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Updated checklist of the Belgian caddisflies (Trichoptera)

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Abstract

In the previous checklist, STROOT (1987) reported 200 caddisfly species for the Belgian fauna. Since that time, several additional species have been reported. On the other hand, there were several species listed for which no proof existed and some others that were not correctly identified. In this updated checklist, 205 species of caddisflies are listed for Belgium. Six species are reported here for the first time for Belgium: *Ecclisopteryx dalecarlica* Kolenati, 1848, *Hydroptila occulta* (Eaton, 1873), *Hydropsyche incognita* Pitsch, 1993, *Plectrocnemia brevis* McLachlan, 1871, *Synagapetus moselyi* (Ulmer, 1938) and *Wormaldia occipitalis* type 2 Neu, in preparation. Some additional species that might occur in Belgium based on their occurrence in adjacent countries are indicated.

Keywords : *Ecclisopteryx dalecarlica*; *Hydropsyche incognita*; *Hydroptila occulta*; *Plectrocnemia brevis*; *Synagapetus moselyi*.

Samenvatting

In de vorige soortenlijst vermeldde STROOT (1987) 200 soorten kokerjuffers voor de Belgische fauna. Sinds die tijd werden enkele extra soorten gemeld. Anderzijds werden enkele andere soorten gemeld waarvoor geen bewijsmateriaal voorhanden was en weer andere waren verkeerd gedetermineerd. In deze nieuwe soortenlijst worden 205 soorten kokerjuffers vermeld voor België. Zes soorten worden hier voor het eerst uit België vermeld: *Ecclisopteryx dalecarlica* Kolenati, 1848, *Hydroptila occulta* (Eaton, 1873), *Hydropsyche incognita* Pitsch, 1993, *Plectrocnemia brevis* McLachlan, 1871, *Synagapetus moselyi* (Ulmer, 1938) en *Wormaldia occipitalis* type 2 Neu, in voorbereiding. Daarnaast worden een aantal soorten aangeduid die mogelijk te verwachten zijn in België gezien hun voorkomen in de buurlanden.

Résumé

Précédemment, STROOT (1987) rapportait 200 trichoptères pour la faune Belge. Depuis lors, quelques espèces additionnelles se sont ajoutées. D'autres, par contre, ont été omises, soit il n'y avait pas de matériel conservé, soit les espèces n'étaient pas identifiées correctement. Dans cette nouvelle liste, 205 trichoptères sont rapportés pour la Belgique dont six espèces le sont pour la première fois: *Ecclisopteryx dalecarlica* Kolenati, 1848, *Hydroptila occulta* (Eaton, 1873), *Hydropsyche incognita* Pitsch, 1993, *Plectrocnemia brevis* McLachlan, 1871, *Synagapetus moselyi* (Ulmer, 1938) et *Wormaldia occipitalis* type 2 Neu, en préparation. A coté de cela, certaines espèces sont mentionnées ici car, de par leur présence dans les pays limitrophes, elles sont susceptibles de l'être en Belgique.

Introduction

The first checklist of the Belgian Trichoptera was made by DE SELYS-LONGCHAMPS (1888), who listed 136 species for Belgium. MARLIER (1949) already reported 171 caddisflies and more recently, STROOT (1987) listed 200 species. Since that time, several additional species have been reported. On the other hand,

several species that could not be confirmed were removed from the checklist. Also some species that were not correctly identified were omitted. In addition, six species are reported here for the first time for the Belgian fauna.

Materials and methods

During the present study, all the available material, adults as well as larvae, from the Royal Belgian Institute of Natural Sciences (KBIN-IRSNB), the University Faculty of Agronomic Sciences in Gembloux (FSAG), the University of Mons (UMons) and the University of Liège (ULG) was identified. In addition, caddisflies were sampled during several field trips for the last three years.

