Tech. Rep. Aust. Mus. Online
Number 33, pp. 1–101, 2021
https://doi.org/10.3853/j.1835-4211.33.2021.1767

Technical Reports of the Australian Museum Online
a peer-reviewed open-access journal
published by the Australian Museum, Sydney
communicating knowledge derived from our collections
ISSN 1835-4211 (online)

Images of Australian Odonata Wings

John Tann

Australian Museum Research Institute,
Australian Museum, 1 William Street, Sydney NSW 2010, Australia

Abstract. A recently finished project has created an openly accessible, high-resolution, photographic library of wings of Australian dragonflies and damselflies, order Odonata. The library is an open resource for identification and research. Both male and female wings of 318 species of dragonfly and damselfly have been photographed with a specialist set-up using identified museum collection material. In general, both wings were removed from the insect body to produce an image with a minimum of visual artefacts. Each resulting image shows a pair of right wings, a scale, an identifying taxonomic name and sex.

Introduction

Historically, there have been no readily accessible, good quality images of all Australian dragonflies and damselflies (Odonata), for identification purposes. Comparative morphology is arguably the most informative first step in any dependable identification process but it relies on high resolution, detailed imagery of diagnostically important structures across all known species. Ideally such imagery should be of the most typical representatives of a species (type specimens) or specimens that are expertly identified, and every image standardized in such a way that humans or human-assisted machines can consistently detect and process similarities and differences. It is possible that certain structures, thought to be diagnostically uninformative, are found to be much more useful when all species of a large group are assembled in the same orientation, format, and scale.

In the past, Odonata specimens in some of Australia's largest insect collections have been photographed at different times using a range of methods and images have been made available online. Such resources are not specifically images of wings or of any other particular structure. For example, the Australian National Insect Collection has imaged whole drawers of insect specimens, including dragonflies and damselflies (see Mantle *et al*., 2012). Another example, *DigiVol*, a volunteer program developed by the Australian Museum, has been generating images of whole specimens together with their label-data to streamline registration and cataloguing (see DigiVol, 2020).

Such images add intellectual value to the specimens and to the collections that accommodate them ultimately leading to a better understanding of the Australian Odonata fauna. Intellectual value is significantly increased in direct relationship to confidence of identification—the more confident the identification, the more valuable the data.

The popularity of image sharing sites such as *Flickr*, and citizen science observation sharing sites such as *iNaturalist*, has resulted in a significant number of high-quality images of live dragonflies and damselflies being made freely available. In 2020, *iNaturalist* held about 30,000 Australian observations of Odonata, 88% at *Research Grade* (identification agreed by two or more people) (iNaturalist, 2020); *Flickr* held about 20,000 images tagged as a dragonfly or damselfly in Australia (Flickr, 2020).

Wing morphology, especially venation, is not only diagnostically significant in taxonomy (e.g., Tillyard, 1917), but is used for demonstrating species variation (e.g., Stewart, 1982), for field identification (e.g., Theischinger, Hawking & Orr, 2021), for understanding wing function and evolution (e.g., Salcedo *et al*., 2019), and other studies (e.g., phylogeny, Trueman, 2001). This project has created a resource for identification and research based on high-quality wing photographs.

Keywords: Odonata; Insecta; Dragonfly; Damselfly; morphology; wing venation
Corresponding author: John Tann johntann99@gmail.com
Received: 20 July 2020 **Accepted**: 24 January 2021 **Published**: 24 March 2021 (online only)
Publisher: The Australian Museum, Sydney, Australia (a statutory authority of, and principally funded by, the NSW State Government)
Citation: Tann, John. 2021. Images of Australian Odonata wings. *Technical Reports of the Australian Museum Online* 33: 1–101. https://doi.org/10.3853/j.1835-4211.33.2021.1767

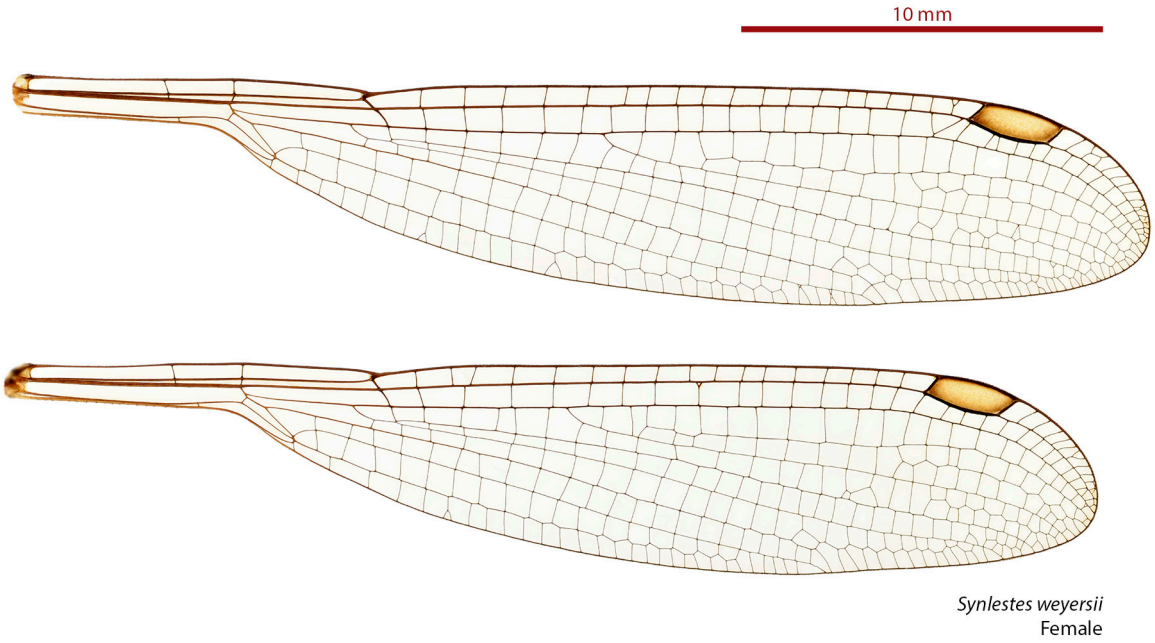


Figure 1. Image example: wings of a female *Synlestes weyersii*, a damselfly. This image and others are available in high-resolution, about 9000 × 5000 pixels (Tann, 2020a–e).

