female reasonably brachypterous, with forewing only half as broad as in male
 (southeastern Europe) *A. ponomarenkoae* sp. n.

Acompsia Hübner 1825 [1816]: 409

Type species: [*Phalaena*] *cinerella* Clerck 1759: pl. 11, fig. 6, by subsequent designation (Duponchel 1838: 19) (see Sattler 1973: 164).

Brachycrossata Heinemann 1870: 323 (junior objective synonym).

Type species: [*Phalaena*] *cinerella* Clerck 1759: pl. 11, fig. 6, by subsequent designation (Meyrick 1925: 141) (see Sattler 1973: 177).

Telephila Meyrick, 1923: 626.

Type species: *Ypsolophus schmidtellus* Heyden 1848: 954, by original designation.

Adult. Antenna brown, in most species indistinctly lighter ringed, in male with short cilia. Head, thorax and tegula in all species concolourous with forewing, head often with lighter scales above eye. Forewing sub-rectangular to almost sub-triangular, light to dark brown (occasionally orange or yellow), without or with up to four black spots and often black stripes or patches; termen from rounded to emarginated below apex, in some species with black spots at end of veins. Hindwing broadly sub-rectangular, only with a slight emargination beyond apex. Tip of abdomen yellow. Female in most species smaller than male; in some species slightly to reasonably brachypterous, most pronounced in *A. dimorpha* (females of 6 species unknown, perhaps brachypterous).

Male genitalia. Uncus broad, sub-rectangular, fused with tegumen; gnathos with small culcitula, covered with microtrichia, distal part a strong and long hook; tegumen about twice width of uncus, with parallel outer margin, anteriodorsal margin

with moderately weak emargination, pedunculi small; valva separated into ventroanterior (sacculus) and dorsoposterior lobes (cucullus); cucullus distally dilated, with straight posterior margin and broad semioval setose apical part; sacculus a lobe, distal part densely covered with microtrichia, fused with vinculum by a membrane; vinculum consisting of two long and narrow, distally usually enlarged sclerites, distally fused by a membrane; juxta absent; anellus with two small setose humps dorsally; aedeagus weakly inflated, apicoventrally with rounded plate, apicodorsal part with or without dentate sclerite at base of vesica, vesica with (sg. *Acompsia*) or without (sg. *Telephila*) spiralled sclerotized distal part.

Female genitalia. Papillae anales large; apophyses posteriores about 1.5 to three times length of apophyses anteriores; apophyses anteriores about length of segment VIII; segment VIII sclerotized dorsally and ventrally, without specialised sclerites; sclerotized sternite occasionally prolonged into antrum, membranous in between; ostium submerged under the margin of segment VIII; antrum broadly funnel-shaped; ductus bursae short, with sclerites near corpus bursae; corpus bursae large, pyriform, with (sg. *Acompsia*) or without (sg. *Telephila*) strong sclerite at entrance of ductus seminalis at right hand side and about middle to anterior third of corpus bursae; left hand side of corpus bursae with patch of microtrichia and small appendix bursae.

Distribution. Species of *Acompsia* are mainly restricted to mountains of the Western Palaearctic region. Several taxa are endemic to limited areas, whereas only one species, *A. cinerella*, is widely distributed throughout Europe and Palaearctic Asia. Records from outside the Palaearctic region apply to other genera (see below).

Biology. Host-plant relationships within the genus are largely unknown. Mosses and herbaceous plants (Scrophulariaceae, Plantaginaceae, Onagraceae and Lamiaceae) are reported as host-plants. The adults (especially the males) are usually attracted to light; females of several species fly little and are rare in collections or even unknown. Most of the species live in the montane to alpine zone, preferably in various types of meadows and woodland edges.

Systematic position. *Acompsia* is considered as a member of the gelechiid subfamily Dichomeridinae, which is defined by several synapomorphic character states such as the presence of parategminal sclerites, divided valva, anteriorly tube-like tegumen with well developed ventral wall and specialised muscles (Ponomarenko 1992; 1997a). The phylogeny and taxonomy of the Dichomeridinae has been studied in detail by Ponomarenko (1997a), according to whom two genera, *Helcystogramma* Zeller, 1877 and *Acompsia* (including *Telephila*, see below) form a more ancestral branch, defined by the absence of a juxta as synapomorphy. *Acompsia* s. l. is characterised by two apomorphic characters: a) sacculus with stretched apex, superposed ventrally and b) aedeagus with separate dorsal plate (Ponomarenko 1997a: 307). According to this author *Acompsia* s. str. is a monophyletic entity, based on the sclerites of ductus bursae near the entrance to corpus bursae. It remains doubtful to us whether sclerites of the ductus bursae are meant as they occur in both subgenera. However the sclerites at the entrance of the ductus seminalis may be regarded as an apomorphy of *Acompsia* s. str.

The genus *Telephila* Meyrick, 1923, was established to include one European and one Australian species, and placed next to *Dichomeris* Hübner, 1818 (Meyrick 1925:

173–174). The European species, *A. schmidtellus* (Heyden, 1848), and *A. syriella* sp. n. differ from the species here included in *Acompsia* s. str. by the presence of an apical tuft on segment 2 of the labial palpus, and by the distomedially curved sacculus. The latter was regarded as a synapomorphy for *Telephila* by Ponomarenko (1997a). We consider none of these two and further characters (Table 1) being of generic importance within the Dichomeridinae. In accordance with Ponomarenko (1997b: 10) and Elsner *et al.* (1999: 57) we therefore treat *Telephila* as a synonym of *Acompsia*, however, giving it subgeneric rank.

Table 1. Important diagnostic characters of subgenera *Acompsia* and *Telephila*

Character	Subgenus <i>Acompsia</i>	Subgenus <i>Telephila</i>
Labial palpus segment 2	without ventral scale brush	with strong ventral scale brush
Sclerites of vinculum	distally enlarged	without distal broadening
Vesica	distal part sclerotized, spiralled	distal part not sclerotized, nor spiralled
Entrance of ductus seminalis into corpus bursae	with strong sclerite	without sclerite

Meyrick (1925: 142) treated the genera *Cathegesis* Walsingham, 1910, and *Oxypteryx* Rebel, 1911, as synonyms of *Acompsia*. *Oxypteryx*, with its only species *jordanella* Rebel, 1911, has been treated as separate from *Acompsia* since Amsel (1935: 265). *Cathegesis*, with its three Neotropical species (*angulifera* Walsingham, 1897, *psoricopterella* (Walsingham, 1892) and *vinitincta* (Walsingham, 1910)) (Meyrick 1925: 142; Becker 1984: 49) is not congeneric with *Acompsia* (Sattler, pers. comm.).

In the past a number of non-Palaeartic species have been assigned to *Acompsia* and *Telephila*. Meyrick (1925) listed 15 species in *Acompsia* and four in *Telephila*. In addition to the four species listed above the following have been transferred to other genera: *formosella* (Hübner, 1825) (= *eburnella* ([Denis & Schiffermüller], 1775)), *flavella* (Duponchel, 1844) and *pallidipulchra* (Walsingham, 1904) to *Mirificarma* Gozmány, 1955 (Pitkin 1984); *labradorica* (Möschler, 1864) to *Chionodes* Hübner, 1825 (Hodges 1983: 22); *delotella* (Busck, 1909) and *vacciniella* (Busck, 1915) to *Dichomeris* Hübner (Hodges 1986: 46, 76), *oenochyta* (Meyrick, 1921) to *Leuronoma* Meyrick, 1918 (Janse 1958: 43) and *sphenopsis* (Meyrick, 1921) to *Schizovalva* Jamse, 1951 (Janse 1960: 224). *Ypsolophus plasticus* Meyrick, 1904, from Australia, which was included in *Telephila* by Meyrick (1923: 626), is a *Dichomeris* (Sattler, pers. comm.). Gaede (1937: 386) also placed *Rhinosia striolella* Turati, 1924, in *Acompsia*, but it is a synonym of *Mirificarma pallidipulchra* (Walsingham, 1904) (Pitkin 1984: 24).

Acompsia tenebrosella Lucas, 1955, described from a single male from Morocco (Lucas, 1955: 255) was stated to be related to *A. cinerella*. We have been unable to study the holotype, but based on the short description which is not accompanied by any figure we are of the opinion that *tenebrosella* is not an *Acompsia*.

Remarks. Characters mentioned under the generic description apply to all species and are not repeated.

Species of *Acompsia* may best be identified by external characters such as the wing colour, presence/absence of spots, size and wing-shape. In the male genitalia the most reliable specific characters are found in the shape of the sacculus and the aedeagus. The female genitalia are rather similar between the various species with usually only minor differences in the anterior sclerotizations of sternite VIII, length of the ductus bursae, size of corpus bursae and the field of microtrichia.

The sequence of species is based on important genitalic characters mainly the dorsal sclerotizations of the aedeagus. The short, weakly dentate sclerite is regarded as the plesiomorphic state. In one group of sg. *Acompsia* this sclerite is gradually reduced, whereas in the other it is developed to a large spine. However, the sequence does not necessarily reflect the phylogeny of the group which still requires further investigation.

Subgenus *Acompsia*

Acompsia (Acompsia) cinerella (Clerck, 1759: pl. 11, fig. 6) (*Phalaena*)

Phalaena murinella Scopoli 1763: 256.

Tinea ardeliella Hübner 1817: pl. 65, fig. 437.

Recurvaria cinerea Haworth, 1828: 547.

Lita spodiella Treitschke 1833: 78.

Material examined. Norway: 1♂, Vay, Kristiansand, Søgne, 7.–9.vii.1979, leg. Pedersen; 2♂, Kjendalsbræ, 17.vii.1983, leg. Thomsen; 1♀, On, Vinstra, 4.–5.vii.1984, leg. Karsholt; 3♂, ditto, but 11.vi.1985, leg. Karsholt & Michelsen (all ZMUC). Denmark: 1♂, NEZ, Grib Skov, Lods Bakker, 8.viii.1984, leg. Hendriksen (gen. slide HH 873) (HEND); 1♂, SZ, Frederikslund, 5.vi.1937, leg. Nielsen (gen. slide PKN 600♂); 1♀, NEZ, Alindelille, 2.vii.1963, leg. Nielsen (gen. slide PKN 600♀); 1♂, NEZ, Hundested, 9.vii.1949, leg. Lundqvist (gen. slide JL 777); 1♀, LFM, Hannenov, 16.viii.1969, leg. Lundqvist (gen. slide JL 778); 1♀, LFM, Høvblege, 6.ix.1987, leg. Hendriksen (gen. slide HH 2218); 1♂, 1♀, ditto, but 30.vii.1961 & 16.viii.1969, leg. Traugott-Olsen (gen. slide ETO1466♀, 1477♂); 134♂, 15♀ further, undissected specimens from Denmark (all ZMUC). Sweden: 2♂, Sm, Gårdby, 1.–3.vii.1965, leg. Johansson; Ög, Ödeshög, 17.vii.1972, leg. Karsholt (ZMUC); 1♂, Öl, Seberneby, 19.vii.1975, leg. Karsholt; 1♂, Gtl, Hamra, Holmhäller, 21.–24.vii.1985, leg. Karsholt (all ZMUC). Finland: 1♂, N, Vantaa, 18.–25.vi.1968, leg. Laasonen; 1♂, Ka, Virolathi, 10.–16.vii.1973, leg. Laasonen; 1♂, ditto, but 1.–16.vii.1974; 1♂, N, Tirmo, 19.–20.vii.1980, leg. Fibiger (all ZMUC). Russia: 7♂, SW Altai, Katun valley, 10 km W Katanda, 1200 m, 22.–27.vi.1983, leg. Mikkola, Hippa & Jalava (ZMUH); 1♂, Primorskii Krai, Shkotovo distr., Anisimovka, 27.vii.1994, leg. Savenkov (gen. slide HH 3385) (ZMUC); 1♂, Transbaikalia, Chita, 27.vii.1997, leg. Bidzilya, I. & O. Kostjuk (ZMUH). Estonia: Taheva, 21.vi.2000, leg. Viidalep (ZMUC). Poland: 1♂, Puszcza Bialowieza, Park narod, 23.viii.1965, leg. Adamczewski; 1♂, Suwalki, Okragle, 12.vi.1988, leg. Karsholt; 1♂, Podlaskie, Bialowieza, 29.v.–1.vi.2000, leg. Karsholt (all ZMUC). Slovakia: 1♀, Viniansky hrad, 25.v.2000, leg. Karsholt. Germany: 1♂, 1♀, Württemberg, Markgröningen, Rotenacker, 25.vii.1979, leg. Süßner (gen. slide GEL 881♂, GEL 1048♀); 1♀, Württemberg, Schwäbische Alb, Seeburg, 650 m, 13.vi.1977, leg. Süßner; 1♂, ditto, but 20.vi.1974; 2♂, Württemberg, Marbach – Neckar, 19.vi. & 7.viii.1954, leg. Süßner; 1♀, ditto, but 25.vi.1955; 1♀, ditto, but 30.vi.1956; 1♂, Württemberg, Schwarzwald, Zwickgabel, 4.vii.1965, leg. Süßner; 1♂, Württemberg, Bissingen – Enz, 1.vi.1961, leg. Süßner; 1♀, Württemberg, Oberstenfeld, Forstkopf, 7.vii.1972, leg. Süßner; 1♂, Bayern, Langwied, 490 m, late viii.1977, leg. Zürnbaauer; 1♂, Bayern, Wangen, 600 m, late vi.1973, leg. Zürnbaauer; 2♂, Bayern, Neurieder Forst, 520 m, late vi.1962, leg. Zürnbaauer; 1♂, Bayern, Inning, 550 m, early vi.1966, leg. Zürnbaauer; 1♀, Bayern, Eching, mid-vii.1949, leg. Pfister; 1♂, Bayern, Schliersee, 8.vi.1943, leg. Geltinger (all TLMF). Great Britain: 1♂, Norfolk, Briston by Melton Constable, 10.vii.1973, Rothamsted Exp. Station (ZMUC). France: 2♂, Hautes Alpes, Les Vigneaux, 1200 m, 25.vii.1990, leg. Huemer & Tarmann; 1♂, Prelles, 1200 m, early viii.1974, leg. Zürnbaauer (all TLMF); 2♂, Isère, Séchillienne, 1000 m, 29.–30.vi.1990, leg. Schepler; 1♂, Alp, Cottiennes, Col de Vars, 2100 m, 16.viii.1995, leg. Schepler (gen. slide HH 3382); 1♂, Ecrins,

Allefroide, 1800 m, 18.viii.1995, leg. Schepler (all ZMUC). Andorra: 2♂, Arnisal, 1500 m, 1.viii.1997, leg. Baungard (ZMUC). Spain: 1♂, Huesca, Penalba, 250 m, 17.x.1984, leg. Nielsen; 3♂, Gerona, Bruguera by Ripoll, 1700 m, 12.vii.1988, leg. Fibiger (gen. slide GU 01/1072); 1♀, Gerona, Ribes, above Bruguera, 1650 m, 14.viii.2001, leg. Skou; 2♂, Lerida, 15 km W La Seu d'Urgell, Pt. Del Canto, 1650 m, 6.vii.1993, leg. Fibiger; 1♂, Lerida, Roni near Sort, 1000 m, 7.vii.1993, leg. Skou (all ZMUC); 1♂, 1♀, San Ildefonso, Escalera (gen. slide 16.534♂) (NHMW). Italy: 1♂, Südtirol, Naturns, 660 m, mid-ix.1965, leg. Zürnauer (TLMF); 1♀, Südtirol, Montiggel, Kl. Priol, 600 m, 26.vi.1993, leg. Huemer (TLMF); 1♂, Verona, Garda, Mt. Bre, 16.–30.v.1982, leg. Olsen; 1♂, Verona, Monte Baldo, Ferrara, 1100 m, 27.–29.vi.1981, leg. Skou & Skule; 2♀, Verona, Monte Baldo, above Prada, 1200 m, 22.vii.1989, leg. Karsholt; 1♂, Prov. Izeria, Pizzone, dint. Valle Fiorita, 1450 m, 14.–21.vii.1990, leg. Baldizzone, Barbero & Bassi (gen. slide HH 3381) (all ZMUC); 3♀, Piemonte, Cueno, Parco Natur. Reg. Alpi, Marittime, S. Giac. di Entracque, sent. Rifugio Soria, Gias Isterpis, 1381 m, 19.vii.1996, leg. Baldizzone; 2♂, ditto, but S. Giacomo di Entracque, sopra Lago della Rovina (Rocca Barbis), 1550–2000 m, 20.–26.vii.1997; 1♂, ditto, but Entracque, Trinta, 1100 m, 28.vii.1997; 1♀, ditto, but S. Anna di Valdieri, dint. Lago Sottano d. Sella, 1900 m, 16.vii.1998; 1♂, ditto, but Valdieri, 900 m, 11.vi.1999; 1♂, ditto, but Terme di Valdieri, Valle della Valletta, 1450–1650 m, 19.vii.1999; 1♀, ditto, but dint. di Entracque, Mte Ray, 1000–1400 m, 18.vii.2000 (BLDZ, ZMUC). Switzerland: 1♂, Appenzell, Seesalp, 1000 m, 28.vi.1958, leg. Malicky (gen. slide 894 Malicky); 1♂, Graubünden, Landquart, 12.vi.1918, leg. Thomann (all TLMF). Austria: 1♂, Nordtirol, Nauders, Seleskopf, 1600 m, 24.vii.1955, leg. Süßner (gen. slide GEL 78); 2♂, Nordtirol, Gurgltal, N Dollinger, 800 m, 30.vii.1991, leg. Cerny; 1♂, Nordtirol, Pinegg, 1000 m, late vi.1971, leg. Zürnauer; 1♂, Nordtirol, Innsbruck, 24.vii.1958, leg. Hernegger; 1♂, ditto, but 1.vii.1965; 1♂, ditto, but 7.vii.1970; 1♀, ditto, but 28.v.1970; 1♀, Nordtirol, Seegrube, 27.vii.1961, leg. Hernegger; 1♂, Nordtirol, Arzler Alm, 1200 m, 10.vi.1971, leg. Hernegger; 1♀, Nordtirol, Zirl, 30.viii.1970, leg. Hernegger; 1♀, Nordtirol, Valsertal, 24.vii.1969, leg. Hernegger; 2♂, Osttirol, Venedigergruppe, Dorftal, 1520 m, 8.vii.1993, leg. Huemer; 2♂, Osttirol, Virgen, Nilbach, 1800 m, 16.viii.1993, leg. Rakosy; 2♂, Osttirol, Virgen, Obermauern, 1400 m, 14.viii.1993, leg. Rakosy; 1♂, Osttirol, Venedigergruppe, Maurertal, 1550 m, 22.vi.1993, leg. Huemer; 2♂, Osttirol, Prägraten, St. Andrä N, 1420 m, 23.vi.1993, leg. Huemer & Tarmann; 1♂, Osttirol, Schoberggruppe, Stanis Alm, 2000 m, 10.viii.1990, leg. Tarmann; 1♂, ditto, but 8.viii.1988; 1♂, 2♀, Osttirol, Kartitsch, 1600 m, 15.vii.1964, leg. Süßner (gen. slide GEL 878♂, GEL 879♀); 1♂, Oberösterreich, O. Weißenbach, 7.vii.1923, leg. Knitschke; 1♂, Niederösterreich, Schneeberg, 23.vi.1910; 1♂, Niederösterreich, Melk, 14.vii.1909, leg. Zerny; 2♂, Burgenland, Winden, 10.vi.1970, leg. Zürnauer (all TLMF); 2♂, Burgenland, Illmitz / See, 1.ix.1973, leg. Glaser; 1♀, Osttirol, Lienz, 700 m, 7.vii.1981, leg. Schnack; 1♀, Osttirol, Tessenberg, 1400 m, 12.–15.vii.1981, leg. Schnack; 1♀, Osttirol, Glocknergruppe, below Kals, 1100 m, 28.vii.1991, leg. Karsholt & Rakosy (genitalia in tube); 1♂, ditto, but Burg bei Kals, 28.–31.vii.1991, leg. Karsholt & Rakosy; 1♀, ditto, but Mauriger Trog, 2100 m, 30.vii.1991, leg. Karsholt, Rakosy & Tarmann; 2♂, 1♀, ditto, but Loweraze, 1600–1860 m, 30.–31.vii.1991, leg. Karsholt, Rakosy & Tarmann (all ZMUC). Hungary: 1♂, Visegrad, 8.vii.1997, leg. Larsen (ZMUC). Slovenia: 2♂, Nanos, 29.ix.1983, leg. Deutsch (gen. slide GEL 52) (TLMF). Croatia: 1♂, Slavonia, Fruska Gora, 28.vi.–12.vii.1935, leg. Daniel (ZSM). Yugoslavia (Montenegro): 1♂, Durmitor, Komarnica, 1400 m, 24.vii.1985, leg. Jaksic (TLMF). Romania: 1♂, B. Ouaia, Sibiu, 3.viii.1984, leg. Rakosy (ZMUC); 2♂, Lacu Rosu, Suhardu Mic, 1450 m, 8.viii.1992, leg. Rakosy (TLMF); 1♂, Herculana, 8.vi.1993, leg. Rakosy (ZMUC). Bulgaria: 1♂, Stanimaka, 1.–10.vii.1933, leg. Pfeiffer (ZSM). Greece: 4♀, Lakonia, Mt. Taygetos, 1000 m, 28.–29.vi.1982, leg. Skule & Langemark; 2♂, 1♀, Lakonia, Mt. Taygetos, above Trapezandi, 1500 m, 5.vii.1984, leg. Skule (gen. slide GU 01/1069♂); 2♂, Taygetos mts., 950–1800 m, 15.–19.v.1990, leg. Karsholt; 2♂, Florina, 5 km NW Pisoderion, 2000 m, 21.vii.1990, leg. Fibiger; 1♂, 1♀, Fthiotida, Parnassos mts., below skicenter, 21.vii.1998, 1650 m, leg. Skule & Nilsson; 3♂, 1♀, Makedhonia/Thessalia, Olympus, 700–2100 m, 21.–26.v.1990, leg. Karsholt (gen. slide GU 02/1118♀); 1♂, 1♀, Kastoria, 6 km E Eptachori, 1400 m, 13.vii.1998, leg. Skule & Nilsson; 2♂, 1♀, Florina, 1 km NW Pisoderi, 1600, 14.vii.1998, leg. Skule & Nilsson (all ZMUC). Turkey: 1♂, Ankara, 20 km NW Kizilcahaman, 1200 m, 1.vii.1987, leg. Fibiger; 2♀, Ankara, 10 km NW Kizilcahaman, 1150–1250 m, 6.–7.vii.1989, leg. Fibiger & Esser; 5♂, Gümüşhane, Kop Pas, 2300 m, 19.vii.1989, leg. Fibiger & Esser (gen. slide HH 3548); 3♂, 21 km S Kayseri, Erciyes Dagı, 2200 m, 29.vii.1989, leg. Fibiger & Esser (gen. slide HH 3547); 1♂, ditto, but 25 km S Kayseri, 2800 m (all ZMUC). Armenia: 2♂, 1♀, Geghard, 40 km E Eriwan, 1700 m, 24.–27.vii.1976, leg. Kasy & Vartian (NHMW).