The adult Belgian caddisfly species can be identified with the book of MALICKY (2004), which contains drawings of the genitalia of all the European species. The book of MACAN (1973) contains identification keys, but a lot of Belgian species are lacking and the drawings are not so good. A good identification key to identify adult Trichoptera is currently lacking. Larvae can be identified with the excellent digital key of LECHTHALER & STOCKINGER (2005). A cheaper, but less reliable, key has been developed by HIGLER (2005).

Results

In total, 205 species of caddisflies (Trichoptera) have been found in Belgium (Table 1). All changes in comparison with the checklist presented by STROOT (1987) are discussed per family.

Family Glossosomatidae

Synagapetus dubitans McLachlan, 1879 was recently added to the Belgian fauna (LOCK & GOETHALS, 2010). This species was observed in two small streams in the Gaume region. *Synagapetus moselyi* (Ulmer, 1938) is reported here for the first time in Belgium. Two males and four females were found in Bois des Basses Mortelettes near Couvin (FR0353) on 7 May 2011.

Families Ptilocolepidae & Rhyacophilidae

No changes.

Family Philopotamidae

Wormaldia occipitalis type 2 Neu, in preparation is reported here for the first time from Belgium. Although the species has not been described yet, it can be recognised using the website of Peter NEU (NEU, 2011). Males have already been found in Mirwart on 6 July 1943, 30 June 1975 and 21 June 1977 by MARLIER, in Ombret on 2 August 1982 by STROOT and in Bourgimont (GR0390) on 11 September 2010 during the present study.

Family Hydroptilidae

Hydroptila angulata Mosely, 1922 and *Hydroptila simulans* Mosely, 1920 were reported by RICCIARDONE & STROOT (1991) from the river Meuse, however, these records could not be verified as no specimens were conserved and these species were therefore not retained for the checklist. *Hydroptila lotensis* Mosely, 1930 has been collected in the river Semois (COPPA, 2001). *Hydroptila occulta* (Eaton, 1873) is reported here for the first time for Belgium. This species was found in the river Burnot in Rivière on 18 August 1917. Although this material was present in the collection of the Royal Belgian Institute of Natural Sciences, it had never been identified.

Family Polycentropodidae

Cyrnus insolutus McLachlan, 1878 has been reported from the lake Grote Dorst in Zelem on 2 April 1998 (DENYS *et al.*, 2000). *Plectrocnemia brevis* McLachlan, 1871 is reported here for the first time from Belgium. One larva was found in a travertine source discharging into the stream Noorbeek near ‘s Gravenvoeren (FS9727) on 26 October 2011.

Family Ecnomidae

Ecnomus deceptor McLachlan, 1884 could not be confirmed by STROOT (1985) nor during the present study and is therefore removed from the checklist.

Family Psychomyidae

Tinodes dives (Pictet, 1834) was recently discovered in a small stream in the Gaume region by LOCK & GOETHALS (2010). *Tinodes maculicornis* (Pictet, 1834) had already been reported by MARLIER (1949), however, STROOT (1987) omitted this species because he doubted the identification. Although the specimen under

Table 1. Checklist of the Belgian Trichoptera.

ORDER TRICHOPTERA

Family Glossosomatidae

1. *Agapetus delicatulus* McLachlan, 1884
2. *Agapetus fuscipes* Curtis, 1834
3. *Agapetus laniger* Pictet, 1834
4. *Agapetus ochripes* Curtis, 1834
5. *Glossosoma boltoni* Curtis, 1834
6. *Glossosoma conformis* Neboiss, 1963
7. *Synagapetus dubitans* McLachlan, 1879
8. *Synagapetus iridipennis* McLachlan, 1879
9. *Synagapetus moselyi* (Ulmer, 1938)

Family Ptilocolepidae

10. *Ptilocolepus granulatus* (Pictet, 1834)