From 2013 to 2015 wings of Australian dragonflies and damselflies were photographed at the Australian Museum in Sydney, Australia. In that time, 318 of the approximately 324 known species of Australian dragonflies and damselflies were photographed and, with few exceptions, images were made of both male and female wings. Some species were not able to be photographed, either because of restricted access, rarity, or physical condition; for some species only one sex is known. This project drew from identified and vouchered specimens, either pinned or in envelopes, held at the Australian Museum, supplemented by specimens from four other Australian institutions: Queensland Museum in Brisbane, Western Australian Museum in Perth, Museum and Art Gallery of the Northern Territory in Darwin and Australian National Insect Collection in Canberra.

Materials and method

In order to create high resolution and standardized images, wings were removed from most specimens so they could be photographed without artefacts (see *Why remove the wings?* below). Dragonflies and damselflies specimens held in envelopes were generally cleaner, easier to work with, and required less reconstruction after photographing compared to pinned specimens.

Technique

A specimen in poor condition and with wings intact was selected. Many dragonfly and damselfly specimens in collections have broken bodies, separated abdomens or heads. Using this destructive technique—removing wings—from an already-damaged specimen could be justified because it has contributed intellectual value from a mixed series of good and broken specimens. All specimens were registered, with few exceptions, and expert identification of each specimen was critical. Only one specimen at a time was processed before being returned to its drawer to avoid a mix-up. A whole-of-body photograph of the original specimen with all labels was made before further work, for reference and quality control; images of each reference specimen, including associated labels, have been published online (Tann, 2020e) and are freely accessible and expected to persist into the future. Both right wings were surgically removed microscopically using fine-pointed forceps. Occasionally, due to availability, left wings were used and their images artificially flipped (see *Abnormal specimens* below). Both wings were photographed independently using a good quality camera and customized rig. Wings and bodies were returned to their envelope. The wings of pinned specimens were glued to paper points and re-joined with their bodies on the same pin. Occasionally wings were photographed while still attached to the insect body; this was a sub-optimal method, used for rare and special specimens (see *Visual artefacts* below).

Image capture equipment

The following photographic equipment was used (with specimens staged on an inverted glass petri dish: 200 mm diameter, 37 mm high):

Camera	Nikon D800E
Lens	Nikon AF-S Micro NIKKOR 60 mm f/2.8G ED
Ring flash	Metz Mecablitz 15 MS-1 Macro Ringlight Digital Flash
Capture software	Nikon Camera Control Pro 2
Copy stand	Kaiser 5512 RSX

Camera Control Pro 2 software controlled the camera settings and shutter. The ring flash was set to trigger off the flash of the main camera. The software also captured photographic images directly to the controlling desktop computer. Forewings and hindwings were photographed separately and, during post-processing, combined in a single image of both wings.

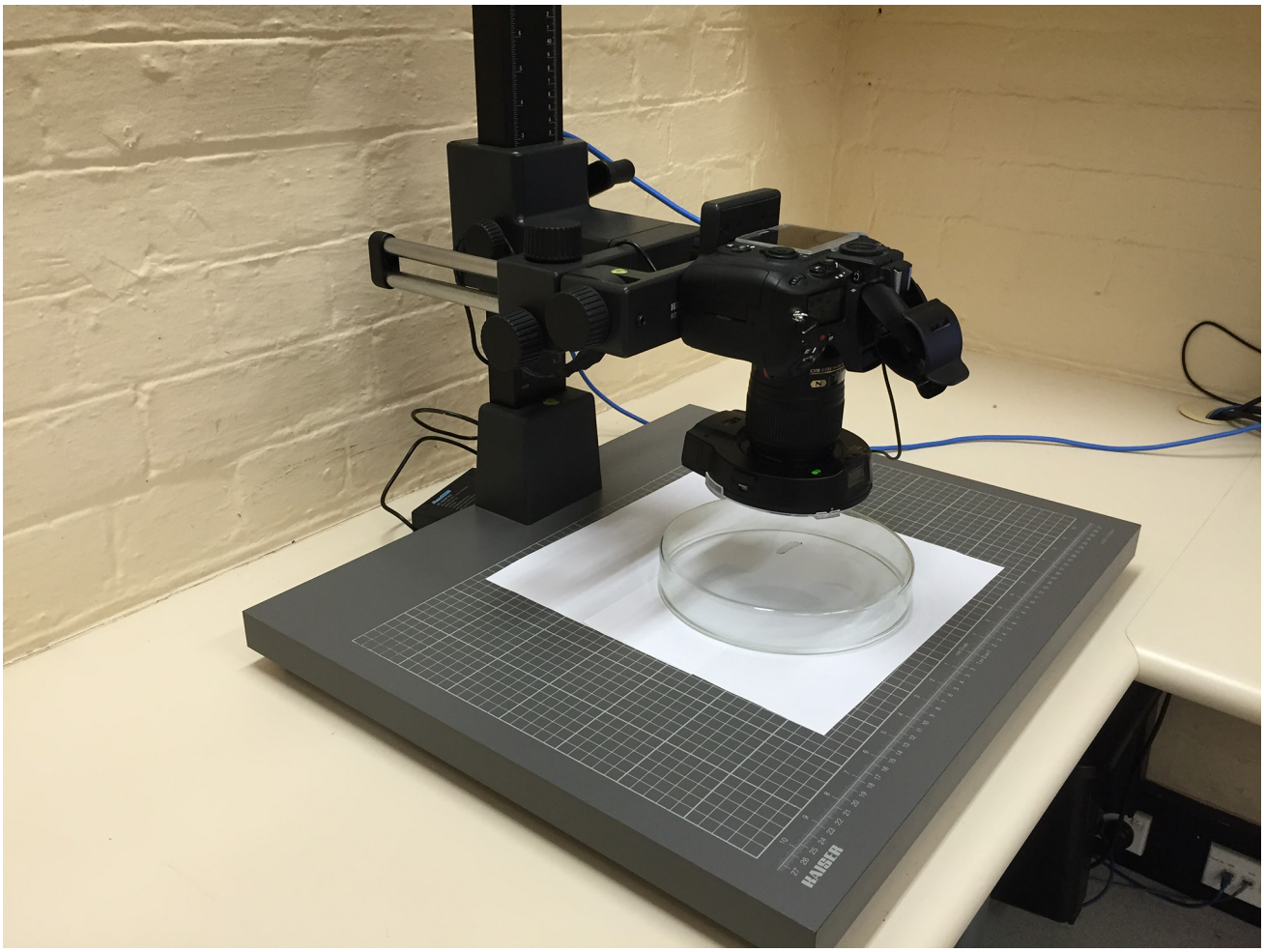


Figure 2. Photographic set-up for dragonfly and damselfly wings optimized to produce an image without shadows or visual artefacts.

Equipment layout

The photographic set-up was optimized to consistently capture high-resolution images of wings, minimizing visual artefacts. Dragonfly and damselfly wings are usually transparent, sometimes with colour, and have a length ranging from c. 15 mm for the smallest damselfly to c. 75 mm for the largest dragonfly.