Male (Fig. 1). Wingspan 15–19 mm. Labial palpus long, slender; segment 2 brown; segment 3 yellow brown, both segments lighter on inner surface. Antenna dark brown, slightly lighter ringed. Forewing clay brown, sometimes with olive tint, faintly mixed with yellow; veins at end of cell and in apical part occasionally darker; weak dark spot rarely present at end of cell; fringes uniformly light brown. Hindwing brown grey, with light brown fringes.

Female (Fig. 2). Wingspan 13–17 mm. Similar to male but smaller on average and with forewing slightly narrower; colour of forewing often darker clay brown.

Male genitalia (Figs. 25, 42). Uncus rounded distally; cucullus with particularly long dilated part; sacculus lobe almost completely covered with microtrichia, sub-triangular, comparatively small, with long and straight distoventral (outer) margin; aedeagus with short, weakly dentate sclerite.

Female genitalia (Figs. 59–60). Apophyses posteriores about 1.5 times length of papillae anales; apophyses anteriores about length of segment VIII; sternite VIII with distinct, short medial sclerotizations; ductus bursae long; corpus bursae with large patch of microtrichia.

Distribution. Widely distributed in most parts of Europe (Karsholt & Riedl 1996: 121), and Turkey through Siberia to the Far East of Russia. Also recorded from Kazakhstan (Ponomarenko 1997b: 10).

Biology. The larva was described by Sorhagen (1902: 56–57) – based on the description and a water-colour made by C. W. L. Grabow, the father in law of O. Staudinger (Sorhagen 1901: 241): rather slim, especially towards end, greenish grey; head brown, prothoracic shield and legs black; abdominal legs concolorous with body; back with four dark warts on each segment, laterally beneath anterior pair another one; larva wrinkled beneath faint, light lateral line, with two rather long bristles above each other, upper (anterior) shorter. It lives until June between moss at the base of trees growing in forests, feeding on the moss; it is very shy, quickly disappearing into the moss. According to Lhomme (1948: 655) Chrétien bred *A. cinerella* from eggs on *Veronica chamaedrys* L. (Scrophulariaceae). Chrétien (1900: 202) himself informs that Millière found larvae of *A. cinerella* in September on *Epilobium montanum* L. (Onagraceae). It is unclear if the larva of *A. cinerella* is polyphagous or if some of the host records above refer to other species. The adults fly from late May to mid-October, normal from June to August. The adult occurs in various, mainly open habitats. It is readily attracted to light. Vertical distribution: from sea level to about 2300 m.

Remarks. *A. cinerella* is rather constant in colour and the absence of wing markings throughout its distribution range. Specimens from SE Europe often have more yellow scales in the forewing. The largest specimens are normally found in southern European populations. The presence of a weak, dark spot at the end of the forewing cell is apparently not geographically correlated, even though it is often present in specimens from Turkey.

Phalaena cinerella was based on an unspecified number of specimens, probably from Sweden, and figured by Clerck. A lectotype was designated by Robinson & Nielsen (1983: 206).

Phalaena murinella was described from an unspecified number of specimens collected in lower Carniolia (Slovenia) (Scopoli 1763). The identity of this species is doubtful but the description does not contradict the hitherto accepted interpretation, of which there has been consensus since it was published by Werneburg (1864: 279).

Tinea ardeliella was described from an unspecified number of specimens probably from central Europe and figured by Hübner without accompanying text. Hübner (1796:

59, pl. 25, fig. 173) had already described and figured *cinerella* Clerck (as *cinerella* Linnaeus), but because of later doubt another specimen was later figured under the name *ardeliella* (Treitschke 1833: 78, 81).

Lita spodiella was described as uncommon ('nicht häufig') from Austria and Sachsen (Treitschke 1833). It was synonymized with *A. cinerella* by Zeller (1839: 198). Despite of all efforts by Dr. L. Gozmány no labels nor type specimens could be found in the Hungarian Natural History Museum (Treitschke collection).

Recurvaria cinerea Haworth is an unjustified emendation of *Phalaena cinerella* Clerck.

Acompsia (Acompsia) pyrenaella sp. n.

Material examined. Holotype ♂ 'Gallia Pyren. Val. d'Ossoue 1500 m 17.7.61 K.Burmam' 'GEL 1063 ♂ P. Huemer' (TLMF). Paratypes: France: 1♂, C Pyrenées, Gavarnie, Col de Bucharo, 2200 m, 6.–7.vii.1986, leg. Grünwald (GRÜN); 1♂, Pic du Midi de Bigorre, 2400 m, 3.viii.1981, leg. Sattler, Tuck & Robinson (gen. slide BM 26.577); 1♀, ditto, but 2650 m, 4.viii.1981 (gen. slide 26.578); 1♂, Mt. Canigou, 2200 m, 30.vii.1981, leg. Sattler, Tuck & Robinson (all BMNH). Andorra: 5♂, by Pto. de Envalira, 2300 m, 1.viii.1988, leg. Fibiger (gen. slide HH 3540, 3541); 1♂, Arnisal, 1500 m, 1.viii.1997, leg. Baungaard (gen. slide HH 3575) (all ZMUC). Spain: 1♂, Lerida, Puerta la Bonaigua, 2000 m, 21.vii.1972, leg. Dickson (BMNH); 11♂, ditto, but 2050 m, 31.vii.1988, leg. Fibiger (gen. slide GU 01/1036) (ZMUC, TLMF); 1♂, E Pyrenées, Col de Puymérons, 1900 m, 4.–5.viii.1980, leg. Grünwald (GRÜN).

Male (Fig. 3). 18–21 mm. Labial palpus long, slender; segment 2 dark brown on outer surface, other surfaces and apical part lighter; segment 3 greyish brown, mottled with yellow. Antenna brown, indistinctly lighter ringed. Forewing brown, with groups of black scales, especially between veins; basal half of costal area slightly lighter than rest of the forewing; three small, black spots: one (sometimes) elongate in fold, one above it and one at end of cell; termen emarginated below apex, with small, black spots at end of veins; cilia only slightly lighter than forewing. Hindwing light grey, with light yellow grey cilia.

Female (Fig. 4). 15 mm. Reasonably brachypterous, with forewings only about half as broad as in male. Forewing dark grey-brown, mottled with light grey (especially along costa), yellow and black scales; two black spots at 1/3 and 2/3; termen oblique, without or with small black spots at end of veins. Hindwing grey, with grey cilia.

Male genitalia (Figs. 26, 43). Uncus comparatively small, slightly dilated distally; cucullus with short dilated part; sacculus lobe sub-oval, moderately small, distinctly curved distally, distoventral (outer) margin strongly excavated; apices of vinculum arms broad; aedeagus with small undentate dorsal sclerite.

Female genitalia (Figs. 61–62). Apophyses posteriores about two times length of papillae anales; apophyses anteriores about length of segment VIII; sternite VIII with indistinct medial sclerotizations; ductus bursae comparatively long, narrow, with distinct sclerite anteriorly; corpus bursae very large, with small patch of microtrichia.

Distribution. Endemic to the Pyrenees.

Biology. Host-plant and early stages unknown. Specimens have been caught from early July to early August, mostly at light. Vertical distribution: altitudes between 1500 and 2650 m.

Remarks. The male of *A. pyrenaella* sp. n. is very similar to that of *A. antirrhinella*, but the latter has more distinct black dots in the middle of the forewing and along the termen. The female shows a clear tendency to brachyptery and is also distinctly smaller than the male. Also the genitalia of both taxa are very close, mainly differing in the distinctly broadened distal part of the vinculum arms and the distinct sclerite in the anterior part of the ductus bursae in *A. pyrenaella* sp. n. However, it should be pointed out that only one female could be examined.

This species was repeatedly mistaken for *A. tripunctella* in various collections.

Etymology. Named after the type region.

***Acompsia (Acompsia) antirrhinella* (Millière, 1866: 274, 280, pl. 80, figs 6–8) (*Gelechia*)**

Material examined. France: 1♂, Cannes, leg. Millière (gen. slide BM 13.925) (BMNH); 1♀, Hautes Alpes, Eygliers, Guillestre, 1000 m, 27.vi.1985, leg. Stadel Nielsen; 1♂, ditto, but 27.vi.1985 (gen. slide GU 02/1120); 1♂, Vaucluse, Mont Ventoux, 6 km nw of Sault, 1100 m, 11.viii.1996, leg. Skou; 7♂, Alp. Mar., Esteng by Col de la Cayolle, 1850 m, 9.vii.1988, leg. Fibiger (gen. slide HH 3539); 1♂, Pyr. Orient., La Preste, Prats de Mollo, 1420 m, 11.vii.1988, leg. Fibiger (gen. slide GU 02/1080) (all ZMUC); 1♂, Super-Lioran, Rousseau des Tripas, 26.vii.1994, leg. Gibeaux (gen. slide GEL 866) (TLMF). Andorra: 1♀, Port de Cabús, 2300–2500 m, 27.vii.1981, leg. Sattler, Tuck & Robinson (BMNH). Spain: 1♀, Pyrenees, Caralps, 1.–3.vii.1960, leg. Vartian (gen. slide NM 16.638) (NHMW); 1♂, Teruel, Albarracin, 22.–30.vi.1924, leg. Zerny (gen. slide NM 16.537) (NHMW); 3♂, ditto, but 1200 m, 25.–26.vi.1992, leg. Skou & Skule (gen. slide HH 3542); 2♂, ditto, but 16.vii.1992, leg. Fibiger (gen. slide HH 3545); 1♂, Gerona, Bruguerra by Ripoll, 1700 m, 12.vii.1988, leg. Fibiger (gen. slide HH 3387); 1♂, Gerona, Montseny by Coll de Rabell, 1700 m, 13.vii.1988, leg. Fibiger (gen. slide HH 3543); 1♂, Lerida, 15 km W La Seu d'Urgell, Pt. del Canto, 1650 m, 6.vii.1992, leg. Fibiger; 1♂, Huesca, 3 km W Laco Urdiceto, 2150 m, 20.vii.1992, leg. Fibiger; 1♂, Huesca, 12 km N Bielsa, by Tunnel, 1900 m, 22.vii.1992, leg. Fibiger (gen. slide HH 3544) (all ZMUC).

Male (Fig. 5). Wingspan 17–23 mm. Labial palpus long, slender; segment 2 dark brown on outer surface, other surfaces and apical part lighter; segment 3 greyish brown, mottled with yellow. Antenna brown, indistinctly lighter ringed. Forewing plain brown to greyish brown, more or less mottled with black brown scales, especially between veins; three distinct, black spots: one in cell, one above it, slightly closer to base, and one at end of cell; termen emarginated below apex, with a row of distinct, black spots at the end of veins; cilia slightly lighter than forewing. Hindwing grey, with light yellow-grey fringes.

Female (Fig. 6). Wingspan 17–20 mm. Similar to male but with more contrasting forewings than males because of many brown and black scales; also the basal half of the costal area in the forewing is lighter.

Male genitalia (Figs. 27, 44). Uncus rounded apically; cucullus with strongly dilated part; sacculus lobe sub-oval, small, with weakly excavated distoventral (outer) margin; apices of vinculum arms small; aedeagus with small dorsal sclerite, not dentate.

Female genitalia (Figs. 63–64). Papillae anales large; apophyses posteriores about 1.5 times length of papillae anales; apophyses anteriores longer than short segment VIII; sternite VIII without prolonged medial sclerotizations; ductus bursae comparatively long, narrow, without distinct sclerites anteriorly; corpus bursae very large, with small patch of microtrichia.

Distribution. Only known from northern part of Spain, Andorra and southern part of France.

Biology. The larva is long, tube-like, a little flattened underneath, dark green to almost black in the final instar; head red, bordered with black at the top; collar whitish; the prothoracic plate coloured as the head, is also bordered with black; thoracic legs brown and shining; abdomen without lines, but with distinct black warts; abdominal legs unicolorous. It feeds from March to the end of May under a whitish, silken spinning, which has the ends attached to one or more leaves of *Asarina procumbens* Miller (= *Antirrhinum asarina* L.) (Scrophulariaceae), growing in the crevices of old walls or between rocks. Pupation takes place at the basis of the plant, between dried leaves, or sometimes on the plant, in a folded leaf (Millière, 1867: 382–383). The adult flies from late June into August. Vertical distribution: from sea level to about 2300 m.

Millière (1867: 384) was of the opinion that *A. antirrhinella* hibernates in the adult state (based on some worn specimens collected in March). We believe that some mistake may have happened, and his record needs confirmation.

Remarks. *A. antirrhinella* is most closely related to *A. pyrenaella* sp. n.; for differences see under that species.

Gelechia antirrhinella was described twice by Millière (1866, 1867). We have only seen the latter of these descriptions, but according to Sattler & Tremewan (1973: 226) they are identical.

Acompsia (Acompsia) maculosella (Stainton, 1851: 22) (*Gelechia*)

Material examined. Lectotype ♂ (here designated) 'Mann 1849' '*Maculosella*' 'Stainton Coll., Brit. Mus. 1893-134' 'Ex Stainton coll., (J. Mann, Vienna), Suppl. Cat. Br. Tin. Pter. App.:22, 1851'. Germany: 1 ♂, Hirschbachtal, 920 m, M.vii.1965, leg. Zürnbauer; 1 ♀, Berchtesgadener Alpen, Trischübel, 1800–2100 m, A.viii.1950, leg. Pfister (gen. slide) (all TLMF); 1 ♀, Karwendel, 1900 m, mid-vii.1976, leg. Zürnbauer (gen. slide 4104 Tokár). Switzerland: 1 ♂, Appenzell, Ebenalpe, 1600 m, 24.vii.1990, leg. Oswald (TLMF). Austria: 1 ♂, Steiermark, Reichenstein, 4.vii.1919 (gen. slide GEL 491); 1 ♂, Radstätter Tauern, Seekarspitze, 2300 m, 3.–10.viii.1940, leg. Zerny (gen. slide GEL 381) (all TLMF); 1 ♂, Kärnten; 1 ♂, Kärnten, Grossglockner, 2000 m, 9.vii.1981, leg. Schnack; 1 ♂, Nordtirol, Rossfall, 1200 m, 5.vi.1961, leg. Hernoppel (all ZMUC); 1 ♂, Osttirol, Matrei, Lukaser Kreuz, 1200 m, 18.vii.1962, leg. Süssner (gen. slide GEL 488); 2 ♂, Osttirol, Lasörlinggruppe, Schwarzachtal, In der Weisse, 2450 m, 14.viii.1989, leg. Tarmann; 1 ♂, Osttirol, Venedigergruppe, Malhambach-Talgrund, 2350–2450 m, 3.viii.1993, leg. Rakosy & Tarmann; 1 ♂, Osttirol, Venedigergruppe, Essen-Rostocker-Hütte, 2600–2650 m, 4.viii.1993, leg. Rakosy; 1 ♂, Osttirol, Venedigergruppe, Maurer Alpe, 2300–2500 m, 5.viii.1993, leg. Rakosy; 1 ♂, Nordtirol, Ellmau, 1.vii.1956, leg. Hernegger; 1 ♀, Nordtirol, Vennatal, 2000 m, 16.vii.1942, leg. Scholz (gen. slide GEL 1046); 1 ♂, Nordtirol, Rißtal, Hagelhütten, 1050 m, 3.viii.1993, leg. Huemer; 2 ♂, Nordtirol, Weißenbach, Errachau, 920 m, 9.vi.1989, leg. Huemer; 1 ♂, ditto, but 17.vi.1989, leg. Kahlen; 1 ♂, St. Anton am Arlberg, Schönggraben, 1400 m, 11.7.1959, leg. Süssner; 1 ♂, Vorarlberg, Lech-Oberlech, 1700 m, 28.vii.1954, leg. Süssner; 1 ♂, Vorarlberg, Mittelberg, 15.vii.1953, leg. Süssner (all TLMF). Slovenia: 1 ♂, Kamn, Veliki Zvoh south slope, 1700 m, 20.vii.1993, leg. Habeler (gen. slide GEL 189) (TLMF).

Male (Fig. 7). Wingspan 16–21 mm. Labial palpus long, slender; segment 2 dark brown, with light apical ring, yellow on inner surface; segment 3 dark brown, mottled with light brown. Antenna dark brown, indistinctly lighter ringed. Forewing clay brown, mottled with lighter brown scales; three distinct black spots: one more or less elongate in fold, one (distinct) round above it, slightly closer to base, and one similar to the second one at end of cell; between the latter spot and costa a sub-triangular, black

patch; veins in apical part sometimes darker; termen slightly emarginated below apex; termen line with distinct black spots at end of veins; fringes light brown. Hindwing grey, with yellow grey fringes.

Female. Wingspan 16 mm. Similar to male, but smaller on the average. Forewing with light yellow subcostal line in basal half; black spots reduced and indistinct; apical part more mottled with yellow scales; termen more distinctly emarginated below apex.

Male genitalia (Figs. 28, 45). – Uncus dilated apically; cucullus with rather short dilated part; sacculus lobe sub-oval, comparatively small, weakly curved distally, with scarcely excavated distoventral (outer) margin; aedeagus without dentate sclerite.

Female genitalia (Figs. 65–66). Papillae anales large; apophyses posteriores about 1.5 times length of papillae anales; sternite VIII without prolonged medial sclerotizations; ductus bursae comparatively long; corpus bursae rather small, with small patch of microtrichia.

Distribution. Possibly endemic to the central and eastern parts of the Alps: Austria, Slovenia, Switzerland; Italy (Karsholt & Riedl 1996: 121) and Germany (Gaedike & Heinicke 1999: 85). We have been unable to confirm the presence of *A. maculosella* in France, including the Pyrenees (see Elsner *et al.* 1999: 57). Rebel (1917: 193) recorded a specimen from the Tannu Ola Mts. (Russia, Tuvinskaya Oblast). We have been unable to trace this material in NHMW.

Biology. Host-plant and early stages unknown. Flight period: July to August. The adult occurs in various montane habitats, particularly subalpine to alpine meadows and shrub-formations. It flies freely during the day or can be roused from the vegetation. Occasionally it is also attracted to artificial light. Vertical distribution: from about 900 to 2600 m.