Family Rhyacophilidae

11. *Rhyacophila dorsalis* (Curtis, 1834)
12. *Rhyacophila fasciata* Hagen, 1859
13. *Rhyacophila hirticornis* McLachlan, 1879
14. *Rhyacophila laevis* Pictet, 1834
15. *Rhyacophila obliterata* McLachlan, 1863
16. *Rhyacophila pascoei* McLachlan ,1879
17. *Rhyacophila philopotamoides* McLachlan, 1879
18. *Rhyacophila praemorsa* McLachlan, 1879
19. *Rhyacophila pubescens* Pictet, 1834
20. *Rhyacophila tristis* Pictet, 1834

Family Philopotamidae

21. *Chimarra marginata* (Linnaeus, 1767)
22. *Philopotamus ludificatus* McLachlan, 1878
23. *Philopotamus montanus* (Donovan, 1813)
24. *Philopotamus variegatus* (Scopoli, 1763)
25. *Wormaldia mediana* McLachlan, 1878
26. *Wormaldia occipitalis* (Pictet, 1834)
27. *Wormaldia occipitalis* type 2 Neu, in preparation
28. *Wormaldia subnigra* McLachlan, 1865

Family Hydroptilidae

29. *Agraylea multipunctata* Curtis, 1834
30. *Agraylea sexmaculata* Curtis, 1834
31. *Allotrichia pallicornis* (Eaton, 1873)
32. *Hydroptila cornuta* Mosely, 1922
33. *Hydroptila forcipata* (Eaton, 1873)
34. *Hydroptila lotensis* Mosely, 1930
35. *Hydroptila occulta* (Eaton ,1873)
36. *Hydroptila pulchricornis* Pictet, 1834
37. *Hydroptila sparsa* Curtis, 1834
38. *Hydroptila vectis* Curtis, 1834
39. *Ithytrichia lamellaris* Eaton, 1873
40. *Orthotrichia costalis* (Curtis, 1834)
41. *Oxyethira flavicornis* Pictet, 1834
42. *Tricholeiochiton fagesii* (Guinard, 1879)

Family Polycentropidae

43. *Cyrnus crenaticornis* (Kolenati, 1859)
44. *Cyrnus flavidus* McLachlan, 1864
45. *Cyrnus insolutus* McLachlan, 1878
46. *Cyrnus trimaculatus* (Curtis, 1834)
47. *Holocentropus dubius* (Rambur, 1842)
48. *Holocentropus picicornis* (Stephens, 1836)
49. *Holocentropus stagnalis* (Albarda, 1874)
50. *Neureclipsis bimaculata* (Linnaeus, 1758)
51. *Plectrocnemia brevis* McLachlan, 1871
52. *Plectrocnemia conspersa* (Curtis, 1834)
53. *Plectrocnemia geniculata* McLachlan, 1871
54. *Polycentropus flavomaculatus* (Pictet, 1834)
55. *Polycentropus irroratus* Curtis, 1835
56. *Polycentropus kingi* McLanchlan, 1881

Family Ecnomidae

57. *Ecnomus tenellus* (Rambur, 1842)

Family Psychomyiidae

58. *Lype phaeopa* (Stephens, 1836)
59. *Lype reducta* (Hagen, 1868)
60. *Psychomyia pusilla* (Fabricius, 1781)
61. *Tinodes assimilis* McLachlan, 1865
62. *Tinodes dives* (Pictet, 1834)
63. *Tinodes maculicornis* (Pictet, 1834)
64. *Tinodes pallidulus* McLachlan, 1878
65. *Tinodes rostocki* McLachlan ,1878
66. *Tinodes unicolor* (Pictet, 1834)
67. *Tinodes waeneri* (Linnaeus, 1758)

Family Hydropsychidae

68. *Cheumatopsyche lepida* (Pictet, 1834)
69. *Diplectrona felix* McLachlan, 1878
70. *Hydropsyche angustipennis* (Curtis, 1834)
71. *Hydropsyche contubernalis* McLachlan, 1865
72. *Hydropsyche dinarica* Marinkovic-Gospodnetic, 1979
73. *Hydropsyche exocellata* Dufour, 1841
74. *Hydropsyche fulvipes* Curtis, 1834
75. *Hydropsyche incognita* Pitsch, 1993
76. *Hydropsyche instabilis* (Curtis, 1834)
77. *Hydropsyche pellucidula* (Curtis, 1834)
78. *Hydropsyche saxonica* McLachlan, 1884
79. *Hydropsyche silfvenii* Ulmer, 1906
80. *Hydropsyche siltalai* Doehler, 1963