The camera was mounted vertically above the specimen pointing down. A copy-stand-mount allowed vertical adjustment of the height of the camera which was consistent for almost all dragonfly and damselfly wings. Some very large dragonflies with long wings required a higher camera position.

A large petri dish was found to be an ideal photographic platform for minimizing visual artefacts. It was used upside down—the mouth of the petri dish was face down and its flat glass base was off the copy stand platform supporting a wing specimen at 37 mm above a clean white sheet of paper. The selected height between object and background produced an image with even lighting and without obvious shadow.

Equipment set-up for photographing specimens where wings could not be removed is discussed below (see *Visual artefacts* below).

Camera settings

Exposure time ..... 1/60 second

f-number f/18

ISO speed rating ..... 100 ASA

Flash..... ON

Image size ..... 7360 × 4912 pixel

Image compression ..... highest quality JPEG

Colour palette..... 24 bits per pixel

The compression format, JPEG, was chosen to give good results without visibly compromising image quality. Without compression, file sizes were overly large and consequently unwieldy to store, transfer and manipulate.

Object position

Height of wing above white background.... 37 mm

Front of lens to object distance..... 45 mm

Each wing was photographed separately.

Figure 3. Photograph of a single wing. Original photo of the forewing of a female *Austrogomphus bifurcatus* as recorded using the above camera rig. Note there are no shadows and a reasonably even near-white background. This photo has been reduced in size for publication.

Image post-processing

Photoshop graphics editor, published by Adobe®, was used for generating a standardized image of both right wings, visual removal of dust, and visual repair of small areas of wing damage.

Lightroom (image organization and manipulation software published by Adobe®) was used for managing photographs, adding metadata, and preparing a final version of each image.

ExifTool (open-source software used for reading, writing and manipulating image metadata—Harvey, 2020) was used for adding georeferences and other Exif metadata (a standard that specifies formats for image metadata used by digital cameras).

Final image

Each final image shows a pair of wings on a white background with a scale bar and identification.

Size ..... 9008 × 5067 pixel (ratio 16:9)

Colour palette ... 24 bits per pixel

Scale ..... Most dragonfly and damselfly wing images were photographed at a resolution of 1357 pixels per centimetre, or about 7 µm per pixel. This scale was a product of the object to camera distance that was selected early in the project. Some larger wings were photographed at a resolution of 1000 pixels per centimetre, or about 10 µm per pixel.

For greater usability, two sets of images were created: one set with as-shot resolution of 1357/1000 pixels per centimetre;[1] a second set where final wing image size was adjusted for best fit to one of six fixed resolutions.[2] For each image a scale bar was added.

Table 1. Image display resolution. One set of images was scaled to fit one of six resolution bands.

resolution pixels per centimetre	horizontal and vertical scale	colour of scale bar
1000	73.7%	blue
1357	100%	black
2000	147.4%	blue
2500	184.2%	brown
4000	294.8%	blue
5000	368.5%	blue

There was no standard way to embed the image scale into Exif metadata. Exif parameters such as *XResolution* and *YResolution*, even if initially set correctly, were able to be manipulated subsequently and misleadingly by viewing software.

To ensure final wing images maintained their correct identification, the taxonomic name, according to the *Australian Faunal Directory*,[3] and sex, male or female, were added to the lower right corner of each image. A filename was allocated to readily convey species, sex and scale. For example: “Austroaeschna hardyi female 1357.jpg”.

Abnormal specimens

Occasionally undamaged right wings were not available and left wings were used as substitutes. When this occurred a mirror image of the left wing was created in software so as to appear like a right wing. This modification was noted in the image metadata.

Figure 4. Image detail clearly showing saw-tooth ridges on the leading edge of the forewing of a male Green Emperor, *Anax gibbosulus*. Each ridge is about 150 µm long. The structure in the upper central part of this photo is the nodus. This wing was photographed at a resolution of 1357 pixels per centimetre. Many dragonfly and damselflies have microstructure on their wing veins clearly visible in this set of high-resolution photographs.

Results

Presentation of images

All images have been published online on open access platforms:

1 On *figshare*, images can be viewed individually or downloaded as a series (Tann, 2020a–e).
2 On *Flickr*, each wing image is accompanied by a caption. Other metadata for each image, such as specimen location on a map, tags, comments, and a link to the collection data, are shown on each page (Tann, 2017a,b).
3 On *Wikimedia Commons*. *Wikipedia* in turn displays wing images on the content page of each Australian dragonfly and damselfly (see, for example, Wikipedia, 2020).
4 On the *Atlas of Living Australia* as a Dataset Resource. Wing images and specimen images are readily viewable as a collection (Tann, 2020f).

Image sets are presented as two sub-sets, Anisoptera or dragonflies proper, and Zygoptera, or damselflies.

Metadata

Images hold extensive embedded metadata:

1 Metadata associated with the camera and photograph—embedded as Exif metadata

2 Metadata about the specimen—embedded as IPTC metadata[4]
- Registration number
- Institution
- Taxonomic name, according to the Australian Faunal Directory (2020)
- Georeference, extracted from any occurrence data held by the *Atlas of Living Australia*[5]
- Sex

3 Title and caption metadata—embedded as IPTC metadata. Caption information includes common name, taxonomic name, collection and specimen registration number.

