

A check list of Sarcophagidae (Diptera) from Algeria

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Abstract

A total check list of 74 sarcophagid species known from recent Algerian territory is presented. 10 species among them have been collected in Hardaia city, including 4 species first recorded from Algeria (*Liosarcophaga ismailiana*, *Macronychia lemariei*, *Phrosinella nasuta* and *Phytosarcophaga destructor*).

Keywords: *Sarcophagids*, *checklist*, *Algeria*.

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Introduction

Sarcophagid fauna of Algeria is poorly studied as there are no comprehensive published records from this region. The only documented records are by Séguy (1941) who compiled French sarcophagid list of 51 species, followed by Verves (1986) and Pape (1996) who listed 59 and 65 species respectively. More recently there are few contributions by Lehrer (2003) and Whitmore (2009; 2011) who reported new species and provided notes on the biology of Sarcophagidae. To compile the existing data and to provide a comprehensive documentation of Algerian sarcophagids here I present a checklist of 74 species.

Materials and Methods

Hardaia (or Ghardaïa) city is located within the Sahara Desert in northern-central Algeria. Ghardaïa has a hot desert climate with extremely hot summers and mild winters. The region is marked by large temperature differences between day and night, and summer and winter ranging from lows of 5°C to highs of 46°C. The prevailing winds of summer are extremely hot, extremely dry and strong and those of winter are warm and dry. Sandstorms generally occur from March to May (compilation of Internet resources). 86 specimens of sarcophagids have been collected from Ghardaia garden, PT, 520m, 32°30'24"N, 3°37'43"E, 24-31.x.2015 by Mr. Baba Aissa by standard air entomological net

and were sent to me by Prof. Miroslav Barták (Czech University of Life Sciences, Praha) for study. 10 species were identified, including 4 first records from Algerian fauna (*Liosarcophaga ismailiana*, *Macronychia lemariei*, *Phrosinella nasuta* and *Phytosarcophaga destructor*). The list of 74 Algerian species of sarcophagids is presented below. Only the first published faunistic data from Algeria for each species is given. Author follows classification of Verves (1986) and Verves & Khrokalo (2006) in order of species in check list.

Results

Check list of Algerian Sarcophagidae

1. *Macronychia* (s. str.) *lemariei* Jacentkovský, 1941 [first record]. **Material examined:** Ghardaia garden, PT, 520 m, 32°30'24"N, 3°37'43"E, 24-28.x.[20]15 (Baba Aissa coll.), 11 ♂, 2 ♀.
2. *Senotainia* (*Arrenopus*) *albifrons* (Rondani, 1859). [Séguy, 1941¹]. **Material examined:** Ghardaia garden, PT, 520 m, 32°30'24"N, 3°37'43"E, 24-31.x.[20]15 (Baba Aissa coll.), 1 ♀.
3. *Senotainia* (s. str.) *tricuspis* (Meigen, 1838). [Séguy, 1941].

¹ The data on authors and years of faunistic publications are given in square brackets.