Family Phryganeidae

81. *Agrypnia obsoleta* (Hagen, 1864)
82. *Agrypnia pagetana* Curtis, 1835
83. *Agrypnia varia* (Fabricius, 1793)
84. *Hagenella clathrata* (Kolenati, 1848)
85. *Oligostomis reticulata* (Linnaeus, 1761)
86. *Oligotricha striata* (Linnaeus, 1758)
87. *Phryganea bipunctata* Retzius, 1783
88. *Phryganea grandis* Linnaeus, 1758
89. *Trichostegia minor* (Curtis, 1834)

Family Molannidae

90. *Molanna angustata* Curtis, 1834
91. *Molannodes tinctus* (Zetterstedt, 1840)

Family Odontoceridae

92. *Odontocerum albicorne* (Scopoli, 1763)

Family Leptoceridae

93. *Adicella filicornis* (Pictet, 1834)
94. *Adicella reducta* (McLachlan, 1865)
95. *Athripsodes albifrons* (Linnaeus, 1758)
96. *Athripsodes aterrimus* (Stephens, 1836)
97. *Athripsodes bilineatus* (Linnaeus, 1758)
98. *Athripsodes cinereus* (Curtis, 1834)
99. *Athripsodes commutatus* (Rostock, 1874)
100. *Athripsodes leucophaeus* (Rambur, 1842)
101. *Ceraclea albimacula* (Rambur, 1842)
102. *Ceraclea annulicornis* (Stephens, 1836)
103. *Ceraclea dissimilis* (Stephens, 1836)
104. *Ceraclea fulva* (Rambur, 1842)
105. *Ceraclea nigronervosa* (Retzius, 1783)
106. *Ceraclea senilis* (Burmeister, 1839)
107. *Leptocerus interruptus* (Fabricius, 1775)
108. *Leptocerus tineiformis* Curtis, 1834
109. *Mystacides azureus* (Linnaeus, 1761)
110. *Mystacides longicornis* (Linnaeus, 1758)

111. Mystacides niger (Linnaeus, 1758)
112. *Oecetis furva* (Rambur, 1842)
113. *Oecetis lacustris* (Pictet, 1834)
114. *Oecetis notata* (Rambur, 1842)
115. *Oecetis ochracea* (Curtis, 1825)
116. *Oecetis testacea* (Curtis, 1834)
117. *Setodes argentipunctellus* McLachlan, 1877
118. *Setodes punctatus* (Fabricius, 1793)
119. *Triaenodes bicolor* (Curtis, 1834)

Family Goeridae

120. *Goera pilosa* (Fabricius, 1775)
121. *Lithax niger* (Hagen, 1859)
122. *Lithax obscurus* (Hagen, 1859)
123. *Silo nigricornis* (Pictet, 1834)
124. *Silo pallipes* (Fabricius, 1781)
125. *Silo piceus* (Brauer, 1857)