4 Additional metadata enabling image-filtering are embedded as keywords:
- Sex
- Country
- Taxonomy
- Image descriptors

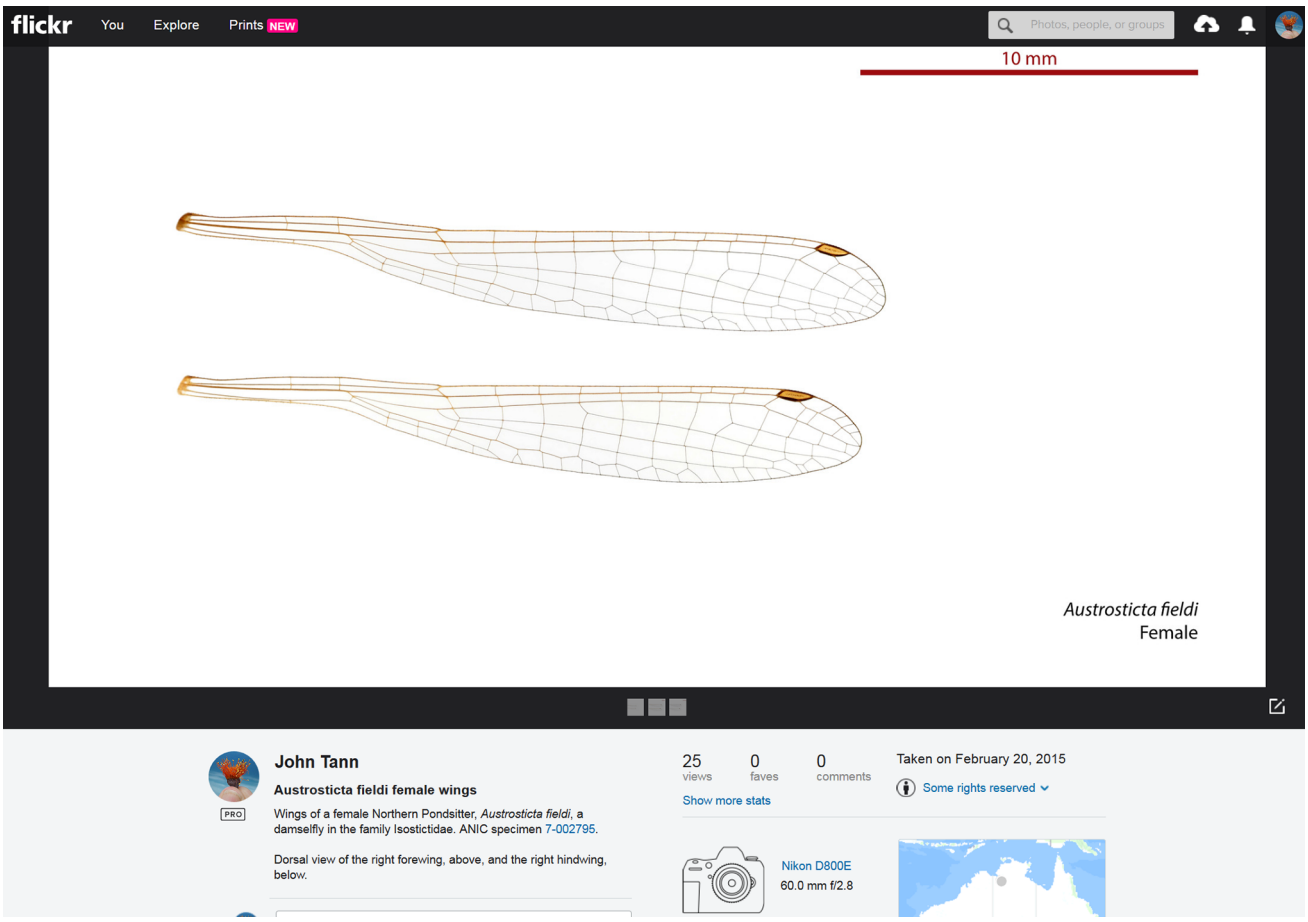


Figure 5. Example of a Flickr image with caption. The registration number link takes the user to its occurrence record on the *Atlas of Living Australia*.

Links

Due to the efforts of museum staff in the past, occurrence data for a large number of museum dragonfly and damselfly specimens in Australia is publicly accessible through the *Atlas of Living Australia* (*ALA*).[6] *ALA* occurrence records for specimens used in this project are linked in the Index (Tann, 2020e, see also Appendix 3 and 4).

On the *figshare* platform male and female wing images of each species are published with a DOI, a *digital object identifier.* A DOI is also a *persistent object identifier* offering a degree of permanence[7]. Full-size images of wings and their reference specimens on *figshare* are linked in a large published table: the *Index* (Tann, 2020e).

Discussion

Why remove the wings?

In order to capture consistently high-quality images, in a single, shallow, plane of view, a wing needed to be photographed separated from its body. Having an insect body, another wing, or a leg obstructing the field of view or casting shadow are undesirable visible artefacts. Wings are preserved with their relevant specimen after photography.

Visual artefacts

For those pinned specimens which had wings that could not be removed, a temporary rig was made to minimize visual interference.

The effect of the body shadow could be reduced by changing the object height above its background. However, with increasing height the white background changed to grey, with a consequent loss of image fidelity and consistency.

Insect specimens in museums are stiff, brittle and fragile; their long-term preservation, intact and undamaged, is of obvious and great importance. On rare occasions, however, when a surplus of conspecific specimens are at hand, or when the significance of the knowledge likely to be gained is great, will a curator allow dissection or manipulation of a specimen. Such procedures are conditional upon every effort being made to secure all removed fragments or body parts so that they may be preserved with the host body in collections. The technique of wing analyses by high-resolution photography results in the removal, but not the loss, of wings.

Odonata legs, heads and abdomens break easily. Wings cannot be bent and legs cannot be pushed aside without damage.

Wing flatness

Dragonfly and damselfly wings are not absolutely flat. Wings with irregular, undulating surfaces were sandwiched between two glass plates a few millimetres apart to achieve a more-or-less flat plane. This technique allowed uneven features to be imaged without crushing the wing. This method was, however, impractical on those occasions when wings could not be removed from their bodies.