Remarks. *A. maculosella* is easily recognizable by the characteristic, dark subcostal patch. In the past it was considered by some authors (see Gaede 1937: 387) as a synonym (form) of *A. tripunctella*. However, both species are not very closely related as proved by the genitalia. *Gelechia maculosella* was described from an unspecified number of specimens (Stainton 1851), which most probably were collected by Mann in the Austrian Alps. The above mentioned specimen is here designated as lectotype to fix the status of the species.

Acompsia (Acompsia) dimorpha Petry, 1904: 4

Material examined. Lectotype ♂ (here designated) 'Pyrenaei centr., F 24/7 1901, Pic du Midi de Bigorre, Dr. A. Petry legit.' 'Sammlung A. Petry' 'Museum Erfurt' 'Lectotype ♂, *Acompsia dimorpha* Petry, teste K. Sattler 1977' 'SPECIMEN PHOTOGRAPHED' (MNG). France: 2♂, 1♀, paralectotypes, same data as holotype (MNG); 1♂, Htes. Pyrénées, Cédre, bred 1904, leg. Rondou (MNG); 1♂, Pyrenees cent., Pic du Midi de Bigorre, 2400 m, 2.viii.1981, leg. Sattler, Tuck & Robinson; 1♂, ditto, but 3.viii.1981 (gen. slide BM 26.575); 1♂, ditto, but pupa on 3.viii. under rock, emerged 9.viii.1981; 1♀, ditto, but pupa on 3.viii. under rock, emerged 12.viii.1981 (gen. slide BM 26.576) (all BMNH). Spain: 1♂, Pyrenees cent., Monte Perdido, vic. Ref. Goriz, 2350 m, 1.viii.1990, leg. Sommerer (gen. slide GEL 875) (TLMF).

Male (Fig. 9). Wingspan 16–20 mm. Labial palpus comparatively long, slender. Antenna dark brown. Forewing narrower than in *A. tripunctella*, greyish to black brown, mottled with light yellow or light greyish scales; four indistinct, but rather large spots: one near base, one (obscure) in fold, one above it, and one (more distinct) at end of

cell; termen slightly emarginated below apex, sometimes with a few dark scales at end of veins; cilia light greyish brown, with faint cilia line. Hindwing light grey, with light yellow grey fringes.

Female (Fig. 10). Wingspan 11–13 mm. Brachypterous. Labial palpus black brown, mottled with yellow. Antenna dark brown. Forewing not longer than antenna, elliptical, black brown, mottled with many yellow and light brown scales; indistinct, black spots at 1/4 2/4 and 3/4 fringes sparse, light yellow grey. Hindwing narrow, without emarginated termen below apex, light grey, darker at apex; fringes as in forewing. Hindlegs strong.

Male genitalia (Figs. 29, 46). Uncus broad, sub-rectangular; cucullus with comparatively long dilated part; sacculus lobe sub-oval, comparatively small, with weakly and irregularly excavated distoventral (outer) margin; aedeagus without dorsal sclerite.

Female genitalia (Figs. 67–68). Apophyses posteriores about 2.5 times length of papillae anales; apophyses anteriores comparatively long; sternite VIII without prolonged medial sclerotizations; ductus bursae comparatively long; corpus bursae rather small, with small patch of microtrichia.

Distribution. Endemic to the French and Spanish Pyrenees.

Biology. Host-plant and early stages unknown. The pupal stage has been found under stones. Adults were collected and bred from late July to early August. *A. dimorpha* is restricted to the alpine zone where it may occur together with *A. pyrenaella* sp. n. Vertical distribution: recorded from about 2300 to 2400 m.

Remarks. *A. dimorpha* is easily characterized by the strongly brachypterous female which is (from our present knowledge) unique in the genus. Other species of *Acompsia* only show a slight to moderate tendency to brachyptery.

A. dimorpha was described from 1 female and 3 male syntypes collected on the 24th of July 1901 on Pic du Midi de Bigorre in the French Pyrenees at about 2300 m (Petry 1904). The above mentioned specimen is here designated as lectotype to fix the status of the species.

Acompsia (Acompsia) subpunctella Svensson, 1966: 188, fig. 19, pl. II, fig. 3.

Material examined. Sweden: 3♂, 1♀, Nb, Överkalix, 20.–21.vii.1970, leg. Svensson (gen. slide GU 98/818♂, GU 02/1113♀, HH 2118♂ genitalia of one ♂ in glycerol on celluoid) (ZMUC, ZSM); 1♂, Nb, Pajala, 3.vii.1976, leg. Johansson (gen. slide GU 98/820♂) (ZMUC); 1♂, Norbotten, Seskarö, 7.vii.1983, leg. Svensson (gen. slide GEL 870) (TLMF); 5♂, Nb, Hedenäset, 26.–27.vi.1995, leg. Henriksen (gen. slide HH 1462) (HEND). Poland: 1♂, Puszcza Borecka, 10.vii.1993, leg. Buszko (BUSZ). Russia: 6♂, SW Altai, 15 km S Katanda, Kuragan valley, 1200 m, 23.–25.vii.1983, leg. Mikkola, Hippa & Jalava (gen. slide GU 02/1130) (ZMUH); 1♂, Transbaikalia, Chita reg., Kyra, 900 m, 14.vii.1997, leg. Bidzilya, I. & O. Kostjuk (gen. slide GU 02/1145) (ZMUH).

Male (Fig. 11). Wingspan 15–17 mm. Labial palpus comparatively long, brown, with light apical ring at segment 2; inner surface lighter. Antenna greyish brown, slightly lighter ringed. Forewing greyish brown, mottled with faint light yellow; three dark spots: one elongate in fold, one shorter above it, and one round and more distinct at end of cell; veins in apical part often darker, cilia slightly lighter than forewing, with faint cilia line. Hindwing greyish brown with slightly lighter cilia.

Female. Wingspan 13–14 mm. Similar to male, but with more light greyish (especially along costa) and yellow in the forewing, by which the dark spots become more conspicuous.

Male genitalia (Figs. 30, 47). Uncus rounded apically; cucullus with comparatively long dilated part; sacculus lobe sub-oval, small, with long and almost straight distoventral (outer) margin; aedeagus comparatively small, without dentate sclerite.

Female genitalia (Figs. 69–70). Apophyses posteriores about 1.5 times length of papillae anales; apophyses anteriores short, about length of segment VIII; sternite VIII with prolonged, medial sclerotizations; corpus bursae comparatively large, with indistinct patch of microtrichia.

Distribution. Locally distributed in Fennoscandia (Sweden, Finland), Estonia (Jürivete *et al.*, 2000: 43), Latvia (Karsholt & Riedl 1996: 121), north-western Poland and Russia (Kola Peninsula (Kozlov & Jalava 1994: 73)), Altai, Transbaikalia).

Biology. The larva is stated to live from September in shoots/stems of *Veronica longifolia* L. (Scrophulariaceae), often together with larvae of *Aethes triangulana* (Treitschke, 1835) (Tortricidae) (Kerppola *et al.* 1985: 87; Svensson 1993: 35). According to these authors the larva hibernates in the stem, pupating in spring, but that is doubted by Kaitila (1996: 103 and pers. comm.), who points out that this is only true for *Aethes triangulana*, whereas the larva of *Acompsia subpunctella* apparently leaves the feeding place for pupation, probably even before the winter. The adult occurs from late June to July. Vertical distribution: from sea level in northern Europe to about 1200 m in Siberia.

Remarks. *A. subpunctella* is quite similar to *A. delmastroella* in external appearance, mainly differing by the lighter colour of the forewing and by the male sacculus lobe.

The specimens studied by us from the Altai Mts. are rather worn, and it is hence difficult to state if they differ from specimens from N. Europe, apart from being slightly larger.

Acompsia subpunctella was described from 3 males collected in the Swedish province of Norbotten (Svensson 1966). The figures of the adult and its genitalia leave no doubt about the identity.

***Acompsia (Acompsia) delmastroella* Huemer, 1998: 516, figs 1–3, 10–11.**

Material examined. Holotype ♂ 'MARMORA CN. Colle d'Esischie; m 2300 slm 14.08.1996; G. B. Delmastro & M. M. Saluto leg.' 'GEL 869 ♂ P.Huemer' 'Holotypus ♂ *Acompsia delmastroella* Huemer, 1999' (TLMF). Italy: 7 ♂ paratypes, Cuneo, S Anna, Valle Traversagn, 2100 m, 8.vii.1994, leg. Delmastro; 1 ♂, ditto, but 1950 m, 25.vii.1995 (gen. slide GEL 864); 8 ♂, 3 ♀, ditto, but 21.vii.2001, leg. Huemer; 1 ♂, Cuneo, Colle dell'Agnello, 2640 m, 20.vii.2001, leg. Huemer (all TLMF), 3 ♂ Cuneo, Val Varita, Colle dell'Agnello, 2800 m, 30.vii.2001, leg. Baldizzone; 3 ♂, Cuneo, Val Maira, Accegilo, 2500 m, 3.viii.2001, leg. Baldizzone (all BLDZ, ZMUC).

Male (Fig. 12). Wingspan 15–16 mm. Labial palpus long, slender, dark brown, mottled with lighter scales, especially on inner surface. Antenna dark brown. Forewing olive-brown, slightly shining, mottled with lighter scales; three rather indistinct, black spots: two elongate, above each other at 1/3, and one (more distinct) roundish at end of cell; termen slightly emarginated below apex, without black spots; cilia light brown grey. Hindwing dark grey, with lighter brown grey cilia.

Female. Wingspan 13–14 mm. Slightly brachypterous, smaller and more narrow-winged, but in other respects similar to male.

Male genitalia (Figs. 31, 48). Uncus small, rounded laterally and distally; cucullus with stout and strongly dilated part; sacculus lobe sub-oval, comparatively small, with distinctly excavated distoventral (outer) margin; aedeagus without dentate sclerite.

Female genitalia (Figs. 71–72). Sternite VIII with distinctly prolonged, medial sclerotizations; corpus bursae comparatively large, with medium-sized patch of microtrichia.

Distribution. Endemic to the southwestern Alps (Alpi Cozie, Alpes Maritimes, Alpes-de-Haute-Provence) (PH pers. obs.; Nel 2001: 102).

Biology. Host-plant and early stages unknown. Flight period: July to mid-August. The adults have been observed in the flowers of *Helianthemum nummularium* (L.) Mill. (Cistaceae) (Nel 2001: 102; PH. pers. obs.) and they were swept from low vegetation in the afternoon. However, they were not attracted to light on the same day. Preferred habitats are alpine meadows. Vertical distribution: from about 1900 to 2800 m.

Remarks. The small size, olive-brown forewing colour with weakly developed spots and the shape of the sacculus lobe are of particular specific interest for identification of *A. delmastroella*.

Acompsia delmastroella was described from 15 males collected in the south-western Alps (Huemer 1998: 516). Meanwhile additional material could be found, and Nel (2001: 103, fig. 5) figured the female genitalia for the first time.

Acompsia (Acompsia) muellerrutzi Wehrli, 1925: 137

Material examined. France (Corse): 1♂, Ajaccio, 30.vi.1905 leg. Leonhard; 2♂, Vizzavona, 3.vii.1905, leg. Leonhard; 1♂, Monte Renoso, 17.vii.1905, leg. Leonhard (all DEI); 1♂, Statione de Val d'Ese, 1650 m, 24.vi.1994, leg. Skule & Skou (gen. slide GU 01/1070) (ZMUC).

Male (Fig. 8). Wingspan 15–16 mm. Labial palpus long, slender; segment 2 brown, with light yellow apical ring, lighter on inner surface; segment 3 greyish brown, mottled with light brown. Antenna dark brown, indistinctly lighter ringed. Forewing dark brown, mottled with light grey and yellow scales. Four rather large, black spots: one (indistinct) near base, one elongate in fold, one above it slightly towards base, and one at end of cell; termen oblique, without black spots; cilia light yellow grey. Hindwing dark grey, with greyish fringes.

Female. Unknown.

Male genitalia (Figs. 32, 49). Uncus broadly sub-rectangular; cucullus with comparatively short dilated part; sacculus lobe sub-oval, comparatively small, with distinctly excavated distoventral (outer) margin; aedeagus comparatively small, with very long and strongly dentate, distally curved sclerite.

Female genitalia. Unknown.

Distribution. Endemic to Corsica; according to Sattler (in litt.) also known from a single specimen collected in Sardinia (coll. Hartig). *A. muellerrutzi* is the only species of *Acompsia* found in Corsica, which is one of the few areas in Europe where *A. cinerella* has not been recorded.

Biology. Host-plant and early stages unknown. The few adults known to date have been collected from late June to early July. Vertical distribution: probably from sea level to about 2400 m.

Remarks. This species is mainly characterized by its small size and the exceptionally dark brown forewings. The genitalia (female unknown) are interestingly almost indistinguishable from those of *A. caucasella* sp. n., a species with a totally different external appearance.

Acompsia muellerrutzi was described from a single male collected on 5.–6.vii.1924 on Monte d'Oro (Corsica) (Wehrli 1925: 137). The holotype could not be found in the Wehrli collection in the Naturhistorisches Museum Basel. However, the detailed description leaves no doubt about the identity.

Acompsia (Acompsia) caucasella sp. n.

Material examined. Holotype ♂ 'RUSSIA Caucasus Psysh river 22.07.1994 A.Zhakov leg.' '*Acompsia* sp. ♂ A. Bidzilya det., 1996' 'GU 02/1149 ♂ P.Huemer' (ZMKU). Paratypes. Russia: 1 ♂, Caucasus, Kabardino-Balkarija, Psysh river, 20.vii.1994, leg. Zhakov (gen. slide GU 02/1139) (ZMKU).

Male (Fig. 19). Wingspan 19–22 mm. Labial palpus comparatively long, slender, yellow-brown, second segment mid-brown on outer surface and on lower surface inwards. Antenna dark brown, with quite distinct light rings. Forewing light ochreous brown with some yellow, mottled with mid-brown scales at base and in middle of forewing; three to four distinct, black spots: one elongate in fold, one above and one below it closer to base, the latter sometimes reduced, and one spot at end of cell; distinct mid-brown to dark brown subterminal fascia, interrupted by lighter veins; termen with distinct black spots at end of veins; cilia yellow grey. Hindwing grey, with light yellow grey cilia.

Female. Unknown.

Male genitalia (Figs. 33, 50). Uncus broadly sub-rectangular; cucullus with comparatively short dilated part; sacculus lobe sub-oval, comparatively small, with distinctly excavated distoventral (outer) margin; aedeagus with very long and strongly dentate, distally curved sclerite.

Female genitalia. Unknown.

Distribution. Only known from the Caucasus mountains.

Biology. Host-plant and early stages unknown. The few adults known to date have been collected in the last third of July. Vertical distribution: not stated on the original labels.

Remarks. The male genitalia are very similar to those of *A. muellerrutzi*. However, *A. caucasella* sp. n. cannot be mixed with any of the known *Acompsia* due to its characteristic ochreous brown colour and the markings of the forewing.

Etymology. Named after the type region.

Acompsia (Acompsia) minorella (Rebel, 1899: 180) (*Brachycrossata*)

Material examined. Lectotype ♂ (here designated) 'LECTO-TYPE' 'Le Sarche Juli 97 Rebel' '*minorella* Rbl Type' 'LECTOTYPE ♂ *Brachycrossata minorella* Rebel det. L. M. Pitkin, 1987' (NHMW).

Czech Republic: 1 ♀, paralectotype, 'PARA-LECTO-TYPE' 'Böhmen [Reichstadt] 1835' 'minorella Rbl Type' (NHMW). France: 2 ♂, Cannes, leg. Millière (BMNH). Italy: 1 ♂, Monte Baldo, Lumini, mid-v.1967, leg. Burmann (gen. slide 4102 Tokár) (TLMF); 1 ♂, Trento, Riva, Rochetta, 13.v.1927, leg. Osthelder; 1 ♀, Trento, Riva, Bastione, 13.v.1927, leg. Osthelder (all ZSM); 3 ♂, Trento, Mattarello, 22.vii.1945, leg. Klimesch (BMNH, ZMUH, ZSM); 1 ex, Rome, Colosseum, bred iv.1869 (abdomen missing); 1 ♀, Rome, Forum, 18.v.1917, leg. Walsingham; 5 ♂, Latinum, Frascati, 27.v.1917, leg. Walsingham (gen. slide BM 13923); 1 ♀, ditto, but 4.vi.1917 (all BMNH). Switzerland: 1 ♀, Tessin, Capolago, 5.viii., leg. Krüger (gen. slide 4103 Tokár) (TLMF); 2 ♂, Tessin, Mendrisco, 19. & 27.v.1927 (BMNH). Austria: 1 ♀, paralectotype, 'Prater 1859' (gen. slide 16.538) (NHMW). Slovenia: Ljubljana, 1 ♂, 1.ix.1927, leg. Hafner (gen. slide GEL 887); 1 ♀, ditto, but 18.viii.1928 (gen. slide GEL 1045) (all TLMF); 1 ♂, ditto, but 15.viii.1927 (NHMW).

Male (Fig. 13). Wingspan 15 mm. Labial palpus long, slender; segment 2 dark brown on outer surface, with light apical ring; other surfaces of segment 2 and segment 3 light yellow, mottled with brown. Antenna light brown grey, indistinctly lighter ringed. Forewing greyish brown, overlaid with yellow grey or light brown scales; three distinct, black spots: one elongate in fold, one rounded above it, and one larger, oblique at end of cell; a faint transverse fascia at 4/5; termen oblique, with indistinct, black spots at end of veins; cilia yellow grey. Hindwing dark grey, with greyish cilia.

Female. Wingspan 15 mm. Similar to male.

Male genitalia (Figs. 34, 51). Uncus rounded apically; cucullus with particularly broad and stout dilated part; sacculus lobe sub-oval, small, with weakly excavated distoventral (outer) margin; aedeagus with undentate sclerite.

Female genitalia (Fig. 73). Apophyses posteriores about 1.5 times length of papillae anales; apophyses anteriores short, about length of very short segment VIII; sternite VIII with distinctly prolonged medial sclerotizations; ductus bursae comparatively long; corpus bursae comparatively small, with distinct patch of microtrichia; entrance of ductus seminalis in posterior half.

Distribution. Only known from scattered localities in Austria, the Czech Republic, France, Italy, Slovenia and Switzerland.

Biology. Host-plant and early stages unknown. There is no host-plant record on the single specimen listed above as bred. The adults have been observed in May and June (Elsner *et al.* 1999: 57) and again from July to September, most probably in two generations. Preferred habitats are warm forest steppes. Vertical distribution: insufficiently known, but probably restricted to lowland localities.

Remarks. The characteristic greyish brown colour of the forewing with a transverse fascia makes this species unmistakable. The above mentioned specimen is here designated as lectotype to fix the status of the species.