Family Limnephilidae

126. *Allogamus auricollis* (Pictet, 1834)
127. *Anabolia brevipennis* (Curtis, 1834)
128. *Anabolia nervosa* (Curtis, 1834)
129. *Annitella obscurata* (McLachlan, 1876)
130. *Anomalopterygella chauviniana* (Stein, 1874)
131. *Chaetopterygopsis maclachlani* Stein, 1874
132. *Chaetopteryx major* McLachlan, 1876
133. *Chaetopteryx villosa* (Fabricius, 1798)
134. *Drusus annulatus* (Stephens, 1837)
135. *Drusus trifidus* McLachlan, 1868
136. *Ecclisopteryx dalecarlica* Kolenati, 1848
137. *Ecclisopteryx guttulata* (Pictet, 1834)
138. *Enoicyla pusilla* (Burmeister, 1839)
139. *Glyphotaelius pellucidus* (Retzius, 1783)
140. *Grammotaulius nigropunctatus* (Retzius, 1783)
141. *Grammotaulius nitidus* (Muller, 1764)
142. *Grammotaulius submaculatus* (Rambur, 1842)
143. *Halesus digitatus* (von Paula Schrank, 1781)
144. *Halesus radiatus* (Curtis, 1834)
145. *Halesus rubricollis* (Pictet, 1834)
146. *Halesus tesselatus* (Rambur, 1842)
147. *Hydatophylax infumatus* (McLachlan, 1865)
148. *Ironoquia dubia* (Stephens, 1837)
149. *Limnephilus affinis* Curtis, 1834
150. *Limnephilus auricula* Curtis, 1834
151. *Limnephilus binotatus* Curtis, 1834
152. *Limnephilus bipunctatus* Curtis, 1834
153. *Limnephilus centralis* Curtis, 1834
154. *Limnephilus coenosus* Curtis, 1834
155. *Limnephilus decipiens* (Kolenati, 1848)
156. *Limnephilus elegans* Curtis, 1834
157. *Limnephilus extricatus* McLachlan, 1865
158. *Limnephilus flavicornis* (Fabricius, 1787)
159. *Limnephilus fuscicornis* Rambur, 1842
160. *Limnephilus griseus* (Linnaeus, 1758)
161. *Limnephilus hirsutus* (Pictet, 1834)
162. *Limnephilus ignavus* McLachlan, 1865
163. *Limnephilus incisus* Curtis, 1834
164. *Limnephilus lunatus* Curtis, 1834
165. *Limnephilus luridus* Curtis, 1834
166. *Limnephilus marmoratus* Curtis, 1834
167. *Limnephilus nigriceps* (Zetterstedt, 1840)
168. *Limnephilus politus* McLachlan, 1865
169. *Limnephilus rhombicus* (Linnaeus, 1758)
170. *Limnephilus sparsus* Curtis, 1834
171. *Limnephilus stigma* Curtis, 1834
172. *Limnephilus vittatus* (Fabricius, 1798)
173. *Melampophylax mucoreus* (Hagen, 1861)
174. *Micropterna lateralis* (Stephens, 1837)
175. *Micropterna nycterobia* McLachlan, 1875
176. *Micropterna sequax* McLachlan, 1875
177. *Micropterna testacea* (Gmelin, 1789)
178. *Parachiona picicornis* (Pictet, 1834)
179. *Potamophylax cingulatus* (Stephens, 1837)
180. *Potamophylax latipennis* (Curtis, 1834)
181. *Potamophylax luctuosus* (Piller & Mitterpacher, 1783)
182. *Potamophylax nigricornis* (Pictet, 1834)
183. *Potamophylax rotundipennis* (Brauer, 1857)
184. *Rhadicoleptus alpestris* (Kolenati, 1848)
185. *Stenophylax permistus* McLachlan, 1895
186. *Stenophylax vibex* (Curtis, 1834)

Family Apataniidae

187. *Apatania fimbriata* (Pictet, 1834)
188. *Apatania muliebris* McLachlan, 1866

Family Brachycentridae

189. *Brachycentrus maculatus* (Fourcroy, 1785)
190. *Brachycentrus montanus* Klapalek, 1892
191. *Brachycentrus subnubilus* Curtis, 1834
192. *Micrasema longulum* McLachlan, 1876
193. *Micrasema minimum* McLachlan, 1876
194. *Micrasema setiferum* (Pictet, 1834)

Family Lepidostomatidae

195. *Crunoecia irrorata* (Curtis, 1834)
196. *Lepidostoma basale* (Kolenati, 1848)
197. *Lepidostoma hirtum* (Fabricius, 1775)

Family Sericostomatidae

198. *Notidobia ciliaris* (Linnaeus, 1761)
199. *Oecismus monedula* (Hagen, 1859)
200. *Sericostoma personatum* (Kirby & Spence, 1826)
201. *Sericostoma schneideri* Kolenati, 1848

Family Beraeidae

202. *Beraea maurus* (Curtis, 1834)
203. *Beraea pullata* (Curtis, 1834)
204. *Beraeodes minutus* (Linnaeus, 1761)
205. *Ernodes articularis* (Pictet, 1834)

consideration could not be identified with certainty, the presence of *T. maculicornis* in Belgium could be confirmed from several small stream in the loamy region.