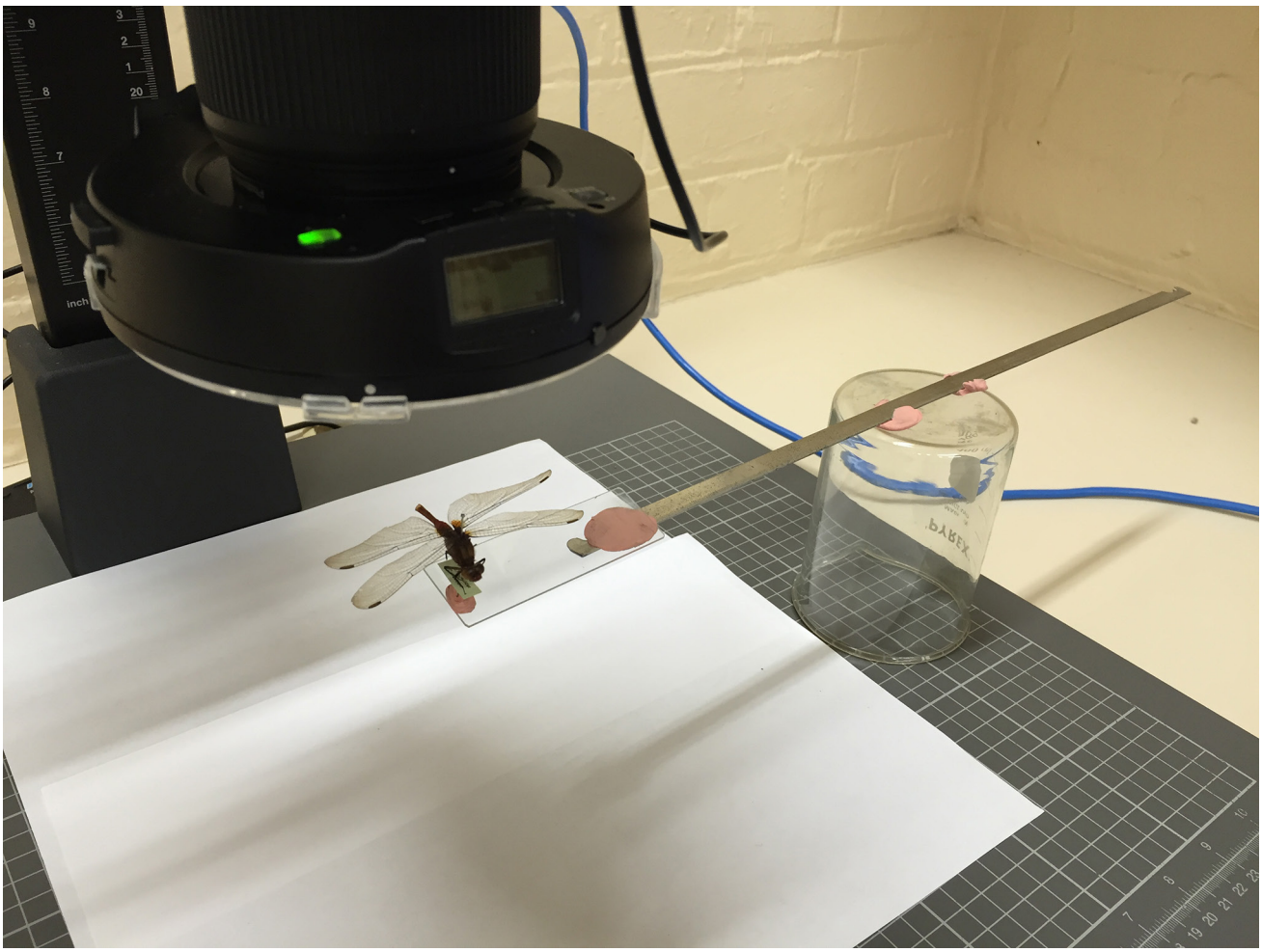


Figure 6. Photographic set-up for dragonfly and damselfly wings where the wings remained attached to their pinned body. The rig itself did not create obvious visual artefacts.

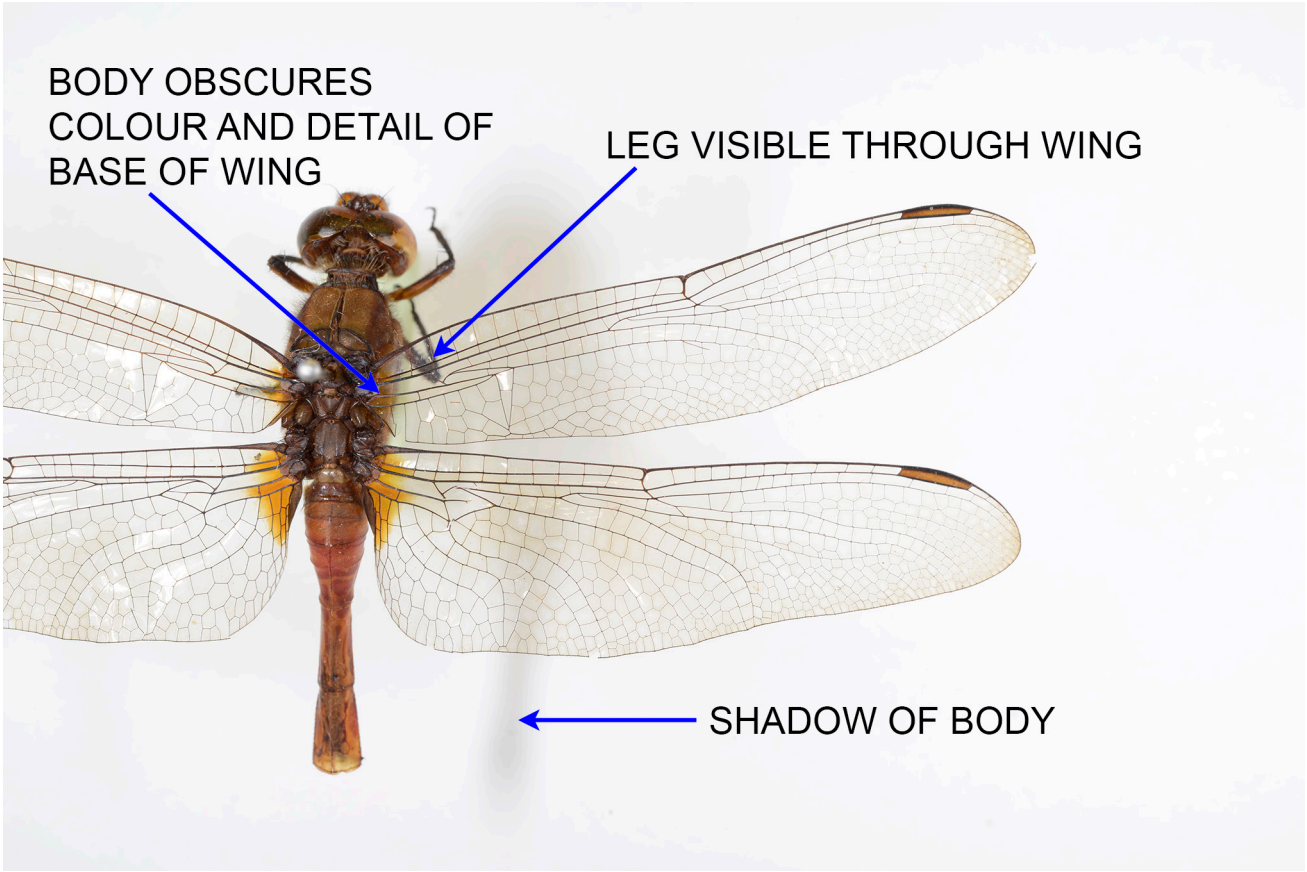


Figure 7. Photo showing three artefacts when a wing remains attached to its body.

Figure 8. Male *Austrophlebia subcostalis*, a large dragonfly with wings that are not flat. Details are lost when photographing unflattened wings. Note also for this specimen that the two right wings do not lie in the same plane; see section: *Overlapping and out-of-plane wings*.

Overlapping and out-of-plane wings

Dragonfly and damselfly specimens are sometimes pinned with their wings overlapping. For those specimens, a clear wing photo was impossible.