Acompsia (Acompsia) tripunctella ([Denis & Schiffermüller], 1775: 319) (*Tinea*)

Material examined. Neotype ♂ (here designated) 'Austr. inf. Fischauerberge Brunn 11.5.57 Hans Malicky' (TLMF). Germany: 2 ♂, Bayern, Hausham, 520 m, mid-viii.1970, leg. Zürnbauer; 1 ♂, Bayern, Ob. First-Alm, 1400 m, late vii.1967, leg. Zürnbauer; 1 ♂, Bayern, Rotwand, late vi.1951, leg. Pfister (all TLMF). France: 7 ♂, Alpes Maritimes, Cim de Séneca, 2200 m, 18.vii.1991, leg. Huemer & Tarmann; 3 ♂, 2 ♀, Alpes Maritimes, Marguareis, Navela, 2100–2200 m, 18.–21.vii.1990, leg. Huemer & Tarmann; 1 ♂, ditto, but 21.vii.1990 (gen. slide GEL 169); 2 ♂, Alpes Maritimes, La Pra, 1600 m, 21.ix.1969, leg. Dujardin; 2 ♂, Alpes Maritimes, Le Authion, 1800–2000 m, 19.viii.1953, leg. Dujardin; 1 ♂, Alpes Maritimes, Jalorgues, 2000 m, 28.vii.1974, leg. Dujardin; 1 ♂, Alpes Maritimes, Bousieyas,

1800 m, 18.vii.1971, leg. Dujardin; 4♂, Basses Alpes, SW Castell de Restfond, Roche Chevalière, 2480 m, 25.vii.1990, leg. Huemer & Tarmann; 6♂, ditto, but Ste. Caire Brun N, 2420 m, 25.–26.vii.1990; 2♂, Hautes Alpes, Galibier, 2400 m, late viii.1973, leg. Zürnbauer; 1♂, Hautes Savoie, Plan Praz, 2000 m, 27.vii.1950, leg. Dujardin (all TLMF); 1♂, Ecrins, Allefroide, 18.viii.1995, leg. Schepler (gen. slide GU 02/1119) (ZMUC). Spain: 1♂, Huesca, 4 km W Laco Urdiceto, 10 km NW Bielsa, 2000 m, 10.vii.1992, leg. Fibiger (gen. slide HH 3546) (ZMUC). Poland: 1♂, Tatra Mts., Sarnia Skala, 1350 m, 3.vii.1987, leg. Buszko (BUSZ). Slovakia: 1♂, centr., Javoric, 17.vi.1951, leg. Patocka; 1♂, Novoveska Huta, 8.viii.1980, leg. Reiprich (gen. slide HH 3383); 1♂, ditto, but 3.vi.1981; 1♂, Spisská Nová Ves, 19.vii.1980, leg. Reiprich (all ZMUC). Italy: 2♂, Piemont, Colle di Sestriere, 2100–2700 m, 1.–6.viii.1937, leg. Zerny; 2♂, Bergamo, Alpi Orobie, Val d'Arera, 2000 m, 14.–15.viii.1992, leg. Huemer; 1♀, Brescia, Adamello, Pso. Croce Domini, Corna Bianca, 2100 m, 15.viii.1993, leg. Huemer; 5♂, Trento, Adamello, Rif. Mandron, 2500 m, mid viii.1985, leg. Pavlas; 1♂, Trento, Monte Baldo, Bocca di Navene, 1500 m, 29.vi.1985, leg. Burmann; 1♀, ditto, but 14.vii.1987, leg. Burmann & Huemer; 1♂, Trento, Tresnico, 400 m, early vi.1973, leg. Zürnbauer; 1♂, Trento, Sella group, Piz Ciavazes south, 2150 m, 7.viii.1991, leg. Huemer (gen. slide GEL 324); 1♂, Südtirol, Kurzras, 2100 m, early vii.1967, leg. Zürnbauer; 1♂, Südtirol, Trafoi, 1600 m, 24.vii.1955, leg. Malicky; 1♂, Südtirol, Schnalstal, 1000 m, late ix.1970, leg. Zürnbauer; 1♂, Südtirol, Sextener Dolomiten, Schluderbach, 1450 m, 2.vii.1991, leg. Huemer (all TLMF); 1♂, Südtirol, Sextener Dolomiten, Cimabanche, 22.vii.1990, leg. Klimesch (ZSM); 2♂, Piemonte, Cueno, Parco Natur. Reg. Alpi, Marittime, Valle della Valetta, Piano del Casa d. Re, 1800 m, 24.vii.1997, leg. Baldizzone (BLDZ); 1♂, ditto, but dint. di S. Giacomo, di Entracque, Rocca Barbis, 1750 m, 11.vii.1998, leg. Baldizzone (ZMUC); 1♂, ditto, but S. Giac. di Entracque, sent. Rifugio Soria, 1800–2100 m, 18.vii.1998, leg. Baldizzone (BLDZ); 2♂, Limon sul Garda, 26.–30.vii.1986, leg. Baungard; 3♂, Monte Baldo, Rif. Novezza, 1600 m, 27.–29.vi.1981, leg. Skou & Skule; 6♂, ditto, but 21.vii.1983, leg. Skou & Skule; 1♂, ditto, but Ferrara, 1100 m, 27.–29.vii.1981, leg. Skou & Skule; 2♂, Mt. Baldo, SW Naole, 1250 m, 22.vi.1986, leg. Schepler; 1♂, 1♀, Monte Baldo, Naole, 1500–1600 m, 21.vii.1989, leg. Karsholt; 1♀, ditto, but above Prada, 1200 m, 22.vii.1989, leg. Karsholt; 1♀, Valle d'Aosta, above Cogne, 24.vii.1989, 1800–2000 m, leg. Karsholt; 1♂, Dolomiti, Pso Pordoi, 2240 m, 10.viii.1995, leg. Schepler (all ZMUC); 1♀, Piemonte, Cueno, Val Maira, Chiappera, 2100 m, 10.viii.2001, leg. Baldizzone (BLDZ). Switzerland: 1♂, Graubünden, Umbrail, 2100 m, 31.viii.1987, leg. Burmann, Huemer & Tarmann; 4♂, Graubünden, Spina, 1600 m, 5.vi.1960, leg. Malicky; 2♂, Appenzell, Seelalp, 1000 m, 28.vi.1958, leg. Malicky (all TLMF); 1♂, Göschenen, 1.vii.1951, leg. ?; 1♂, Verbier, La Tournelle, 25.vii.1968, leg. Traugott-Olsen; 2♂, Route du Gd. St. Bernard / VS, Cantine de Proz, 1900 m, 29.vii.1968, leg. Traugott-Olsen; 2♂, Engadin, 8 km SW St. Moritz, Sils-Maria, 1850 m, 13.vii.1989, leg. Karsholt (all ZMUC). Austria: 1♂, Vorarlberg, Lech, Schafalpe, 1700 m, 21.vii.1954, leg. Süssner; 1♀, Nordtirol, St. Anton/Arlberg, Schöngraben, 1400 m, 16.vii.1959, leg. Süssner; 2♂, Nordtirol, Rettenbachtal, 2600 m, 14.ix.1987, leg. Burmann & Huemer; 1♂, Nordtirol, Obergurgl, 1950 m, 22.viii.1987, leg. Huemer; 1♂, Nordtirol, Pillermoor, 18.vii.1988, leg. Burmann & Tarmann; 1♂, Nordtirol, Zams, Steinseehüttenweg, 1000 m, 17.ix.1987, leg. Huemer; 1♀, ditto, but 13.viii.1988, leg. Burmann & Huemer; 1♂, Nordtirol, Weißenbach, Feldele, 910 m, 24.viii.1989, leg. Huemer; 1♂, Forchach, Johannesbrücke, 901 m, 17.vi.1989, leg. Kahlen; 1♂, Rifstal, Weitgriesalm, 900 m, 29.vi.1993, leg. Huemer; 1♂, ditto, but 14.viii.1993; 1♂, ditto, but 8.vi.1993, leg. Cerny; 1♀, Nordtirol, Ehrwald, 31.viii.1968, leg. Hernegger; 1♂, 1♀, Nordtirol, Seegrube, 27.vii.1961, leg. Hernegger; 1♂, Nordtirol, Langer Sattel, 13.viii.1965, leg. Hernegger; 1♂, Nordtirol, Innsbruck, 6.vii.1957, leg. Hernegger; 1♂, Nordtirol, Höttinger Graben, 1200 m, 26.vii.1966, leg. Hernegger; 1♂, Nordtirol, Innsbruck, Kranebitten, 4.v.1968, leg. Burmann; 1♂, Nordtirol, Zirl, 600 m, 1.ix.1969, leg. Burmann; 1♂, Nordtirol, Mösern, 1200 m, 18.viii.1969, leg. Burmann; 1♂, Nordtirol, Valsertal, 1400 m, 23.vi.1959, leg. Hernegger; 1♂, Nordtirol, Vennatal, 1400 m, 14.vi.1938, leg. Scholz; 1♂, Osttirol, Rieserfernergruppe, Patschertal, 2080 m, 15.viii.1989, leg. Tarmann; 1♂, 6♀, Osttirol, Venedigergruppe, Sajatmäher, 2200–2600 m, 30.vii.1993, leg. Ryrholm; 2♂, Osttirol, Venedigergruppe, Maurer Alpe, 2300–2500 m, 5.viii.1993, leg. Rakosy; 2♂, Osttirol, Schobergruppe, Stanis Alm, 2000 m, 23.vii.1989, leg. Tarmann; 1♂, Osttirol, Granatspitzgruppe, S Sudetendeutsche Hütte, 2500–2650 m, 16.viii.1991, leg. Tarmann; 1♂, 1♀, Osttirol, Kartitsch, 1600 m, 17.vii.1964, leg. Süssner (gen. slide GEL 1047♀); 1♂, 1♀, ditto, but 9.vii.1964; 1♂, Kärnten, Dobratsch, 2000–2100 m, 23.vii.1993, leg. Huemer & Wieser; 1♂, Kärnten, Karawanken, Kossiak, 1700 m, 25.vi.1949, leg. Pinker; 1♂, Kärnten, Loibltal, vii.1950, leg. Pinker (gen. slide GEL 54); 1♂, Steiermark, Lainbach, 1.viii.1920, leg. Zerny; 1♂, Niederösterreich, Dürrenstein, 1400 m, 4.ix.1962, leg. Malicky (all TLMF); 1♂, Umgebung Wien; 2♂, Oberösterreich, Ternberg, 14.vi.1961, leg. Johansson; 1♂, Kärnten, Arnoldstein, Gailtal, 600 m, 24.vi.1981, leg. Skou & Skule; 1♂, Osttirol, Glocknergruppe, above Kals, 1700–2200 m, 28.vii.1991, leg. Karsholt & Rakosy; 1♂, Osttirol, Innervillgraten, 1800 m, 15.vii.1981, leg. Schnack; 2♂, Osttirol, Lavant, path to Lav. Alm, 1200 m, 2.viii.1991, leg. Deutsch, Huemer & Karsholt (all ZMUC); 1♂, Steiermark, Reichenstein, 5.viii.1900 (ZSM). Slovenia: 1♂, Triglav, Vrata, 1100 m, 29.vii.1984, leg. Schnack (ZMUC); 1♂, Solcava Logarska dolina, 900 m, 25.–26.vi.1988, leg. Lichtenberger (TLMF). Croatia: 1♂, Velebit, Zavizan, 1600 m, 15.viii.1978, leg. Baldizzone (ZMUC); 1♂, ditto, but 1400 m, 12.viii.1982 (BLDZ); 2♂, Karlovac, 250 m, late viii.1979, leg. Zürnbauer (gen. slide GEL 880) (TLMF). Yugoslavia (Montenegro): 3♂, Durmitor, Komarnica, Klijestina, 1400 m, 24.vii.1985, leg. Jaksic (gen.

slide GEL 325) (TLMF). Romania: 1♂, Retezat, Ujhelyi, 23.vii.1910 (ZMUC). Ukraine: 1♂ E. Carpathian, Vorokhta, 21.vi.1964, leg. Falkovitsh (gen. slide GU 02/1143) (ZMKU).

Male (Figs. 14–15). Wingspan 19–23 mm. Labial palpus long, slender, greyish brown, mottled with light brown on inner surface. Antenna brown, indistinctly lighter ringed. Forewing clay-brown to greyish brown, mottled with light greyish (especially along costa), yellow brown and some black scales; three distinct, black spots: one elongate in fold, one above it closer to base, and one rounded or oblique elongate at end of cell, rarely a small black dash below of the latter; termen slightly emarginated below apex, frequently with a row of black dots at end of veins; cilia light yellow grey. Hindwing grey; cilia as in forewing.

Female (Fig. 16). Wingspan 16–18 mm. Slightly brachypterous, with narrower wings than in male. Forewing darker brown, with more distinct light area at basal half of costal area; black spots less distinct, especially the two basal ones.

Male genitalia (Figs. 35, 52). Uncus slightly dilated towards apex; cucullus with comparatively long dilated part; sacculus lobe sub-oval, very large and broadly rounded, distoventral (outer) margin deeply excavated; aedeagus with very long, dentate sclerite.

Female genitalia (Figs. 74–75). Apophyses posteriores about two times length of papillae anales; apophyses about length of segment VIII; sternite VIII with weakly prolonged, broad medial sclerotizations; ductus bursae long; corpus bursae with medium-sized patch of microtrichia.

Distribution. Due to the confusion with externally similar species the distribution is insufficiently known. Reliable or confirmed records are known mainly from montane areas: Alps, Apennines, Carpathians and the Balkans. We examined only one specimen from Spain, and most records from the Pyrenees and from Central Spain are due to misidentifications of *A. antirrhinella* or *A. pyrenaella* sp. n. Records from European Russia, Transbaikalia and the Caucasus (Ponomarenko 1997b: 10) require confirmation and are at least partially based on further misidentifications. The record from Albania (Karsholt & Riedl 1996: 121) refers to *A. ponomarenkoae* sp.n., and one from Finland (Elsner *et al.* 1999: 57) to *A. subpunctella*.

Biology. The early stages were described by Chrétien (1899), who reared *A. tripunctella* from eggs: Among different plants offered the small larvae chose *Plantago alpina* L. (Plantaginaceae) for food. They emerged about 15 days after oviposition. The full-grown larva measures 12–13 mm; it is black brown slightly tinged with greenish, without longitudinal line; incisions between 1st, 2nd and 3rd segments laterally whitish grey; warts big and intensively black; head and thoracic shield shining black; thoracic legs long and black; abdominal legs black with brown crown.

The larva makes no spinning – apart from a silken tube covered with leaf litter for hibernating. It pupates in June on the ground in a loose cocoon. Chrétien also found full-grown larvae under stones in September in 2400 m altitude, and he therefore concluded that *A. tripunctella* in higher altitudes may need two years for its development (Chrétien 1899: 203–204).

Flight period: June to September. The adult occurs in various habitats such as clearings and edges of forests, steppe slopes and various meadows up to the alpine zone. It is readily attracted to light but can also be found during the day. Vertical distribution: from about 500 to 2500 m.

Literature records giving *Antirrhinum majus* L. (Scrophulariaceae) as host-plant for *A. tripunctella* (e.g. Ponomarenko 1997b: 10) most probably refer to *A. antirrhinella*, and that may also be true for the association with *Linaria cymbalaria* (L.) Mill. (Scrophulariaceae) originating from Chrétien (Lhomme 1930: 120). Lhomme (*loc. cit.*) also mentions *Globularia* as a hostplant for *A. tripunctella*, however, without further reference.

Remarks. *A. tripunctella* shows some variation, which at least partly seems to be geographically correlated. Male specimens from the central Alps (Austria and Switzerland) have greyish brown forewings, frequently mottled with some number of black scales, whereas males from the Monte Baldo area in northern Italy but also from other localities on calcareous soil have lighter greyish brown forewings. Males from Slovakia and other parts of eastern Europe are more plain brown, with few black scales, and frequently without dark spots along termen. Populations from the southeastern Alps of Austria (Carinthia) and Slovenia to Croatia and Yugoslavia (Montenegro) have shorter, more rounded forewings than typical *A. tripunctella*, with largely reduced black markings and usually only one well developed spot at the end of cell. Furthermore the hindwings are darker. However, we could find no genitalia differences between these populations and hence they are regarded a conspecific with *A. tripunctella*. This species is very similar to some other *Acompsia* but can be readily distinguished by the very large sacculus lobe.

The original description of *Tinea tripunctella* ('Flachsbräunlichter Sch. mit 3 schwarzen Punkten') is poor and leaves some doubt about the identity. Unfortunately in 1848 the collection of Denis & Schiffermüller was destroyed by fire (Horn & Kahle 1935–1937: 243). However, Charpentier (1821: 119), who studied the collection of Schiffermüller prior to its destruction, stated that the specimen(s) of *Tinea tripunctella* belonged to the same species as figured under that name by Hübner (1796, pl. 32, fig. 217), and that figure does not contradict the current interpretation of that name. To fix the identity of *T. tripunctella* we designate the mentioned specimen as the neotype.

Acompsia (Acompsia) pomorenkoae sp. n.

Material examined. Holotype ♂ 'Greece, Ipiros, Katara pass, 1500–1700 m, 24.–27.v.1994, leg. O. Karsholt' (ZMUC). Paratypes. Albania: 1♂, Korab, 23.–31.vii.1918; 2♂, Gjalica Ljums, 17.–26.vi.1918 (gen. slide 16.639) (all NHMW). Greece: allotype ♀, caught in copula with holotype and mounted on same polyporus (ZMUC); paratypes 9♂, 8♀, same data as holotype (gen. slide GU 01/1079♀; HH 3384) (ZMUC, TLMF); 1♂, ditto, but 1600 m, 11.viii.1985, leg. Fibiger; 1♂, ditto, but 1800 m, 27.vii.1990, leg. Fibiger (gen. slide GU 01/1068♀); 1♂, Evrytania, Timphrystos, 1900 m, 1.vii.1985, leg. Schepler (gen. slide HH 3386) (all ZMUC); 1♂, Epirus, Katara Pass, 1650 m, 26.vi.1991, leg. Somerma & Väisänen; 1♂, Epirus, Zagoria, Skamneli Timfi, 1400 m, 24.vii.1991 leg. Somerma & Väisänen; 1♂, ditto, but, Goura, 2200 m, 24.vii.1991, leg. Somerma & Väisänen (all ZMUH).

Male (Fig. 17). Wingspan 20–24 mm. Labial palpus long, slender, dark brown, mottled with yellow brown, especially on inner surface. Antenna dark brown, indistinctly lighter ringed. Forewing rather plain light brown, with scattered black brown scales; three small, black spots: one (sometimes very weak) in fold, one above it a little towards base, and one (more distinct) at end of cell; termen emarginated below apex, with rather distinct, small black spots at ends of veins; cilia light brown. Hindwing grey, with yellow grey fringes.

Female (Fig. 18). Wingspan 16–17 mm. Reasonably brachypterous. Labial palpus of same colour as in male, but shorter. Antenna dark brown. Forewing about half as broad as in male, dark brown, overlaid with lighter brown scales; a lighter subcostal streak from base; two indistinct, black spots at 1/3 and 2/3; termen oblique, sometimes with a few black scales; fringes light brown. Hindwing about two thirds as broad as in male, grey, with lighter, brown grey cilia.

Male genitalia (Figs. 36, 53). Uncus rounded distally; cucullus with moderately weakly dilated part; sacculus lobe medium-sized, sub-oval, delimited from posterior part, with irregularly emarginated distoventral (outer) margin; aedeagus distodorsally distinctly pointed, with very long and strongly dentate sclerite.

Female genitalia (Figs. 76–77). Apophyses posteriores about three times length of papillae anales; sternite VIII with extremely long medial sclerotizations, extending beyond apices of apophyses anteriores; ductus bursae short; corpus bursae large, with very large patch of microtrichia.

Distribution. Only known from Albania and Greece. Further records of *A. tripunctella* from the Balkan Peninsula have to be checked and may refer to this species.

Biology. Host-plant and early stages unknown. The few adults known to date have been collected during the day and at light from late May to late July, at altitudes between 1400 and 2200 m.

Remarks. *A. ponomarenkoae* sp. n. is closely related to *A. schepleri* sp. n. from which it differs by lacking the dark veins, and from *A. fibigeri* sp. n. which has smaller sacculus lobes. From the also very similar *A. bidzilyai* sp. n. it differs by the light brown rather than light greyish brown colour of the forewing without dark scales near the base. Furthermore, the forewings are narrower and costally less convex. The male genitalia are again very similar though the sacculus lobe is smaller in *A. ponomarenkoae* sp. n.

Etymology. Named after Dr. Margarita Ponomarenko (Vladivostok) who discovered its distinctness independently of us.

Acompsia (Acompsia) schepleri sp. n.

Material examined. Holotype ♂ 'Turkey, Prov. Erzincan Kizildag Gecidi, 2100 m. 19.viii.1993. Leg. Fritz Schepler' 'Gen. præp. nr. 4848 ♂ O. Karsholt' (ZMUC). Paratypes. Turkey: 13 ♂, same data as holotype (gen. slide GU 01/1067) (TLMF, ZMUC).

Male (Fig. 20). Wingspan 22–24 mm. Labial palpus comparatively long, slender; segment 2 dark brown mottled with whitish on upper and inner surface and with white apical ring, segment 3 lighter. Antenna brown, indistinctly lighter ringed. Forewing with rounded apex, light brown, with stripes of black scales between veins; one slightly oblique, black spot at end of cell; termen without emargination below apex, lined with black scales, especially at end of veins; cilia brown grey, lighter beyond cilia line. Hindwing brown grey; cilia yellow at base, light grey beyond grey cilia line.

Female. Unknown.

Male genitalia (Figs. 37, 54). Uncus broadly sub-rectangular; cucullus with particularly broad dilated part; sacculus lobe medium-sized, sub-oval, distal part marked-

off, caudal part with very long and straight distoventral (outer) margin; aedeagus with very long and strongly dentate sclerite.

Female genitalia. Unknown.

Distribution. Only known from one mountain locality in central Turkey.

Biology. Host-plant and early stages unknown. The adults have been collected in mid-August at light at an altitude of about 2100 m.

Remarks. Similar to *A. fibigeri* sp. n. in genital characters (female unknown). However, due to its large size and the forewings with black stripes between the veins and the rounded apex *A. schepleri* sp. n. is easily separated from other species of *Acompsia*. It may resemble some species of *Chionodes* Hübner, but can be easily distinguished by the thin 2 segment of the labial palpus without ventral brush, the pre-genital segment of the males and genitalia characters of both sexes.

Etymology. Named after the Danish lepidopterist Fritz Schepler who collected the type series.

Acompsia (Acompsia) fibigeri sp. n.