A check list of Sarcophagidae (Diptera) from Algeria

4. *Protomiltogramma fasciata* (Meigen, 1824). [Verves, 1986].
5. *Pterella convergens* (Pandellé, 1895). [Séguy, 1941].
6. *Cylindrothecum ibericum* (Villeneuve, 1912) [Villeneuve, 1912a].
7. *Miltogramma algira* Macquart, 1843 [Macquart, 1843].
8. *Miltogramma aurifrons* Dufour, 1850 [Rohdendorf, 1930].
9. *Miltogramma germari* Meigen, 1824 [Séguy, 1941].
10. *Miltogramma oestracea* (Fallén, 1820) [Séguy, 1941].
11. *Miltogramma punctata* Meigen, 1824 [Verves, 1986].
12. *Craticulina tabaniformis* Fabricius, 1805 [Verves, 1986].
13. *Xeromyia algiralis* (Séguy, 1941) [Séguy, 1941].
14. *Xeromyia merei* (Séguy, 1941) [Séguy, 1941].
15. *Metopodia pilicornis* (Pandellé, 1895) [Séguy, 1941].
16. *Dolichotachina marginella* (Wiedemann, 1830) [Séguy, 1941].
17. *Sphecapatoctlea minor* Villeneuve, 1912 [Villeneuve, 1912b].
18. *Amobia oculata* (Zetterstedt, 1844) [Séguy, 1941].
19. *Amobia signata* (Meigen, 1824) [Verves, 1986].
20. *Phrosinella* (s. str.) *nasuta* (Meigen, 1824) [first record].
Material examined: Ghardaia garden, PT, 520 m, 32°30'24"N, 3°37'43"E, 24-31.x.[20]15 (Baba Aissa coll.), 3 ♂, 2 ♀.
21. *Hilarella stictica* (Meigen, 1924) [Séguy, 1941].
22. *Taxigramma heteroneura* (Meigen, 1830) [Séguy, 1941].
23. *Sarcotachina aegyptiaca* Villeneuve, 1910 [Séguy, 1941].
24. *Nyctia halterata* (Panzer, 1798) [Séguy, 1941].
25. *Nyctia lugubris* (Macquart, 1843) [Macquart, 1843].
26. *Blaesoxiphella brevicornis* Villeneuve, 1912 [Pape, 1996].
27. *Sarcophila meridionalis* Verves, 1982 [Verves, 1982].
28. *Wohlfahrtia bella* (Macquart, 1839) [Delassus, 1931].
29. *Wohlfahrtia brunnipalpis* (Macquart, 1851) [Austen, 1914].
30. *Wohlfahrtia erythrocerca* Villeneuve, 1910 [Salem, 1938].
31. *Wohlfahrtia indigens* Villeneuve, 1928 [Villeneuve, 1928].
32. *Wohlfahrtia magnifica* (Schiner, 1862) [Cros, 1910].
33. *Wohlfahrtia trina* (Wiedemann, 1830) [Zumt, 1972].
34. *Wohlfahrtia triquetra* Séguy, 1933 [Verves, 1985].
35. *Wohlfahrtia villeneuvei* Salem, 1938 [Salem, 1938].
36. *Wohlfahrtiodes aemulus* Séguy, 1940 [Séguy, 1940].
37. *Agriella algeriensis* (Townsend, 1918) [Townsend, 1918].
38. *Agriella rufescens* (Villeneuve, 1928) [Villeneuve, 1928].
39. *Agriella pandellei* Villeneuve, 1911 [Verves, 1985].
40. *Blaesoxipha cochlearis* (Pandellé, 1896) [Séguy, 1941].
41. *Blaesoxipha colorata* Ververs, 1985 [Verves, 1985].
42. *Blaesoxipha dupuisi* Léonide et Léonide, 1973 [Lehrer, 1995].
43. *Blaesoxipha litoralis* (Villeneuve, 1911) [Séguy, 1941].
44. *Blaesoxipha redempta* (Pandellé, 1896) [Künckel, 1893].
45. *Blaesoxipha rufipes* (Macquart, 1839) [Verves, 1985].
46. *Blaesoxipha subcoclearis* Séguy, 1932 [Séguy, 1932].
47. *Blaesoxipha unguolata* (Pandellé, 1896) [Baer, 1921].
48. *Ravinia pernix* (Harris, 1780) [Séguy, 1941].
49. *Helicophagella maculata* (Meigen, 1835) [Séguy, 1941].
50. *Helicophagella melanura* (Meigen, 1826) [Verves, 1986].
51. *Phytosarcophaga* (s. str.) *destructor* (Malloch, 1929) [first record].
Material examined: Ghardaia garden, PT, 520 m, 32°30'24"N, 3°37'43"E, 24-31.x.[20]15 (Baba Aissa coll.), 13 ♂.
52. *Heteronychia (Asceloctis) ferox* (Villeneuve, 1908). [Whitmore, 2011].
Material examined: Ghardaia garden, PT, 520 m, 32°30'24"N, 3°37'43"E,