Some dragonflies and damselflies had been pinned with their wings lying in different planes (see, for example, the photo of *Austrophlebia subcostalis,* Fig. 8). To reproduce a wing shape accurately, a photograph was always taken orthogonal to the wing plane. Unfortunately, out-of-plane wings would sometimes overlap in a photograph, making the resulting photograph unacceptable for this project.

Photoshop as a surrogate for a good photograph

Photoshop, or other image processing software, could be used to improve substandard images. With effort, some shadowing could be lightened, some artefacts could be covered over, and some flaws repaired. However, Photoshop had difficulty when colours were similar, such as distinguishing wing veins from body colour, and could not, of course, resurrect features hidden by another shape.

It was important that the complete dataset of dragonfly and damselfly wing images offered here be accurate and faithful reproductions of real wings. As such this image-dataset provides the basis of a detailed image-analysis research project. Using Photoshop to *fill in the blanks*, and estimate colours, shades, and subtle features was considered to be not good practice. In the course of this project about 10 specimens were photographed with their wings attached. Due to the extra difficulties of working with attached wings, each specimen took about half a day to photograph and two full days processing with Photoshop to produce a less-than-optimal result. Early in this project it became clear that in order to produce a satisfactory photograph, wherever possible wings would need to be removed.

Nonetheless all wing images were manipulated to a greater or lesser extent by *Photoshop* and *Lightroom*. *Lightroom,* being the last software to alter the image, is mentioned in the image metadata.

Figure 9. Damselfly pinned with its wings overlapping.

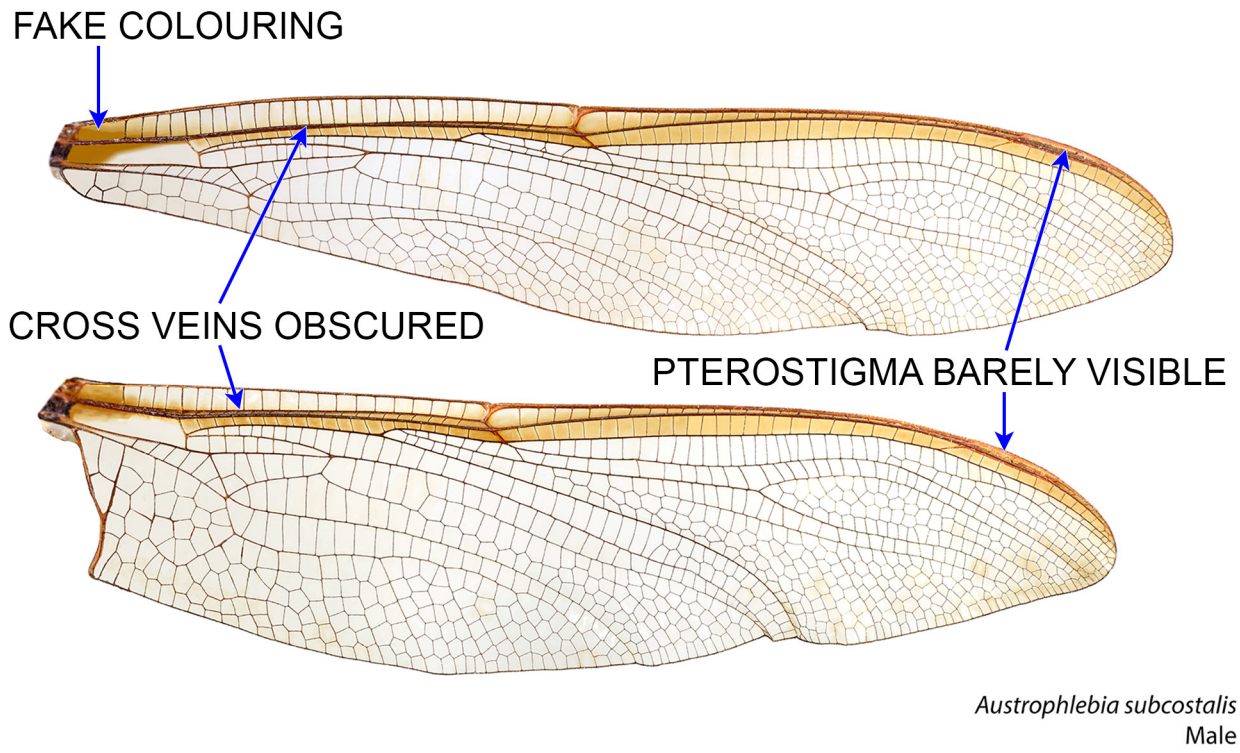


Figure 10. Processed image of wings photographed while still attached to a body. Parts of each wing were obscured. Extensive Photoshop treatment produced only a second-class image and introduced artefacts of shade and colour not apparent in the specimen.

Acknowledgements. This project was undertaken in the Entomology department of the Australian Museum with access to its extensive collection of Australian Odonata. Photographic equipment was provided through the DigiVol program at the museum thanks to Paul Flemons and Rhiannon Stephens. Entomology staff were always helpful, and a big appreciation goes to Jacquie Recsei, Russell Cox, Derek Smith and Shane McEvey for their advice, assistance and support.

Other museums and collections contributed specimens to this project. Thanks should go to Beth Mantle, Nicole Fisher and David Yeates at Australian National Insect Collection, Nik Tartanic at Western Australian Museum, Susan Wright at Queensland Museum and Gavin Dally at Museum and Art Gallery of the Northern Territory.

Endnotes

1 Complete set of wing images reduced in size for publication in Appendixes 1 and 2, also available at full size on *figshare* (Tann, 2020c,d)

2 Complete set of scaled wing images available on *figshare* (Tann, 2020a,b)

3 The *Australian Faunal Directory*, *AFD*, is a catalogue of taxonomic information about all animal species known to occur in Australia. It includes the nomenclature and taxonomy of species including valid names (AFD, 2020).

4 An IPTC header follows a metadata standard for images. It has been defined by the International Press Telecommunications Council, a global standards body for news media.

5 The *Atlas of Living Australia* (*ALA*) is an online repository for sharing information about Australian plants and animals.

6 In 2020 the *Atlas of Living Australia* held about 40,000 museum records of Odonata (*ALA*, 2020).

7 A Digital Object Identifier (DOI) is a persistent identifier for use on digital networks. It has a degree of permanence and promotes better interoperability across science now and into the future (DOI, 2020).