Material examined. Holotype ♂ 'Turkey, Gümüşhane, Kop pass, 2400 m, 13.–14.ix.1993, leg. M. Fibiger' (ZMUC). Paratypes. Turkey: 5♂, same data as holotype (gen. slide GU 02/1112) (TLMF, ZMUC).

Male (Fig. 21). Wingspan 22–23 mm. Labial palpus comparatively long, slender, greyish brown on outer and lower surface, yellow on inner and upper surface; apex of segment 2 light. Antenna dark brown, indistinctly lighter ringed. Forewing brown, mottled with yellow brown and some darker scales; one weak, oblique, black spot at end of cell; termen weakly emarginated below apex, without black spots at end of veins; cilia yellow grey. Hindwing grey, with light yellow grey cilia.

Female. Unknown.

Male genitalia (Figs. 38, 55). Uncus broad, sub-rectangular; cucullus with broadly dilated part; sacculus lobe comparatively small, rounded, caudal part with very long and slightly emarginated distoventral (outer) margin; aedeagus with very long and strongly dentate sclerite.

Female genitalia. Unknown.

Distribution. Only known from a mountain area in eastern Turkey.

Biology. Host-plant and early stages unknown. The adults have been collected in mid-September at light at an altitude of about 2400 m.

Remarks. Very similar to *A. schepleri* sp. n. in genital characters (female unknown) but differing by the absence of black stripes in the forewing and furthermore by the small and rounded sacculus lobe.

Etymology. Named after the Danish lepidopterist Michael Fibiger who collected the type series of this new species and other important material used for this paper.

Acompsia (Acompsia) bidzilyai sp. n.

Material examined. Holotype ♂ 'Zabajkale Sochodinskij zapovednik r. Agucakan 1000 m light 19.07.1997 A. Bidzilja, I. Kostjuk, O. Kostjuk [in cyrillic]' 'GU 02/1144 ♂ P.Huemer' (ZMKU). Paratype.

Russia: 1♂, E Transbaikalia, Chita reg., 75 km N Mogoci, Tupik, 8.vii.1993, leg. Kostjuk, Kostjuk, Golovushkin & Salata (gen. slide GU 02/1142) (ZMKU).

Male (Fig. 22). Wingspan 19–20 mm. Labial palpus comparatively long, slender, light greyish brown, somewhat lighter on inner surface. Antenna mid-brown. Forewing light greyish brown; small subbasal patch of dark scales; three distinct, rather large, black spots: one elongate in fold, one above it closer to base, and one rounded at end of cell; costa convex towards termen, termen straight, with a row of black dots at end of veins; cilia concolorous with forewing. Hindwing grey; cilia as in forewing.

Female. Unknown.

Male genitalia (Figs. 39, 56). Uncus rounded distally; cucullus with moderately weakly dilated part; sacculus lobe medium-sized, sub-oval, without strong separation from posterior part, with irregularly emarginated distoventral (outer) margin; aedeagus distodorsally distinctly pointed, with long and strongly dentate sclerite.

Female genitalia. Unknown.

Distribution. Only known from Transbaikalia (Russia). From this region the new species was doubtfully recorded as *A. tripunctella* (Budashkin & Kostjuk 1994: 20).

Biology. Host-plant and early stages unknown. The few adults known to date have been collected in July.

Remarks. *A. bidzilyai* sp. n. is very similar to other species of the group externally but differs by a small subbasal patch of dark scales. Furthermore the wings are more rounded distally and the ground colour is plain light greyish brown.

Etymology. Named after Dr. Oleksiy Bidzilya (Kiev), who already suspected an undescribed species.

Subgenus *Telephila*

Acompsia (Telephila) schmidtiiellus (Heyden, 1848: 954) (*Ypsolophus*)

Ypsolophus durdhamellus Stainton 1849: 12.

Hypsolopha quadrinella Herrich-Schäffer 1854: 154.

Material examined. Denmark: 1♀, LFM, Maribo, la. 2.vi.1918, *Origanum*, leg. Sønderup (gen. slide HH 1978); 3♂, LFM, Høvblege Bakker, 2.viii.1961, leg. Traugott-Olsen (gen. slide ETO 442); 7♂, 5♀, SZ, Fladså, la. 24.v.–18.vi.1973, *Origanum vulgare*, leg. Karsholt (gen. slides OK 2139♂, 2140♀, 2141♂); 1♀, ditto, but la. 10.vi.1979, leg. Hendriksen (gen. slide HH 2016); 3♂, LFM, Mons Klint, 26.vii.1997, leg. Karsholt; 2♂, 3♀, ditto, but la. 12.vi.1999, *Origanum vulgare*, leg. Karsholt; 36 additional, undissected specimens from Denmark (all ZMUC). Germany: 1♀, Württemberg, Markgröningen, 20.vii.1956 e.l., *Mentha*, leg. Süssner (gen. slide GEL 1059); 1♀, Württemberg, Marbach – Neckar, Otterbachtal, 2.viii.1956 e.l., *Origanum vulgare*, leg. Süssner; 1♂, Württemberg, Marbach – Neckar, 26.vi.1953 e.l., *Origanum vulgare*, leg. Süssner; 1♂, ditto, but 28.vi.1953 e.l. (gen. slide GEL 1058); 1♂, Württemberg, 2 km SSW Laufen – Neckar, 170 m, 15.viii.1978, leg. Süssner (all TLMF). Andorra: 1♂, Arnisa, 1500 m, 1.viii.1997, leg. Baungaard (ZMUC). Spain: 1♂, Andalucía, Sierra Nevada, Cam. D. Valeta, 2050 m, 3.viii.1986, leg. Traugott-Olsen (ZMUC); 1♂, Lerida, Aranis, Tremp Valley, 700 m, 8.vii.1993, leg. Skou (ZMUC). Italy: 1♂, Piemonte, Cuneo, Parco Natur. Reg. Alpi Marittime, Valdieri, 900 m, 17.vii.1999, leg. Baldizzone; 1♂ ditto, but 29.vii.2001 (all BLDZ).

Male (Fig. 23). Wingspan 14–16 mm. Segment 2 of labial palpus with large ventral scale-brush, black brown at outer and lower surface, yellow at inner and upper surface; segment 3 long and thin, yellow, mottled with black-brown at lower surface. Antenna

slightly serrated, with cilia, light brown, indistinctly lighter ringed. Forewing light orange-brown, mottled with some black scales; two or three black spots as follows: one distinct in cell, one indistinct (sometimes missing) above it, and one rather indistinct (rarely missing) at end of cell; a small patch of black scales at tornus; an indistinct light fascia from outside tornus to costa; termen emarginated below apex, with a fine, black line; cilia concolourous with forewing; hindwing grey, with yellow cilia.

F e m a l e . Wingspan 15–17 mm. Similar to male, but slightly larger, with thinner, unserrated antenna and more plain orange-brown forewing.

M a l e g e n i t a l i a (Figs. 40, 57). Uncus sub-rectangular; cucullus with particularly long dilated part; sacculus lobe covered with microtrichia in distal part, weakly convex and comparatively small, with weakly concave distoventral (outer) margin; sclerites of vinculum even throughout; aedeagus with long, dentate sclerite, vesica without sclerotized, spiralled distal part.

F e m a l e g e n i t a l i a (Figs. 78–79). Papillae anales large; apophyses posteriores about 1.5 times length of papillae anales; apophyses anteriores about length of segment VIII; sternite VIII with distinctly prolonged medial sclerotizations; ductus bursae comparatively long and evenly broadened towards corpus bursae, with distinct sclerite anteriorly; corpus bursae comparatively small, globular, with small patch of microtrichia.

D i s t r i b u t i o n . Found locally in central, eastern and southern Europe (Karsholt & Riedl 1996: 121), from Denmark in the north to southern Spain and Portugal. To the east it is found in Ukraine (Elsner *et al.* 1999: 57). A record from Estonia (Piskunov 1990: 1004) falls outside the known distribution area and is not accepted for the Estonian checklist (Jürivete 2000).

B i o l o g y . The larva and pupa were recently described and figured in detail (Huertas-Dionisio 2002). The larva is slim, yellow white, with a small heart-formed, shining dark brown head and lighter brown prothoracic shield; segments three and four purplish brown, interrupted at the segmental divisions with yellow white; central dorsal stripe deep brown purple, on each side bordered by a broad stripe of the same hue; abdominal segments with rows of purplish tubercular dots and darker spots with short hairs; forelegs black brown; prolegs cream.

The larva feeds until June on *Origanum vulgare* L. (Lamiaceae), folding a leaf and spinning it together, only leaving a small entrance in each end, through which it rapidly disappears if disturbed. It is active preferably during the night. Lhomme (1948: 660) also recorded *Mentha arvensis* L., *M. silvestris* L., *M. rotundifolia* L. and *Calamintha nepeta* (L.) Savi (Lamiaceae) as host plants, and it was bred from *Clinopodium vulgare* L. (Lamiaceae) in Portugal (Corley *et al.* 2000: 269). Pupation takes place either in a folded leaf or between dry leaves on the ground. Flight period: late June to late August. The adult is attracted to light (Heyden 1848: 955; Baker 1888: 136; OK pers. obs.). Vertical distribution: from sea level to about 2000 m.

R e m a r k s . *Ypsolophus schmidtellus* Heyden was described from an unspecified number of larvae and adults found by U. Schmidt near Sachsenhäuser Warte (Frankfurt/Main) and Königstein/Taunus (Germany). The description of this species leaves no doubt about its identity.

Ypsolophus durdhamellus Stainton was described from an unspecified number of

specimens from Durdham Downs near Bristol, and from Devonshire (England). It was already listed as a synonym of *quadrinella* by Herrich-Schäffer (1855: 37 (Index)). *Hypsolopha quadrinella* Herrich-Schäffer was described from one specimen found by Fischer von Röslerstamm at Rodaun (SW of Vienna, Austria), and first figured in a plate non-binominal (Herrich-Schäffer 1853: pl. 81, fig. 616). It was listed as a synonym of *durdhamellus* by Heinemann (1870: 339).

Acompsia (Telephila) syriella sp. n.

Material examined. Holotype ♂ '17.–18.V.1961, Syria, 25 km W v. Damascus, Kasy & Vartian' (NHMW). Paratypes: 2♂, same label data as holotype (gen. slide HH 3389, NM 16.642 ♂).

Male (Fig. 24). Wingspan 14 mm. Segment 2 of labial palpus with large scale brush, light brown, mottled with black on outer and lower surface, whitish yellow on upper and inner surface; segment 3 comparatively long, thin. Antenna serrated, with cilia, yellow brown, indistinctly ringed with black. Forewing straw yellow, mottled with black scales; three black spots: one in fold, one above it slightly towards base, and one slightly oblique at end of cell; more or less distinct black patches near base, between black spots, at tornus and as a subapical band; termen slightly emarginated below apex, with distinct black line; cilia yellow brown, lightest at base. Hindwing grey, with grey, light yellow-based cilia.

Female. Unknown.

Male genitalia (Figs. 41, 58). Uncus sub-rectangular; cucullus with long, comparatively weakly dilated distal part; sacculus lobe short, covered with few microtrichia in distal part, weakly convex and comparatively small, almost straight distoventral (outer) margin; sclerites of vinculum even throughout, very long, distinctly overtopping sacculus lobes; aedeagus with small dorsal sclerite at base, without dentate distal sclerite, vesica without sclerotized, spiralled distal part.

Female genitalia. Unknown.

Distribution. Only known from a single locality in Syria.

Biology. Host-plant and early stages unknown. The adults have been collected in mid-May.

Remarks. *A. syriella* sp. n. resembles *A. schmidtellus*, but is smaller, with the black spots and patches in the forewing more distinct; segment 3 of the labial palpus is shorter. The male genitalia of the new species differ from the latter particularly by the longer arms of the vinculum, the smaller valvae and the lack of a dentate sclerite of the aedeagus.

Etymology. Named after the type region.

Acknowledgements

We are most grateful to Dr. Klaus Sattler (London) for his invaluable help in many respects, mainly including various informations about material, literature etc., and for carefully checking the manuscript. Moreover we want to thank the following colleagues: Dr. Giorgio Baldizzone (Asti), Dr. Ronald Bellstedt and A. Schreyer (Gotha), Dr. Oleksiy Bidzilya (Kiev), Prof. Jarosław Buszko (Toruń), Dr. Karel Cerny (Innsbruck), Dr. Reinhard Gaedike (Eberswalde), Dr. László Gozmány (Budapest), Keld Gregersen (Sorø), Dr. Theo Grünewald (Landshut), Henning Hendriksen (Fårevjle), Dr. Lauri Kaila and Jaakko Kullberg (Helsinki), Jari Kaitila (Vantaa), Dr. Martin Lödl and Mag. Susanne Randolf (Vienna), Dr. Wolfgang

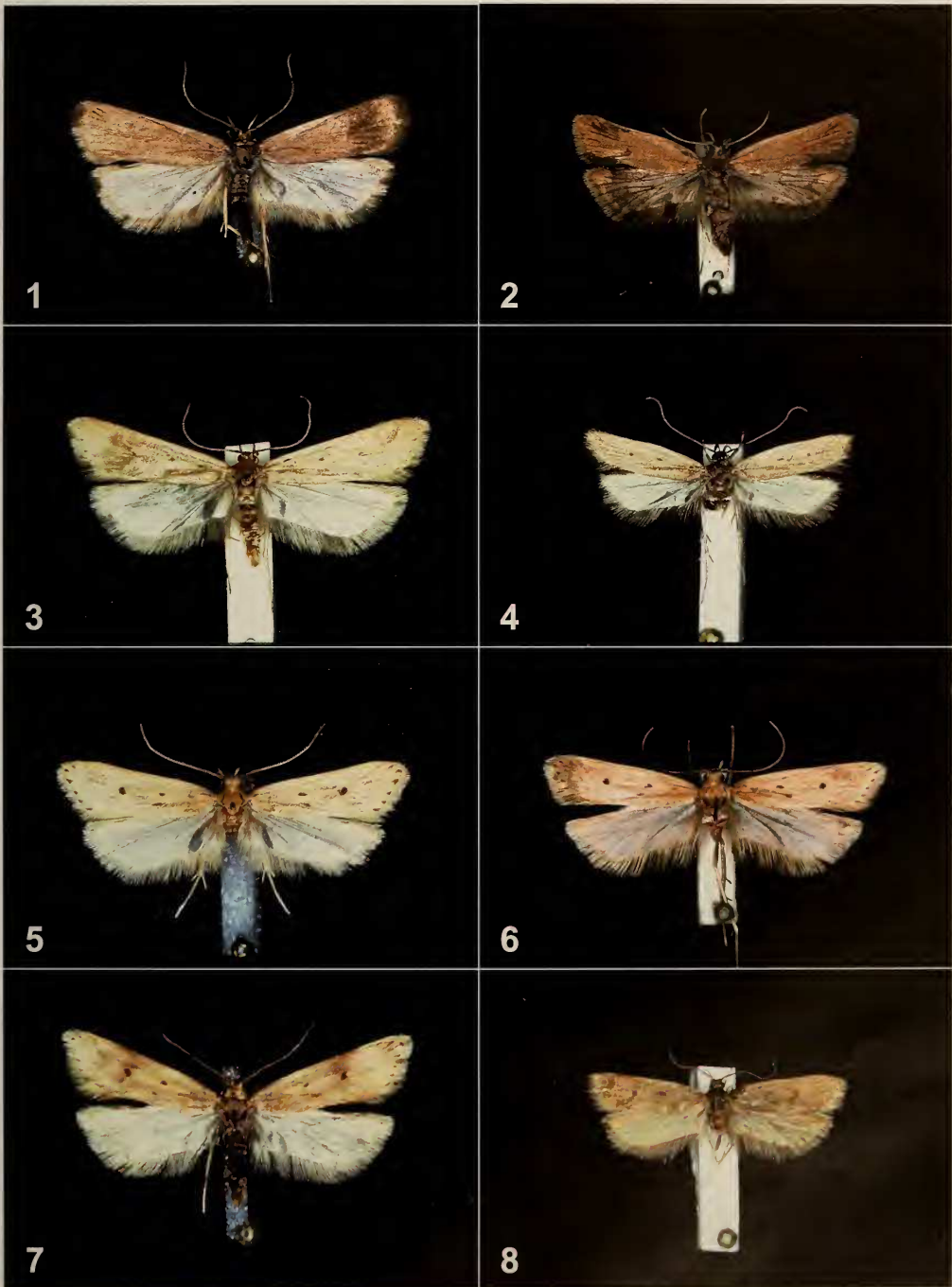
Nässig (Frankfurt), Dr. Matthis Nuss (Dresden), Dr. Margarita Ponomarenko (Vladivostok), Willy De Prins (Antwerpen), Dr. Andreas Seeger (Munich) and Kevin Tuck (London) for the loan of material, important information and/or other kinds of assistance.