- 24-28.x.[20]15 (Baba Aissa coll.), 2 ♂.
53. *Heteronychia* (*Ctenodasyptigia*) *minima* (Rondani, 1862) [Villeneuve, 1911].
54. *Heteronychia* (*Ctenodasyptigia*) *penicillata* (Villeneuve, 1907) [Rohdendorf, 1937].
55. *Heteronychia* (*Ctenodasyptigia*) *thirionae* (Lehrer, 1976) [Whitmore, 2009].
56. *Heteronychia* (*Ctenodasyptigia*) *villeneuveana* (Enderlein, 1928) [Enderlein, 1928].
57. *Heteronychia* (s. str.) *consanguinea* (Rondani, 1860) [Séguy, 1941].
58. *Heteronychia* (s. str.) *pandellei* (Rohdendorf, 1937) [Rohdendorf, 1937].
59. *Karovia hirticrus* (Pandellé, 1896) [Böttcher, 1912].
60. *Notoecus longestylatus* (Strobl, 1906) [Rohdendorf, 1937].
61. *Krameromyia anaces* (Walker, 1849) [Verves, 1986].
62. *Myorhina* (s. str.) *nigriventris* (Meigen, 1826) [Séguy, 1941].
63. *Thyrsocnema incisilobata* (Pandellé, 1896) [Verves, 1986].
64. *Bercaea africa* (Wiedemann, 1824): [James, 1947].
Material examined: Ghardaia garden, PT, 520 m, 32°30'24"N, 3°37'43"E, 24-31.x.[20]15 (Baba Aissa coll.), 25 ♂.
65. *Liopygia* (*Engelisca*) *surcoufi* (Villeneuve, 1913) [Villeneuve, 1913].
66. *Liopygia* (*Jantia*) *crassipalpis* (Macquart, 1839) [Séguy, 1941].
67. *Liopygia* (*Thomsonia*) *argyrostoma* (Robineau-Desvoidy, 1830) [Rohdendorf, 1937].
Material examined: Ghardaia garden, PT, 520 m, 32°30'24"N, 3°37'43"E, 24-28.x.[20]15 (Baba Aissa coll.), 1 ♂.
68. *Liosarcophaga* (*Curranea*) *tibialis* (Macquart, 1851) [Séguy, 1941].
Material examined: Ghardaia garden, PT, 520 m, 32°30'24"N, 3°37'43"E, 24-31.x.[20]15 (Baba Aissa coll.), 12 ♂.
69. *Liosarcophaga* (s. str.) *ismailiana* Lehrer, 1998 [first record]. **Material examined:** Ghardaia garden, PT, 520 m, 32°30'24"N, 3°37'43"E, 24-28.x.[20]15 (Baba Aissa coll.), 1 ♂.
70. *Liosarcophaga* (s. str.) *jacobsoni* (Rohdendorf, 1937) [Lehrer, 2003].
Material examined: Ghardaia garden, PT, 520 m, 32°30'24"N, 3°37'43"E, 5. & 24-31.x.[20]15 (Baba Aissa coll.), 13 ♂.
71. *Parasarcophaga* (s. str.) *albiceps* (Meigen, 1826) [Séguy, 1941].
72. *Parasarcophaga* (s. str.) *hirtipes* (Wiedemann, 1830) [Séguy, 1940].
73. *Sarcophaga lehmanni* Müller, 1922. [Lehrer, 2003].
Material examined: Ghardaia garden, PT, 520 m, 32°30'24"N, 3°37'43"E, 24-29-31.x.[20]15 (Baba Aissa coll.), 1 ♂.
74. *Sarcophaga variegata* (Scopoli, 1763) [Séguy, 1941].

Discussion

As detailed by Pape (1996) and Verves (1986) the sarcophagid fauna in Palaearctic north-west Africa ("Magrib") may contain not less than 250-300 species; in view of this data, it seems that the documentation of sarcophagid flies from Algeria is far from complete. It has been observed that studies on Algerian sarcophagids were mainly focused on economically important groups consisting of shizophagous larvae (numbers in present list: 23, 27-31, 33-36, 48-51, 63-68, 70-72) and obligate parasite *Wohlfahrtia magnifica* (32) but little attention has been paid to several species belonging to other trophic groups like: cleptoparasites of wasps' and bees' nests (1-2, 4-22), endoparasites of adult bees (3), orthopterans (26, 40-47), tenebrionid beetles (37-39), terrestrial gastropods (24-25, 52-62), and lumbricids (73-74).

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