Family Hydropsychidae

Hydropsyche bulgaromanorum Malicky, 1977 was reported from the river Scheldt in Destelbergen (STROOT, 1985), however, re-examination indicated that this actually concerned a male of the species *Hydropsyche contubernalis* MacLachlan, 1865. *Hydropsyche dinarica* Marinkovic-Gospodnetic, 1979 was first reported by STROOT (1986) and has since been reported in several rivers in the Ardennes region. *Hydropsyche incognita* Pitsch, 1993 is reported here for the first time in Belgium. Most collection material identified as *Hydropsyche saxonica* MacLachlan, 1884 actually belonged

to the recently described *H. incognita*. The species is quite common in big rivers in the Ardennes region such as the rivers Lomme, Ourthe, Lesse, Our, Amblève and Semois.

Family Phryganeidae

No changes.

Family Molannidae

Molannodes tinctus (Zetterstedt, 1840) has been collected in the Ziepbeek in Rekem by STROOT & NEVEN (1989), where it is still present (LOCK & GOETHALS, in press).

Family Odontoceridae

No changes.

Family Leptoceridae

Ceraclea alboguttata (Hagen, 1860) has been synonymised with *Ceraclea albimacula* (Rambur, 1842). *Ceraclea riparia* (Albarda, 1874) could not be confirmed by STROOT (1985) nor during the present study and was omitted. *Erotesis baltica* McLachlan, 1877 was listed by DENYS *et al.* (2000), however, this turned to be *Triaenodes bicolor* (Curtis, 1834). *Oecetis tripunctata* (Fabricius 1793) nor *Setodes viridis* (Fourcroy, 1785) could not be confirmed by STROOT (1985) and both species were omitted. *Triaenodes conspersus* (Rambur, 1842) could not be confirmed during the present study and was therefore also omitted.

Family Goeridae

No changes.

Family Limnephilidae

Chaetopterygopsis maclachlani Stein, 1874 was omitted by STROOT (1985) because MARLIER (1949) considered the identification of larvae doubtful, nonetheless, the material was correctly identified and the species has been reincorporated. *Drusus biguttatus* (Pictet, 1834) was reported by LE ROI (1913) from the Hautes Fagnes region, however, its presence in Belgium could not been confirmed and therefore, this species has been omitted. *Ecclisopteryx dalecarlica* Kolenati, 1848 is reported here for the first time in Belgium. One larva was discovered in the river Amblève in Amel on 22 September 2010. *Limnephilus binotatus* Curtis, 1834 was recently reported by LOCK *et al.* (2010) from the nature reserve Bospolder-Ekers Moeras in Ekeren. *Limnephilus borealis* (Zetterstedt, 1840) was listed by DENYS *et al.* (2000), however, this turned out to be *Limnephilus lunatus* Curtis, 1834. *Limnephilus subcentralis* Brauer, 1857 could not be confirmed by STROOT (1985) nor during the present study and was therefore omitted.

Families Apataniidae, Brachycentridae, Lepidostomatidae, Sericostomatidae & Beraeidae

No changes.

Discussion

For all the neighbouring countries, detailed information about the caddisfly fauna is available: an atlas recently appeared for the Netherlands (HIGLER, 2008), a checklist was published for the Grand-Duchy of Luxembourg (SCHRANKEL *et al.*, 2008), online distribution maps are available for France and some of the departments bordering Belgium have been relatively well investigated (COPPA, 2011) and checklists have been made for all the German federal states, including Rheinland-Pfalz and Nordrhein-Westfalen, which border Belgium (ROBERT, 2001).