References

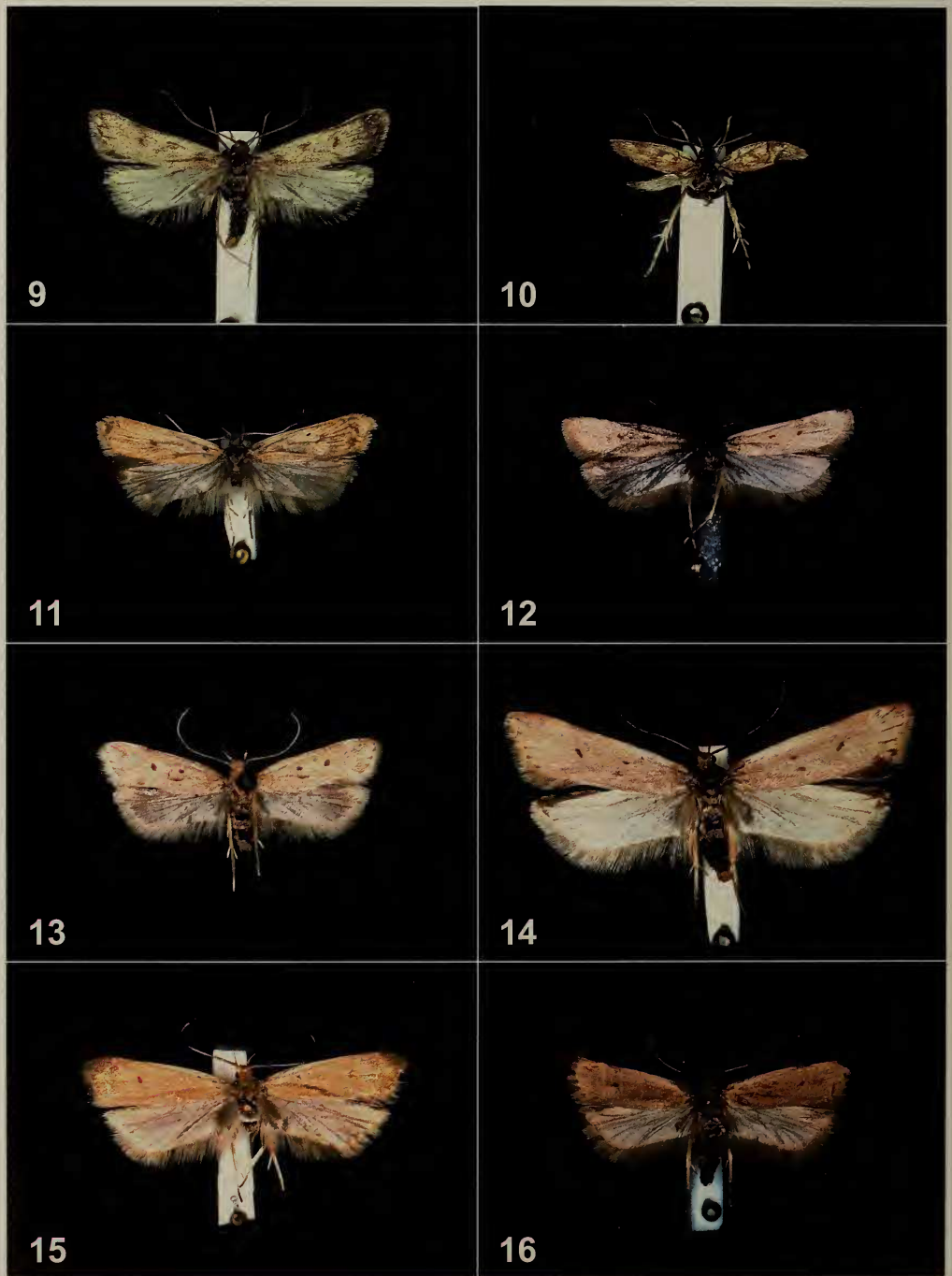
- Amsel, H. G. 1935. Weitere Mitteilungen über palästinensische Lepidopteren. – Veröff. dt. Kolon. u. Übersee-Mus. Bremen 1: 223–277.
- Baker, G. T. 1888. Description of the larva of *Ypsolophus schmidtellus* [sic], Heyd. (*Nothris durdhanellus*, Stn.). – Entomologist's mon. Mag. 25: 136.
- Becker, O. 1984. Gelechiidae. Pp. 44–53, 59–60. In: Heppner, J. B. (ed.): Micropterigoidea – Immoidea. – Atlas of Neotropical Lepidoptera. Checklist 1. – W. Junk, The Hague, Boston, Lancaster. xxvii+112 pp.
- Budashkin, Yu. I. & Kostjuk, I. Yu. 1994. On the fauna of Mircolepidoptera of Transbaikalia. – Memoirs of the Dahursky Nature Reserve 2: 5–30.
- Charpentier, T. von 1821. Die Zinsler, Wickler, Schaben und Geistchen des systematischen Verzeichnisses der Schmetterlinge der Wiener Gegend vergleichen mit den in der Schiffermüllerschen Sammlung in Wien befindlichen und von J. Hübner in seinem grossen Kupferwerke abgebildeten Arten dieser Gattungen. Mit Anmerkungen von J. L. Th. Fr. Zincken genannt Sommer. – Schulbuchhandlung, Braunschweig. xvi + 178 pp.
- Chrétien, P. 1899. Les premiers états de *Brachycrossata tripunctella* S. V. (Lep.). – Bull. Soc. ent. Fr. 1899: 202–204.
- Clerck, C. 1759. Icones Insectorum rariorum cum nominibus eorum trivialibus locisque e C. Linnaei Systema Naturae allegatis. – Stockholm. 55 + 7 pls. Sectio prima: 4 pp. Dedicatio, 4 pp. Vorrede 1–16 pls.
- Corley, M. F. V., Gardiner, A. J., Cleere, N. & Wallis, P. D. 2000. Further additions to the Lepidoptera of Algarve, Portugal (Insecta: Lepidoptera). – SHILAP Revta. lepid. 28: 245–319.
- [Denis, M. & Schiffermüller, I.] 1775. Ankündigung eines systematischen Werkes von den Schmetterlingen der Wienergegend. – A. Bernardi, Wien. 323 pp., 3 pls.
- Duponchel, P.-A.-J. ([1838–1840]): Nocturnes, 8. – In: Godart, J. B.: Histoire naturelle des Lépidoptères ou Papillons de France 11. – Méquinon-Marvis, Libraire-éditeur, Paris. 720 pp., pls 287–314.
- Edwards, E. D. 1996. Gelechiidae. Pp. 107–114, 347–348. In: E. S. Nielsen, Edwards, E. D. & Rangsi, T. V. (eds): Checklist of the Lepidoptera of Australia. – Monographs on Australian Lepidoptera 4. – CSIRO Publishing, Collingwood, Australia. xiv+529 pp.
- Elsner, G., Huemer, P. & Tokár, Z. 1999. Die Palpenmotten (Lepidoptera, Gelechiidae) Mitteleuropas. Bestimmung – Verbreitung – Flugstandort – Lebensweise der Raupen. – F. Slamka, Bratislava. 208 pp.
- Gaede, M. 1937. Familia: Gelechiidae. – In: Bryk, F. (ed.): Lepidopterorum Catalogus. Pars 79. – W. Junk, Berlin & 's-Gravenhage. 630 pp.
- Gaedike, R. & Heinicke, W. (eds) 1999. Entomofauna Germanica 3. Verzeichnis der Schmetterlinge Deutschlands. – Ent. Nachr. Ber., Suppl. 5: 1–216.
- Haworth, A. H. 1828. Lepidoptera Britannica 4. J. Murray, London. Pp. 512–609.
- Herrich-Schäffer, G. A. W. 1847–1855. Systematische Bearbeitung der Schmetterlinge von Europa. 5. – G. J. Manz, Regensburg. 394+52 (index) pp., 124+7+1 pls.
- Heinemann, H. v. 1870. Die Schmetterlinge Deutschlands und der Schweiz. 2 Abteilung Kleinschmetterlinge. 2. Die Motten und Federmotten. Heft 1. – C. G. Schwetschke & Sohn, Braunschweig. 388 pp.
- Heyden, C. H. G. von 1848. Nachtrag über den oben erwähnten *Ypsolophus schmidtellus* (v. Heyden). Pp. 954–955. In G. Koch: Die Raupen und Schmetterlinge des südwestlichen Deutschlands, insbesondere der Umgebung von Frankfurt, Nassau und der westlichen Abdachung des Taunus-Gebirges. – Isis, Leipzig 1848: 891–955.
- Hodges, R. W. 1983. Gelechiidae. Pp. 19–25. In: Hodges, R. W. et al. (eds): Check list of the Lepidoptera of America North of Mexico. xxiv + 284 pp. E. W. Classey Ltd. and The Wedge Entomological Research Foundation, Cambridge.
- Hodges, R. W. 1986. Gelechioidea. Gelechiidae (Part).

- Dichomeridinae. In: Dominick, R. B. *et al.*: The Moths of America North of Mexico 7(1): 1–195, i–xiii. The Wedge Entomological Research Foundation, Washington.
- Horn, W. & Kahle, I. 1935–1937. Über entomologische Sammlungen, Entomologen & Entomomuseologie. – Ent.Beih. Berl.-Dahlem 2–4: 1–536, pls 1–38.
- Hübner, J. 1796–1836. Sammlung europäischer Schmetterlinge 8 – J. Hübner, Augsburg. 78 pp. (1796), 71 pls (1796–1836).
- Hübner, J. 1816–1825. Verzeichniss bekannter Schmetterlinge. – J. Hübner, Augsburg. 431 pp
- Huemer, P. 1998. A new endemic species of *Acompsia* from the Alps (Lepidoptera, Gelechiidae). – Linzer biol. Beitr. 30: 515–521.
- Huertas-Dionisio, M. 2002. Estados inmaturos de Lepidoptera (XVI). *Telephila schmidtellus* (Heyden, 1848) en Huelva, Espana (Lepidoptera: Gelechiidae, Dichomerinae). – SHILAP Revta. lepid. 30: 9–14.
- Janse, A. J. T. 1958–1963. Gelechiadae. – The Moths of South Africa 6. – Transvaal Museum, Pretoria. 284 pp., 138 pls.
- Jürivete, U., Kaitila, J., Kesküla, T., Nupponen, K., Viidalep, J. & Öunap, E. 2000. Eesti liblikad katalog. Estonian Lepidoptera catalogue. – Eesti Lepidopteroloogide Selts, Tallinn. 151 pp.
- Kaitila, J.-P. 1996. Suomen jäytäjäkoiden (Gelechiidae) elintavat. – Baptria 21: 81–105.
- Karsholt, O. & Riedl, T. 1996. Gelechiidae (except Gnorimoschemini). In: Karsholt O. & Razowski J. (eds): The Lepidoptera of Europe. A distributional checklist. – Apollo Books, Stenstrup. Pp. 103–113, 118–122, 310–312.
- Kerpola, S., Kontuniemi, I. & Löfgren, L. 1985. Mikrotiedonannot 1984. – Baptria 10: 75–95.
- Kozlov, M. V. & Jalava, J. 1994. Lepidoptera of the Kola Peninsula, northwestern Russia. – Ent.fenn. 5: 65–85.
- Lhomme, L. 1930. Quelques chasses a Str-Etienne-Vallée-Francaise (Lozère) [with descriptions of new taxa by P. Chrétien]. – Amat. Papillons 5: 84–93, 103–107, 119–126, 135–141.
- Lhomme, L. 1948–1949. Catalogue des Lépidoptères de France et de Belgique 2 (part 2, fasc. 5). – Le Carriol, Douelle (Lot). Pp. 649–808.
- Lucas, D. 1955. Nouveaux Lépidoptères Nord-Africains. – Bull.Soc.ent.Fr. 35: 254–257.
- Meyrick, E. 1925. Lepidoptera Heterocera. Fam. Gelechiadae. – Genera Insect. 184. – Louis Desmet–Verteneuil, Bruxelles. 290 pp., 5 pls.
- Meyrick, E. 1927. Exotic Microlepidoptera 2 (20). – E. Meyrick, Marlborough. Pp. 609–640.
- Millière, P. 1864–1868. Iconographie et description de chenilles et Lépidoptères inédits. 2. – F. Savy, Paris. 506 pp., 50 pls.
- Millière, P. 1867. Iconographie et description de chenilles et Lépidoptères inédits. – Anns.Soc.linn.Lyon (N.S.) 14: 355–388, pls 77–80.
- Nel, J. 2001. Espèces nouvelles ou rarement signalées de microlépidoptères des Alpes méridionales francaises (Lepidoptera, Alucitidae, Gelechiidae, Elachistidae, Ochsenheimeriidae). – Bull.Soc.ent Fr. 106: 101–104.
- Petry, A. 1904. Zwei neue Gelechiiden aus den Central-Pyrenäen. – Dt.ent.Z.Iris 17: 1–6.
- Piskunov, V. I., 1990. Gelechiidae. In Medvedev, G.S. (ed.): Keys to the insects of the European part of the USSR. IV. Lepidoptera 2. – E. J. Brill, Leiden, New York, København, Köln. [English translation.]. Pp. 889–1024.
- Pitkin, L. M. 1984. Gelechiid moths of the genus *Mirificarma*. – Bull.Br.Mus.nat.Hist. (Ent.) 48: 1–70.
- Ponomarenko, M. G. 1992. Functional and morphological analysis of male genitalia of gelechiid moths of Dichomeridinae sensu novo (Lepidoptera, Gelechiidae). – Ent.Obozr. 71: 160–178.
- Ponomarenko, M. G. 1997a. Phylogeny and taxonomy of the subfamily Dichomeridinae (Lepidoptera: Gelechiidae). – Zoosyst. ross. 6: 305–314.
- Ponomarenko, M. G. 1997b. Catalogue of the subfamily Dichomeridinae (Lepidoptera, Gelechiidae) of the Asia. – Far East. Entomol. 50: 1–67.
- Rebel, H. 1899. Zweiter Beitrag zur Lepidopteren-Fauna Südtirols. – Verh.zool.-bot.Ges.Wien 49: 158–185.
- Rebel, H. 1917. Über eine Mikrolepidopterenausbeute aus dem östlichen Tannuola-Gebiet. – Dt.ent.Z.Iris 30: 186–195.

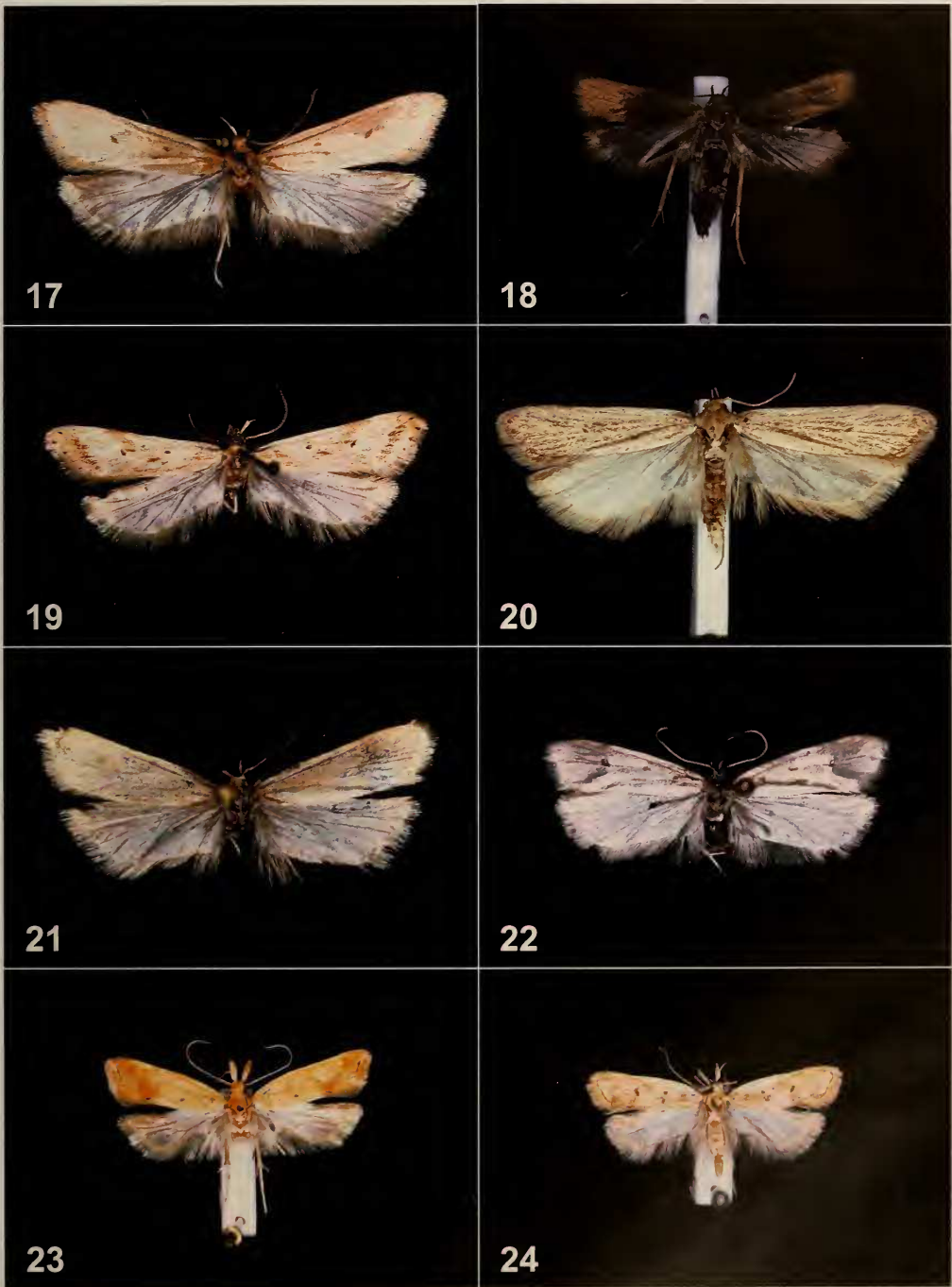
- Robinson, G. S. & Nielsen, E. S. 1983. The Microlepidoptera described by Linnaeus and Clerck. – *Syst.Ent.* **8**: 191–242.
- Sattler, K. 1973. A catalogue of the family-group and genus-group names of the Gelechiidae, Holcopogonidae, Lecithoceridae and Symmocidae (Lepidoptera). – *Bull.Br.Mus.nat.Hist. (Ent.)* **28**: 153–282.
- Sattler, K. & Tremewan, W. G. 1973. The entomological publications of Pierre Millière (1811–1887). – *Bull.Br.Mus.nat.Hist. (Hist.)* **4**: 223–280, pls 1–3.
- Scopoli, J. A. 1763. *Entomologia Carniolica exhibitus insecta Carnioliae indigine et distributa in ordines, genera, species varietates methodo Linnaeana.* – J. T. Trattner, Vienna. 421 pp., 37 pls.
- Sorhagen, L. 1901–1902. *Grabowiana. Ein Nachtrag zu den "Kleinschmetterlingen der Mark Brandenburg"*. – *Allg.Z.Ent.* **6**: 241–245, 276–279, 311–314, 327–332, 343–347; **7**: 19–25, 51–57, 77–81, 97–100.
- Stainton, H. T. 1849. *Catalogue of the British Tineidae & Pterophoridae.* – John van Voorst, London. 32 pp.
- Stainton, H. T. 1851. *A supplementary catalogue of the British Tineidae & Pterophoridae.* – John van Voorst, London. 28 pp.
- Svensson, I. 1966. New and confused species of Microlepidoptera. – *Opusc.ent.* **31**: 183–202.
- Svensson, I. 1993. *Fjärilskalender. Lepidoptera-calendar.* – I. Svensson, Österslöv, Kristianstad. 124 pp.
- Treitschke, F. 1833. *Die Schmetterlinge von Europa (Fortsetzung des Ochsenheimer'schen Werkes) 9(2).* – G. Fleischer, Leipzig. 294 pp.
- Wehrli, E. 1925. Ueber die von mir im Juni – Juli 1924 in Corsica erbeuteten Mikrolepidopteren mit Beschreibung zweier neuer Arten. – *Dt.ent.Z.Iris* **39**: 133–137.
- Werneburg, A. 1864. *Beiträge zur Schmetterlingskunde.* – H. Neumann, Erfurt. 1: vii + 595 pp., 2: iv + 350 pp.
- Zeller, P. C. 1839. *Versuch einer naturgemäßen Eintheilung der Schaben.* – Isis, Leipzig 1839: 167–220.



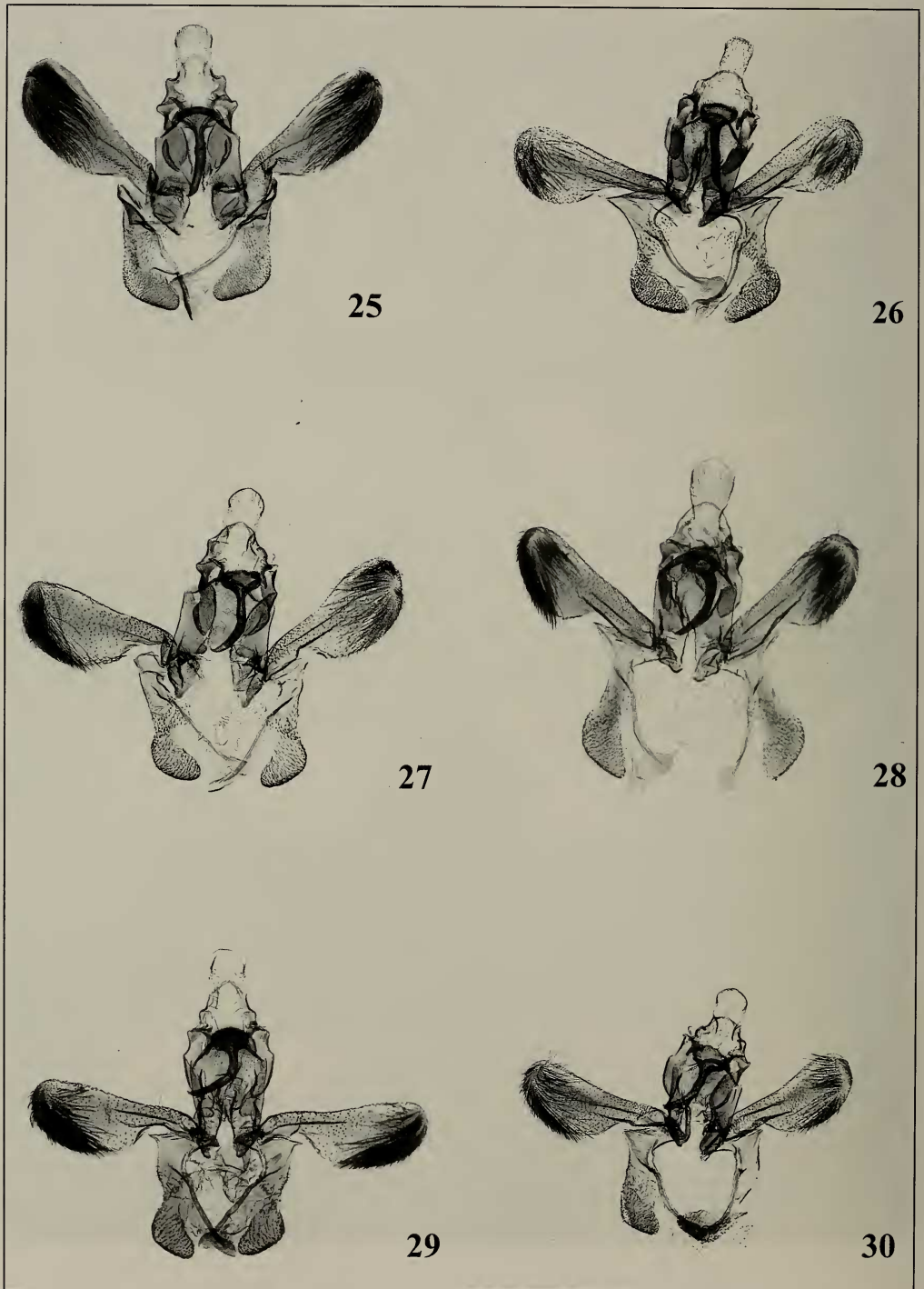
Figs. 1–8. *Acompsia* spp., adults: 1 – *A. cinerella*, ♂, Austria, wingspan 19 mm; 2 – ditto, ♀, Germany, wingspan 16 mm; 3 – *A. pyrenaella* sp. n., ♂, France, wingspan 20 mm; 4 – ditto, ♀, France, wingspan 15 mm; 5 – *A. antirrhinella*, ♂, France, wingspan 20 mm; 6 – ditto, ♀, Spain, wingspan 19 mm; 7 – *A. maculosella*, ♂, Austria, wingspan 19 mm; 8 – *A. muellerrutzi*, ♂, France (Corse), wingspan 15 mm.