References

AFD. 2020. *Australian Faunal Directory*. [Accessed July 2020]. https://biodiversity.org.au/afd/home

ALA. 2020. *Atlas of Living Australia*. [Accessed July 2020]. https://www.ala.org.au/

Creative Commons. 2020. [Accessed July 2020]. https://creativecommons.org/

DigiVol. 2020. [Accessed July 2020]. https://australian.museum/get-involved/citizen-science/digivol/

DOI. 2020. [Accessed July 2020]. https://www.doi.org/

Flickr. 2020. *Flickr*. [Accessed July 2020]. https://www.flickr.com/

Harvey, P. 2020. *ExifTool*. [Software]. Retrieved from *metacpan.org*. https://metacpan.org/pod/distribution/Image-ExifTool/exiftool

iNaturalist. 2020. *iNaturalist*. [Accessed July 2020]. https://www.inaturalist.org/

Mantle, B.L., J. La Salle and N. Fisher. 2012. Whole-drawer imaging for digital management and curation of a large entomological collection. *ZooKeys* 209: 147–163. https://doi.org/10.3897/zookeys.209.3169

Salcedo, M. K., J. Hoffmann, S. Donoughe, and L. Mahadevan. 2019. Computational analysis of size, shape and structure of insect wings. *Biology Open* 2019 8: bio040774. https://doi.org/10.1242/bio.040774

Stewart, W. E. 1982. An analysis of geographic variation of the adults of the Australian genus *Diphlebia* Selys (Odonata: Amphipterygidae). *Australian Journal of Zoology* 30(3): 433–460. https://doi.org/10.1071/ZO9820435

Tann, J. 2017a. *Dragonfly wings*. [Accessed July 2020]. https://www.flickr.com/photos/31031835@N08/albums/72157684642873975

Tann, J. 2017b. *Damselfly wings*. [Accessed July 2020]. https://www.flickr.com/photos/31031835@N08/albums/72157684003991555

Tann, J. 2020a. Wings of Australian Odonata—Volume 1. Anisoptera. https://doi.org/10.6084/m9.figshare.11845230

Tann, J. 2020b. Wings of Australian Odonata—Volume 2. Zygoptera. https://doi.org/10.6084/m9.figshare.12579959

Tann, J. 2020c. Wings of Australian Odonata—Volume 3. Anisoptera fixed scale. https://doi.org/10.6084/m9.figshare.12612038

Tann, J. 2020d. Wings of Australian Odonata—Volume 4. Zygoptera fixed scale. https://doi.org/10.6084/m9.figshare.12612041

Tann, J. 2020e. Wings of Australian Odonata—Index. https://doi.org/10.6084/m9.figshare.11840013

Tann, J. 2020f. Wing images of Australian dragonflies. *Atlas of Living Australia Data Resource*, dr16455. [Accessed October 2020]. https://collections.ala.org.au/public/showDataResource/dr16455

Theischinger, G., J. Hawking, and A. Orr. 2021. *The Complete Field Guide to Dragonflies of Australia*. Second edition. Melbourne: CSIRO Publishing. ISBN 978-1-48-631374-7

Tillyard, R. J. 1917. *The Biology of Dragonflies (Odonata or Paraneuroptera)*. Cambridge Zoological Series. Cambridge. University Press. [Accessed through Biodiversity Heritage Library, July 2020]. https://doi.org/10.5962/bhl.title.35170

Trueman, J. 2001. Evolutionary riddles. In *Dragonflies of the World*, ed. J. Silsby, pp. 185–190. Collingwood: CSIRO Publishing. ISBN 978-0-64-310087-9

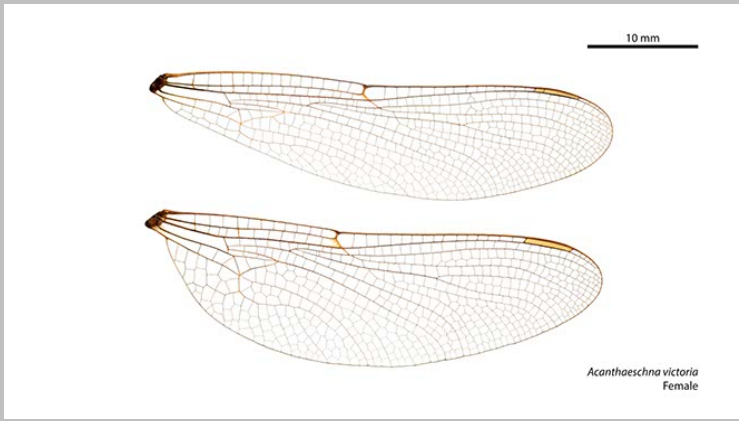
Wikipedia. 2020. *Diphlebia euphoeoides*, an example of use of, and accessibility to, images of this project. [Accessed July 2020]. https://en.wikipedia.org/wiki/Diphlebia_euphoeoides

Appendix 1—Anisoptera wings

Photographs of female and male wings of 207 species of Australian dragonfly (Anisoptera). Each image shows a pair of right wings, a scale, a taxonomic name and sex. A link is provided in Appendix 3 to a high-resolution photograph for each species.

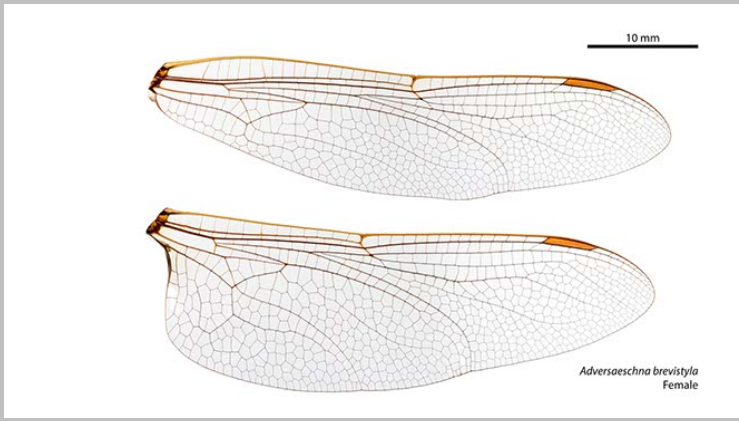
Images presented below are low resolution "thumbnails" providing a visual ready-reckoner and quick guide to more detailed imagery. The entire photographic library at highest resolution is openly accessible to view or download from *figshare* as either individual images or as a complete set of Australian Odonata wing images (Tann, 2020a–d).

With few exceptions all images are presented here at a consistent fixed scale for ready comparison between species. However, in order to present both the smallest and largest wings conveniently, the wings of six species of the largest Australian dragonflies are shown at a reduced scale, recognizable by a blue scale bar.