The observation of the six species that are reported here for the first time for Belgium is not unexpected since they occur in the neighbouring countries. *Ecclisopteryx dalecarlica* Kolenati, 1848 had already been found in Luxembourg, northern France and the German federal states bordering Belgium. *Hydroptila occulta* (Eaton, 1873) had been observed in northern France. *Hydropsyche incognita* Pitsch, 1993 was reported from the Netherlands, Luxembourg, the German federal states bordering Belgium and northern France. *Plectrocnemia brevis* McLachlan, 1871 had been found in travertine sources in the Netherlands very close to the Belgium border and also in Luxembourg, northern France and the German federal states bordering Belgium. *Synagapetus moselyi* was known from the German federal states bordering Belgium. *Wormaldia occipitalis* type 2 Neu, in preparation had also been found in the German federal states bordering Belgium (NEU, 2011).

In the Netherlands, 181 species have been observed (HIGLER, 2008), however, about 40 species have not been observed for at least two decades and can be considered extinct. Some of the species that currently occur in the Netherlands, might also be expected to be found in Belgium. Especially several Hydroptilidae

might be discovered, which are easily overlooked due to their small size: *Hydroptila angulata* Mosely, 1922 should be confirmed for Belgium and in addition, *Orthotrichia tragetti* Mosely, 1930, *Oxyethira falcata* Morton, 1893 and *Oxyethira sagittifera* Ris, 1897 could be discovered. Also two other species belonging to the Leptoceridae occur in the Netherlands and can be expected: *Erotesis baltica* McLachlan, 1877 and *Oecetis struckii* Klapalek, 1903.

From Luxembourg, 183 species have been reported (SCHRANKEL *et al.*, 2008), of which *Hydropsyche botosaneanui* Marinkovic-Gospodnetic, 1966, *Limnephilus italicus* McLachlan, 1884, *Stenophylax mitis* McLachlan 1875 and *Stenophylax mucronatus* McLachlan, 1880 have not yet been observed in Belgium.

From the German federal states bordering Belgium, Rheinland-Pfalz and Nordrhein-Westfalen, respectively 198 and 194 have been found (ROBERT, 2001). Species that are not rare in those states that might be expected in Belgium are: *Hydropsyche bulgaromanorum* Malicky, 1977, *Hydroptila angulata* Mosely, 1922, *Hydroptila simulans* Mosely, 1920, *Hydroptila tineoides* Dalman, 1819, *Drusus discolor* (Rambur, 1842), *Stenophylax mitis* McLachlan, 1875 and *Wormaldia triangulifera* McLachlan, 1878.

In northern France, which has been relatively well studied compared to the rest of France, the following additional species have been reported: *Hydropsyche botosaneanui* Marinkovic-Gospodnetic, 1966, *Hydropsyche modesta* Navas, 1925, *Oxyethira frici* Klapalek, 1891, *Ceraclea riparia* (Albarda, 1874), *Oecetis tripunctata* (Fabricius, 1793), *Setodes viridis* (Fourcroy, 1785), *Triaenodes ochreellus* McLachlan, 1877, *Ylodes conspersus* (Rambur, 1842) and *Ylodes simulans* (Tjeder, 1929) (COPPA, 2011).

It can be concluded that, although already 205 caddisfly species have been reported in Belgium, there are still numerous additional species that might be expected. This is supported by the fact that in two years time, we were able to find not less than nine species that had not previously been recorded in Belgium (LOCK & GOETHALS, 2010; LOCK *et al.*, 2010; present study). At least 175 species were still observed recently, however, there are undoubtedly much more species that currently occur in Belgium. Flanders has recently been studied quite intensively, although stagnant waters remain insufficiently sampled (LOCK & GOETHALS, in press). On the other hand, Wallonia has hardly been investigated during the last two decades and additional species are therefore especially expected in this region.

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