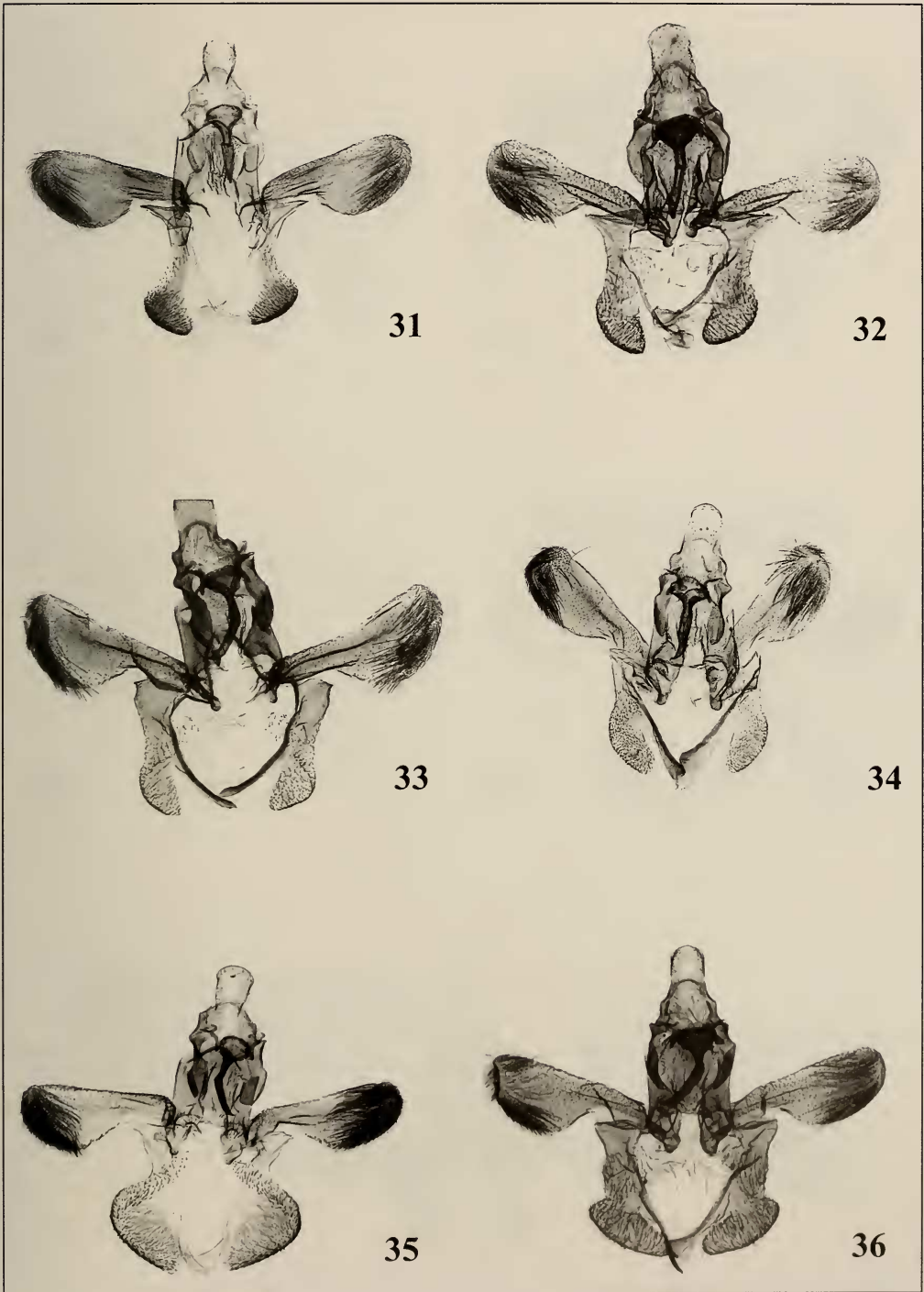
Figs. 9–16. *Acompsia* spp., adults: **9** – *A. dimorpha*, ♂, France, wingspan 17 mm; **10** – ditto, ♀, France, wingspan 11 mm; **11** – *A. subpunctella*, ♂, Sweden, wingspan 15 mm; **12** – *A. delmastroella*, ♂, Italy, wingspan 16 mm; **13** – *A. minorella*, ♂, Italy; **14** – *A. tripunctella*, ♂, Austria, wingspan 23 mm; **15** – ditto, ♂, Austria, wingspan 18 mm; **16** – ditto, ♀, Austria, wingspan 16 mm.



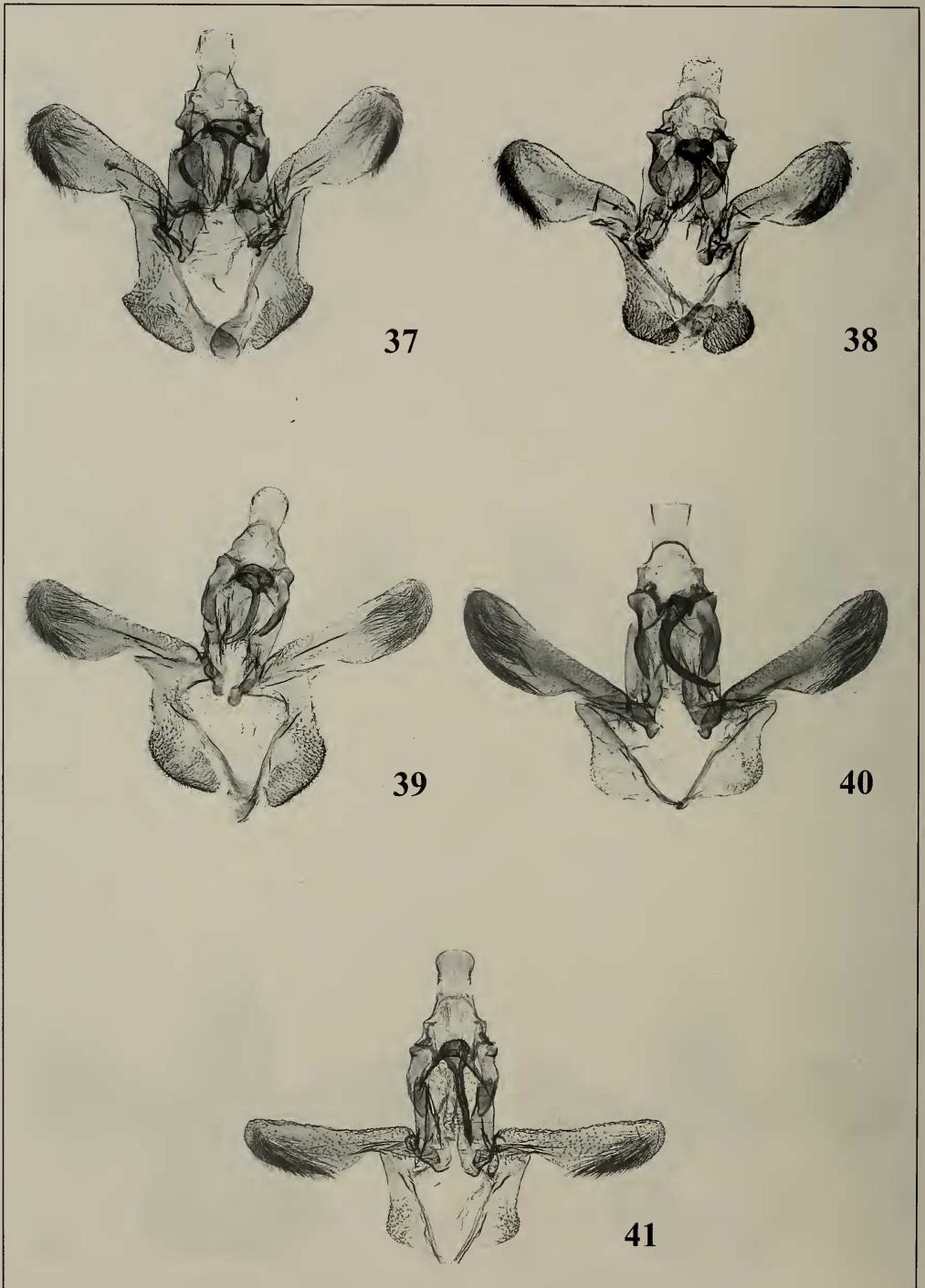
Figs. 17–24. *Acompsia* spp., adults: **17** – *A. ponomarenkoae* sp. n., ♂, Greece, wingspan 23 mm; **18** – ditto, ♀, Greece, wingspan 16 mm; **19** – *A. caucasella* sp. n., ♂, Russia (Caucasus), wingspan 22 mm; **20** – *A. schepleri* sp. n., ♂, Turkey, wingspan 24 mm; **21** – *A. fibigeri* sp. n., ♂, Turkey, wingspan 22 mm; **22** – *A. bidzilyai* sp. n., ♂, Russia (Transbaikalia), wingspan 19 mm; **23** – *A. schmidtellus*, ♂, Germany, wingspan 16 mm; **24** – *A. syriella* sp. n., ♂, Syria, wingspan 14 mm.



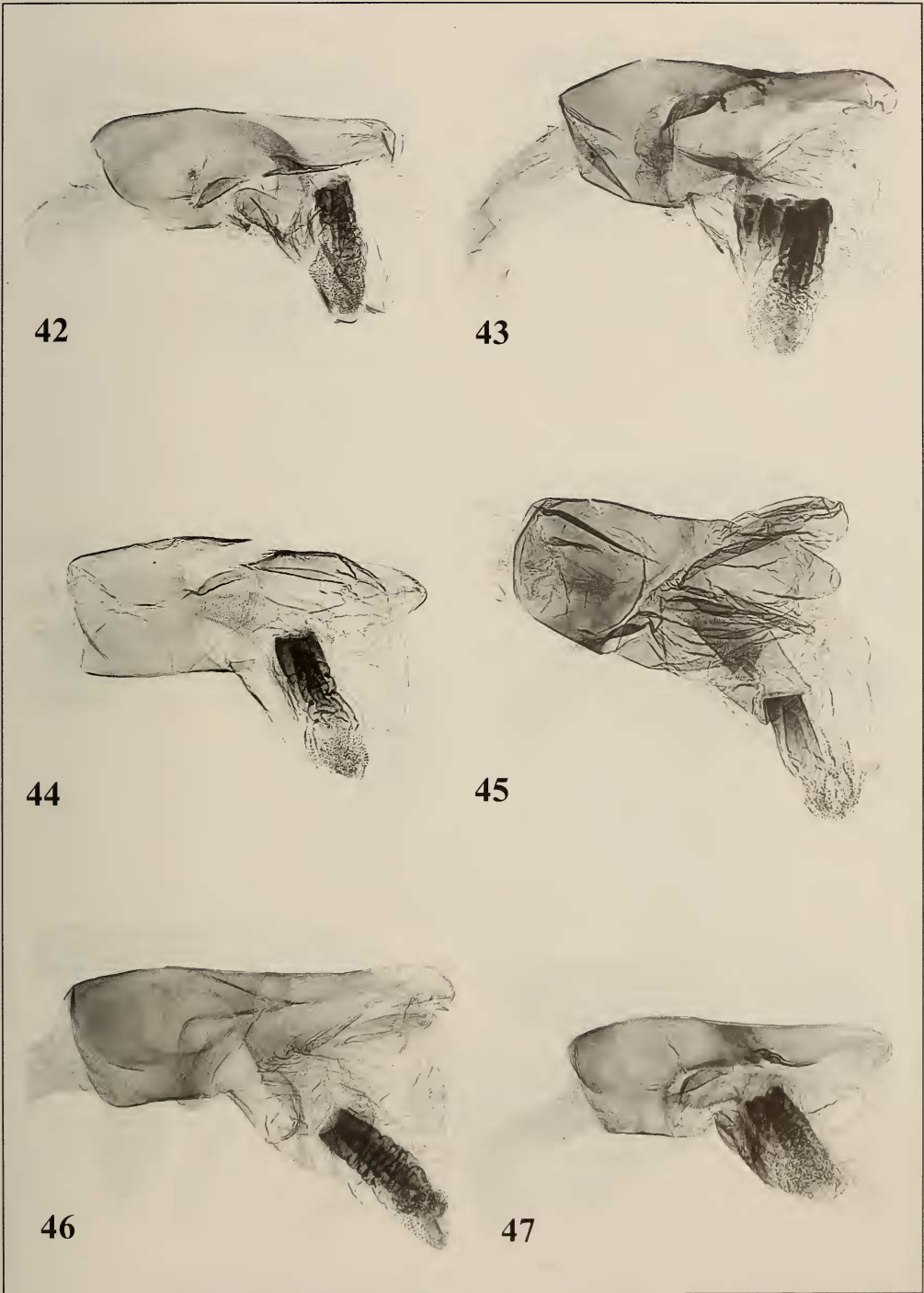
Figs. 25–30. *Acompsia* spp., male genitalia (without aedeagus): 25 – *A. cinerella*, Germany, slide GEL 881; 26 – *A. pyrenaella* sp. n., Spain, slide 01/1036; 27 – *A. antirrhinella*, France, slide GEL 866; 28 – *A. maculosella*, Austria, slide GEL 488; 29 – *A. dimorpha*, France, slide BMNH 26.575; 30 – *A. subpunctella*, Sweden, slide GEL 870.



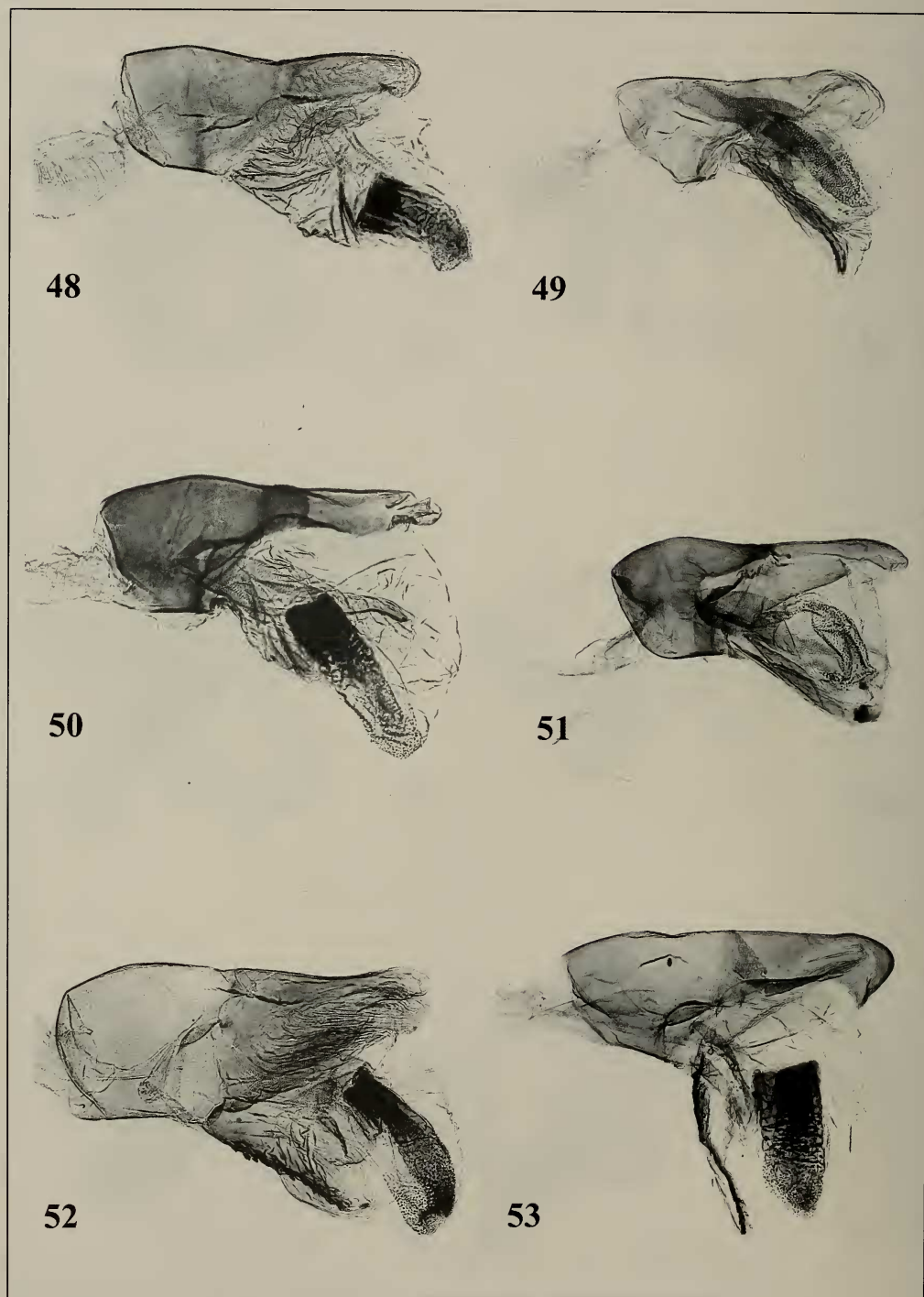
Figs. 31–36. *Acompsia* spp., male genitalia (without aedeagus): 31 – *A. delmastroella*, Italy, slide GEL 864; 32 – *A. muellerrutzi*, France (Corse), slide 01/1070; 33 – *A. caucasella* sp. n., Russia (Caucasus), slide 02/1149; 34 – *A. minorella*, Slovenia, slide GEL 887; 35 – *A. tripunctella*, Croatia, GEL 880; 36 – *A. ponomarenkoae* sp. n., Greece, slide 01/1068.



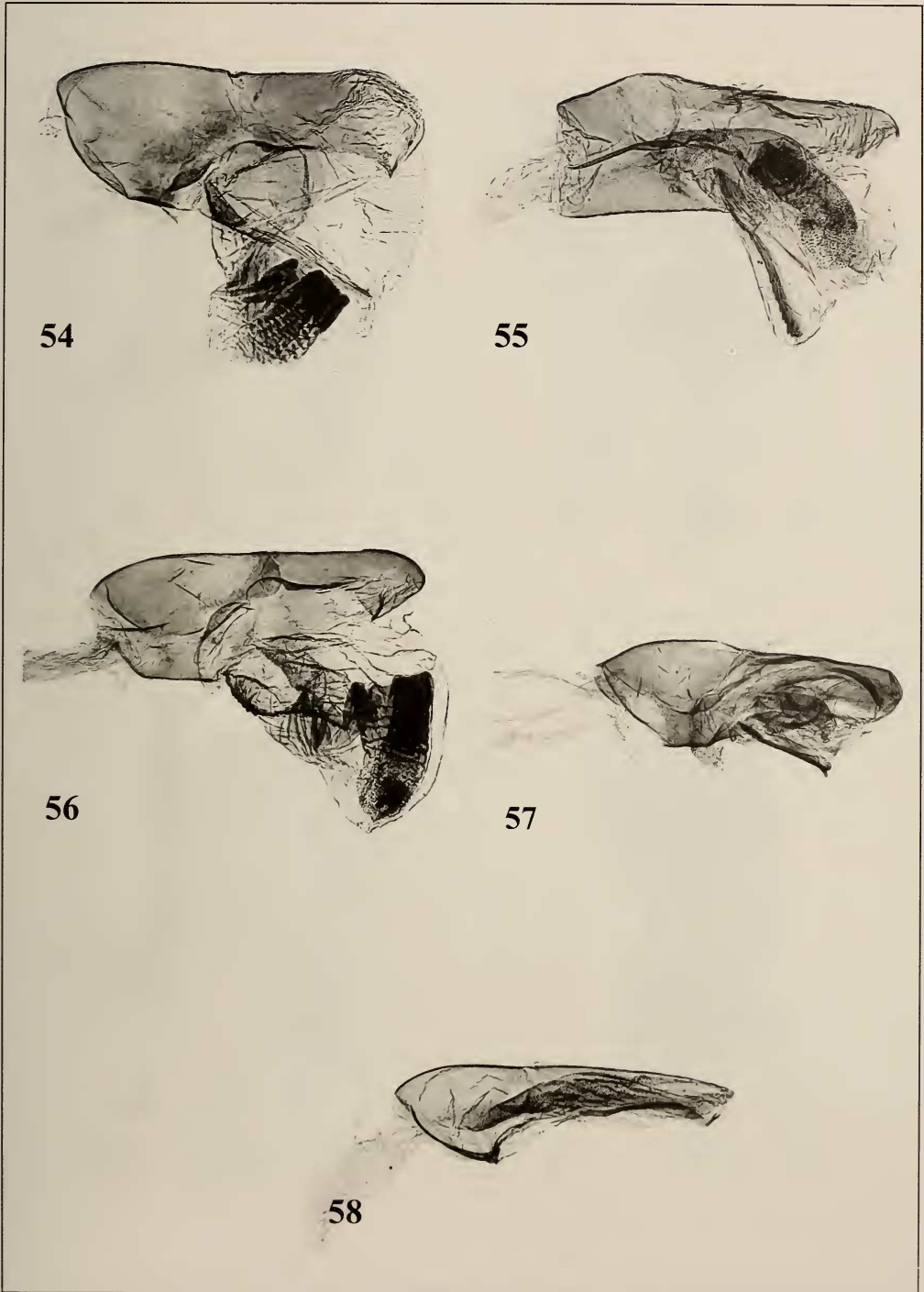
Figs. 37–41. *Acompsia* spp., male genitalia (without aedeagus): 37 – *A. schepleri* sp. n., Turkey, slide 01/1067; 38 – *A. fibigeri* sp. n., Turkey, slide 02/1112; 39 – *A. bidzilyai* sp. n., Russia (Transbaikalia), slide 02/1144; 40 – *A. schmidtellus*, Germany, slide GEL 1058; 41 – *A. syriella* sp. n., Syria, NM 16.642.



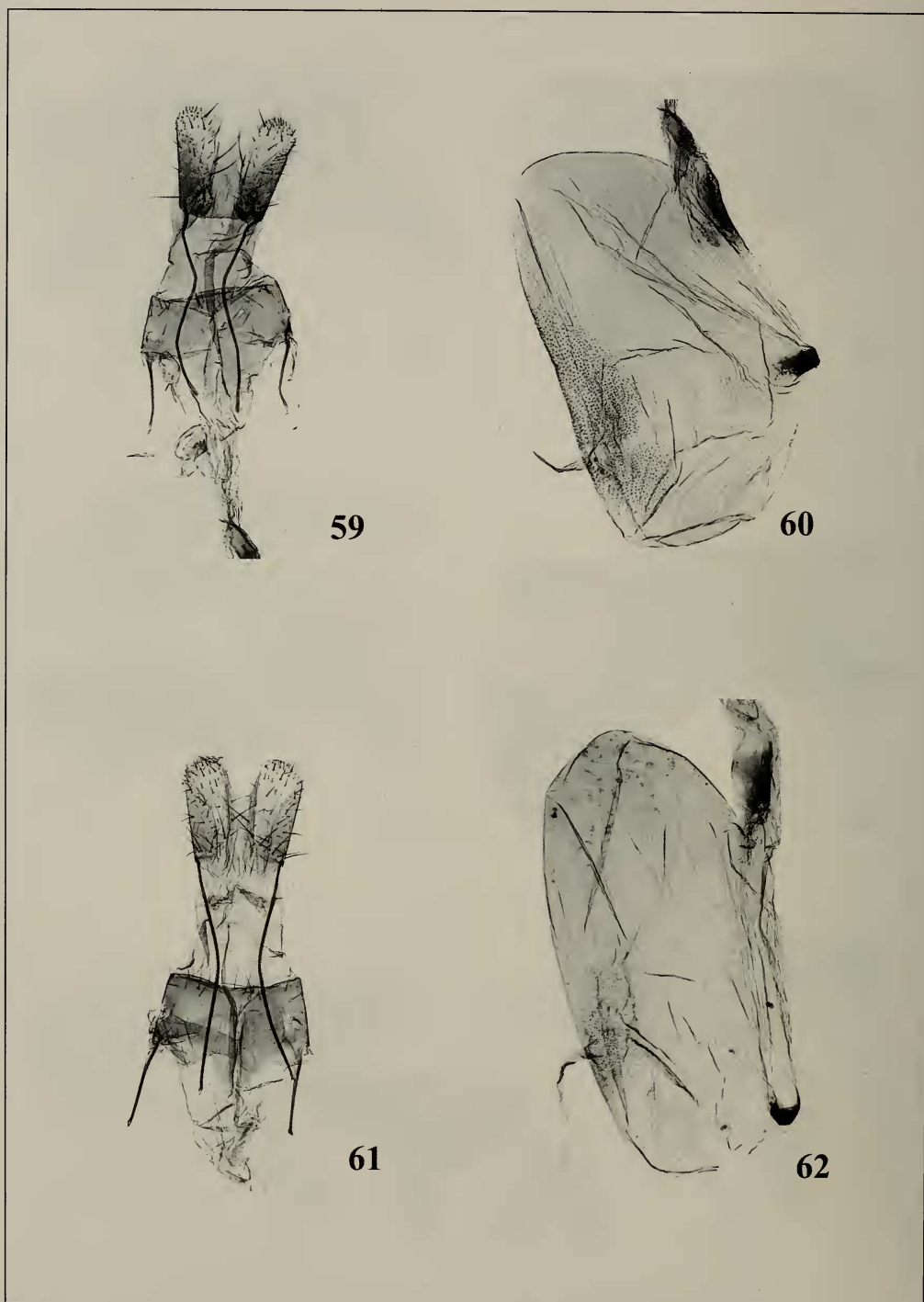
Figs. 42–47. *Acompsia* spp., male genitalia (acedeagus): 42 – *A. cinerella*, Germany, slide GEL 881; 43 – *A. pyrenaella* sp. n., Spain, slide 01/1036; 44 – *A. antirrhinella*, France, slide GEL 866; 45 – *A. maculosella*, Austria, slide GEL 488; 46 – *A. dimorpha*, France, slide BMNH 26.575; 47 – *A. subpunctella*, Sweden, slide GEL 870.



Figs. 48–53. *Acompsia* spp., male genitalia (aedeagus): 48 – *A. delmastroella*, Italy, slide GEL 864; 49 – *A. muellerrutzi*, France (Corse), slide 01/1070; 50 – *A. caucasella* sp. n., Russia (Caucasus), slide 02/1149; 51 – *A. minorella*, Slovenia, slide GEL 887; 52 – *A. tripunctella*, Croatia, GEL 880; 53 – *A. pomomarenkoae* sp. n., Greece, slide 01/1068.



Figs. 54-58. *Acompsia* spp., male genitalia (aedeagus): 54 - *A. schepleri* sp. n., Turkey, slide 01/1067; 55 - *A. fibigeri* sp. n., Turkey, slide 02/1112; 56 - *A. bidzilyai* sp. n., Russia (Transbaikalia), slide 02/1144; 57 - *A. schmidtellus*, Germany, slide GEL 1058; 58 - *A. syriella* sp. n., Syria, slide NM 16.642.



Figs. 59–62. *Acompsia* spp., female genitalia, 59, 61 (segment VIII), 60, 62 (corpus bursae): 59 – *A. cinerella*, Germany, slide GEL 1048; 60 – ditto; 61 – *A. pyrenaella* sp. n., slide BMNH 26.578; 62 – ditto.



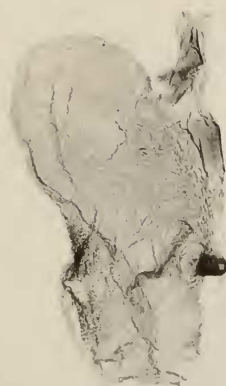
63



64

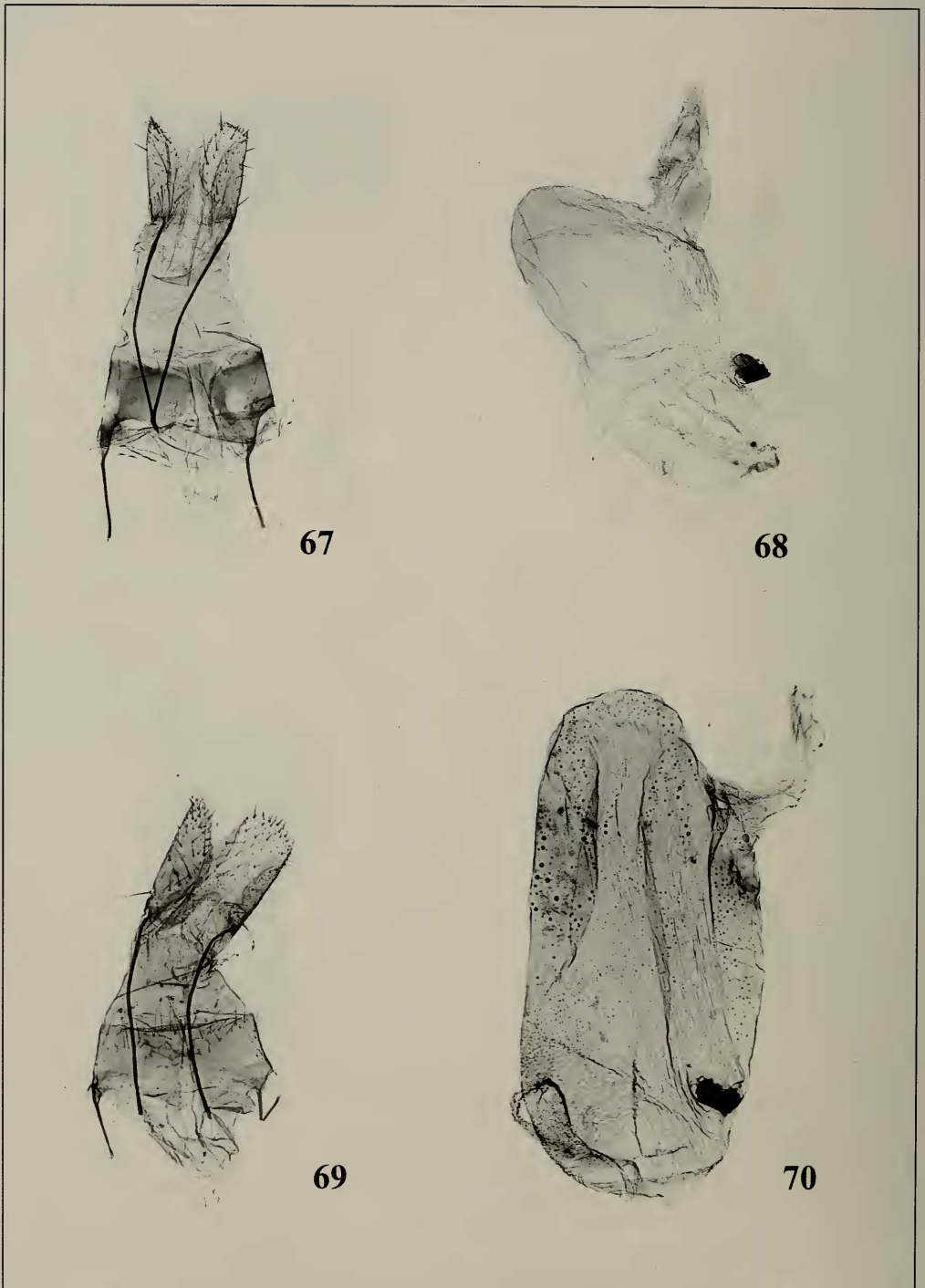


65

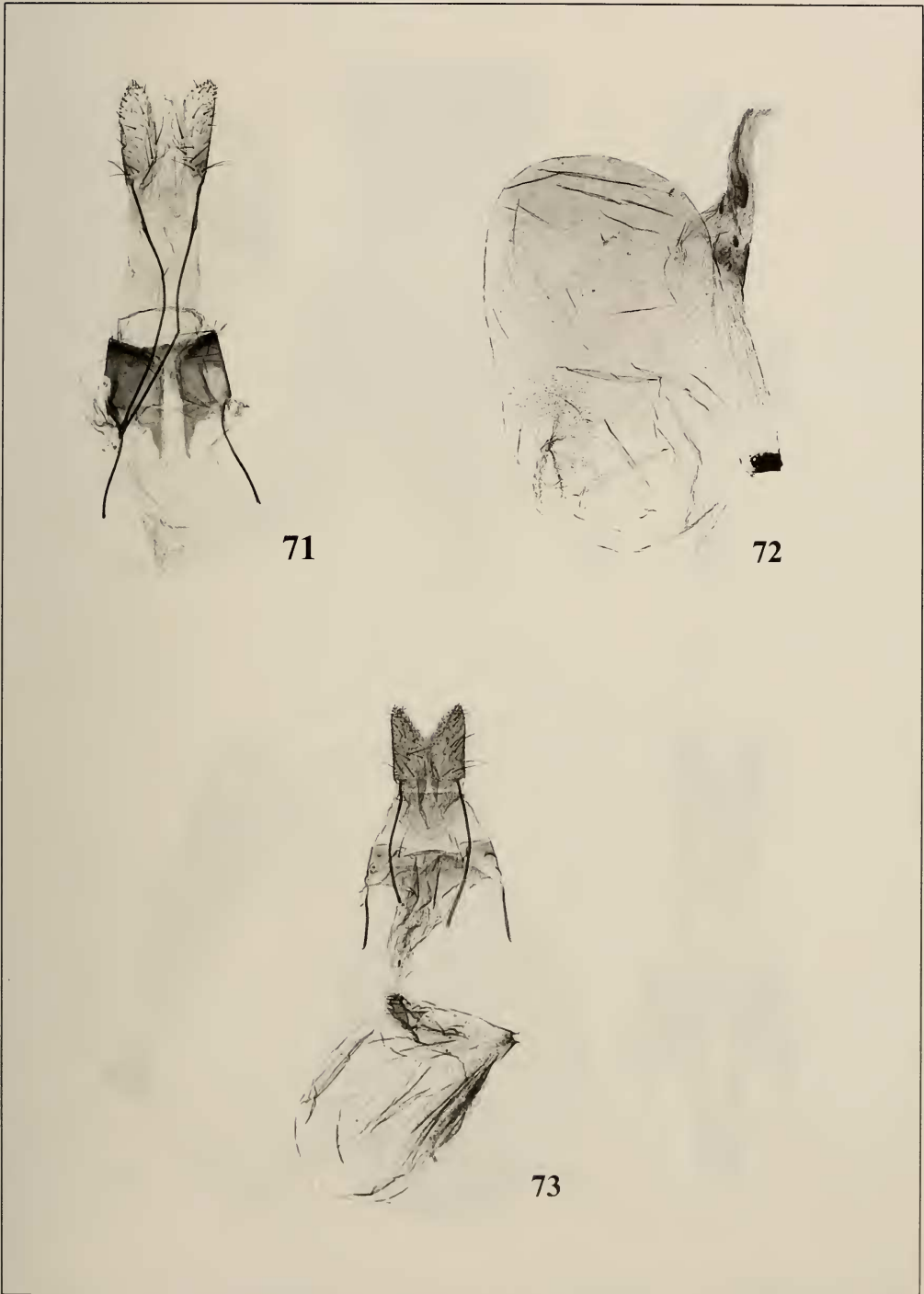


66

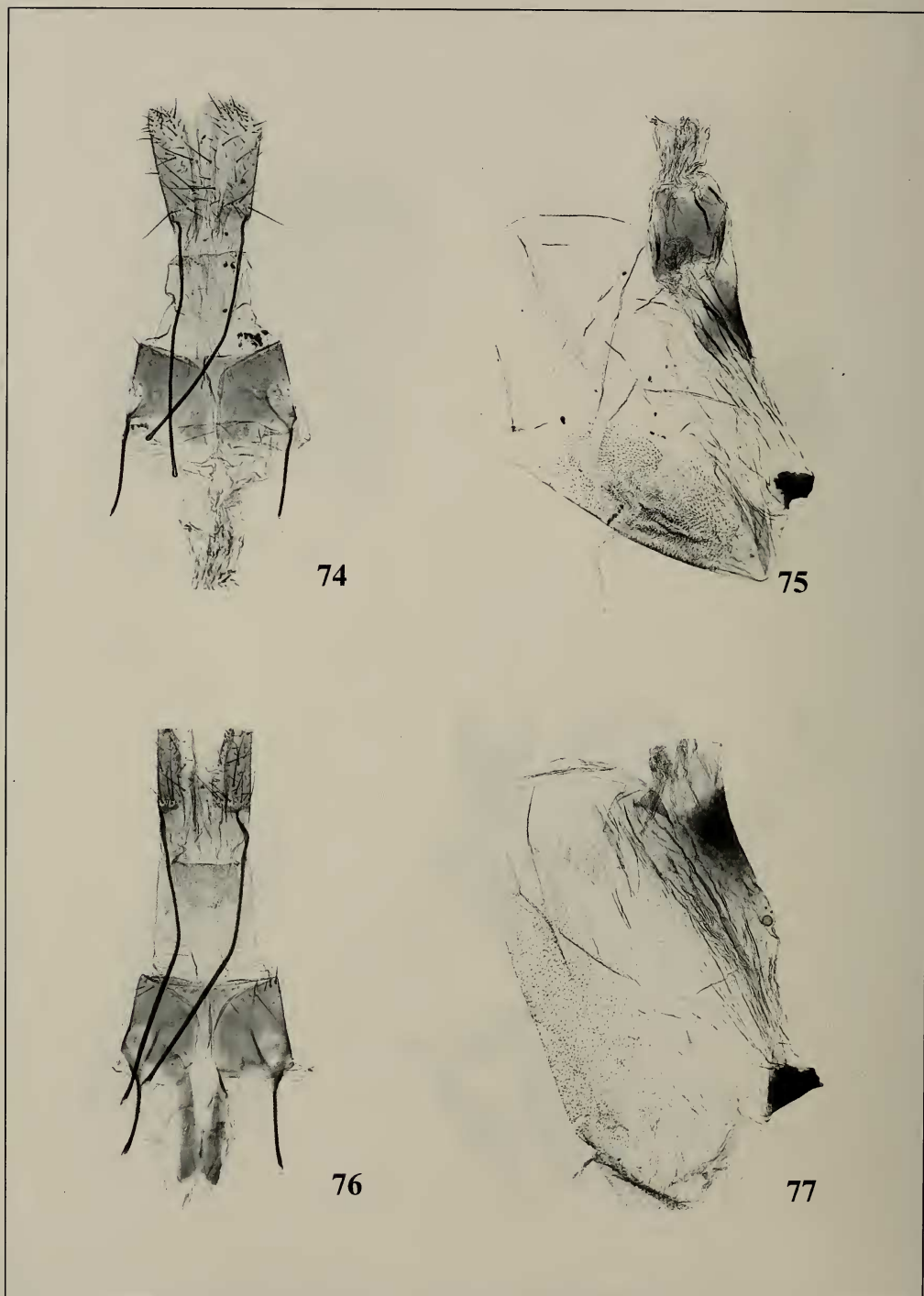
Figs. 63-66. *Acompsia* spp., female genitalia, 63, 65 (segment VIII), 64, 66 (corpus bursae): 63 - *A. antirrhinella*, slide NM 16.638; 64 - ditto; 65 - *A. maculosella*, Austria, slide GEL 1046; 66 - ditto.



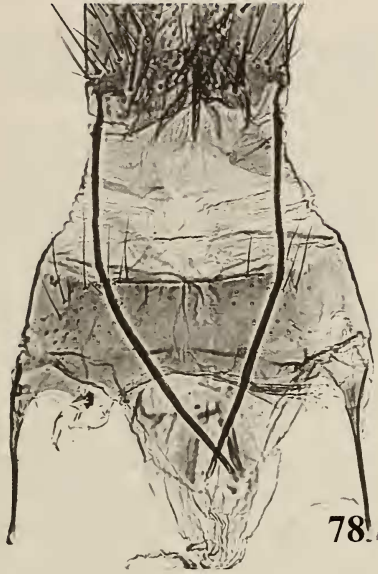
Figs. 67–70. *Acompsia* spp., female genitalia, 67, 69 (segment VIII), 68, 70 (corpus bursae): 67 – *A. dimorpha*, slide BMNH 26.576; 68 – ditto; 69 – *A. subpunctella*, Sweden, slide 02/1113; 70 – ditto.



Figs. 71–73. *Acompsia* spp., female genitalia, 71 (segment VIII), 72 (corpus bursae): 71 – *A. delmastroella*, Italy, slide GEL 1044; 72 – ditto; 73 – *A. minorella*, Slovenia, slide GEL 1045.



Figs. 74–77. *Acompsia* spp., female genitalia, 74, 76 (segment VIII), 75, 77 (corpus bursae): 74 – *A. tripunctella*, Austria, slide GEL 1047; 75 – ditto; 76 – *A. ponomarenkoae* sp. n., Greece, slide 01/1079; 77 – ditto.



Figs. 78-79. *Acompsia schmidtellus*, female genitalia, 78, (segment VIII), 79 (corpus bursae), Germany, slide GEL 1059.