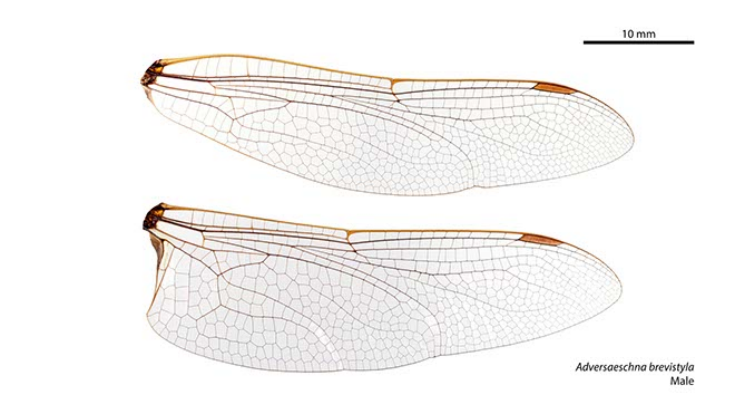


Acanthaeschna victoria female

Acanthaeschna victoria male



Adversaeschna brevistyla female



Adversaeschna brevistyla male

Aethriamanta circumsignata female

Aethriamanta circumsignata male

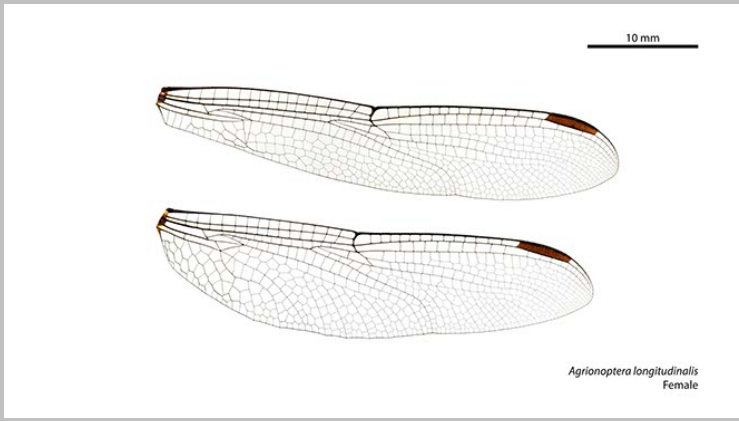
Aethriamanta nymphaeae female

Aethriamanta nymphaeae male

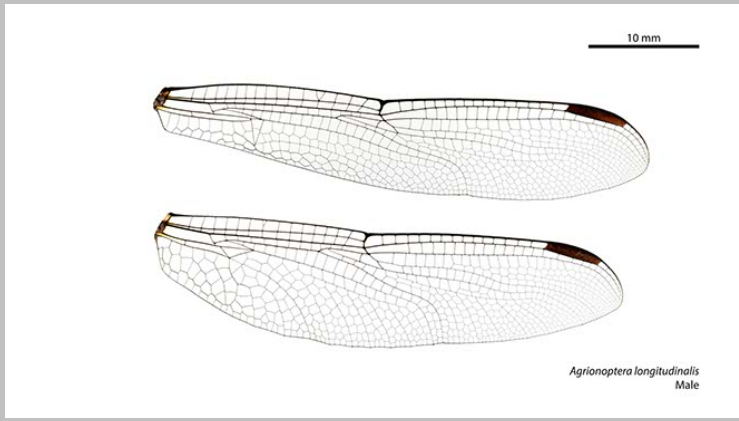
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Agrionoptera insignis female

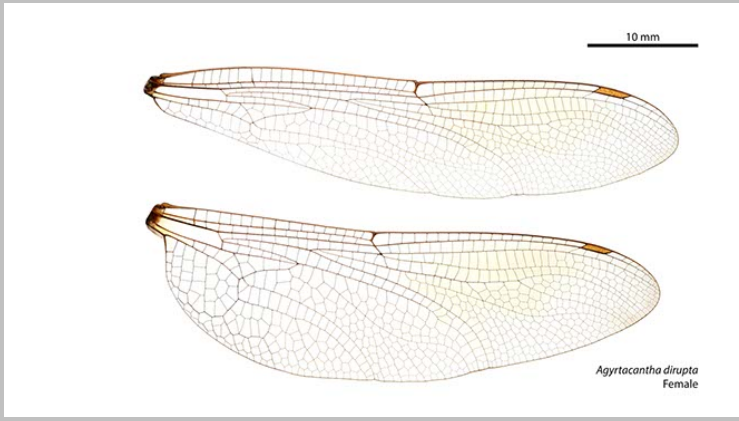
Agrionoptera insignis male



Agrionoptera longitudinalis female

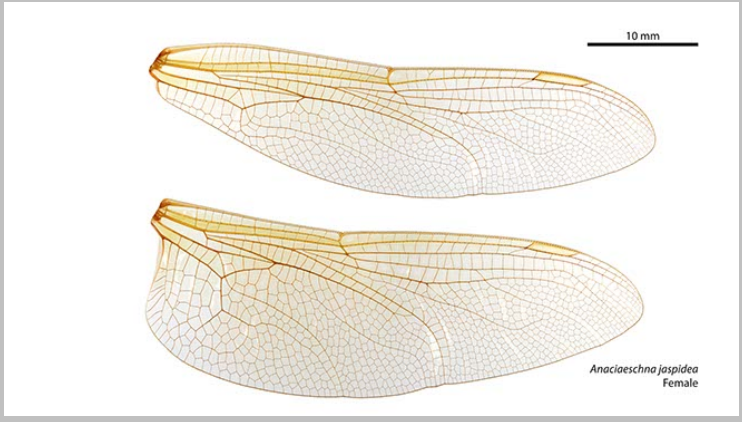


Agrionoptera longitudinalis male



Agyrtacantha dirupta female

Agyrtacantha dirupta male

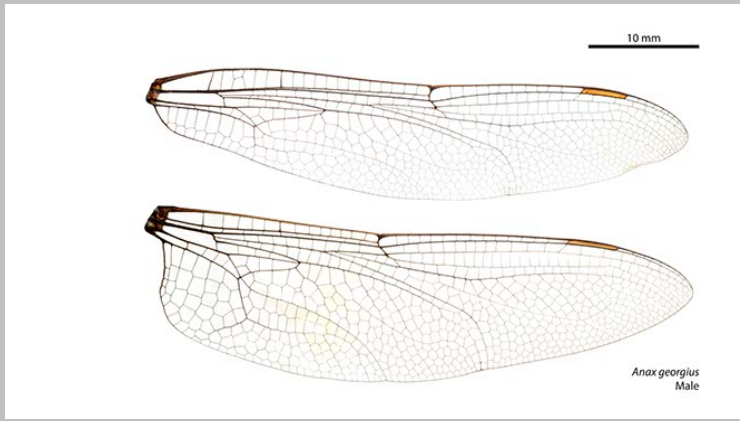


Anaciaeschna jaspidea female

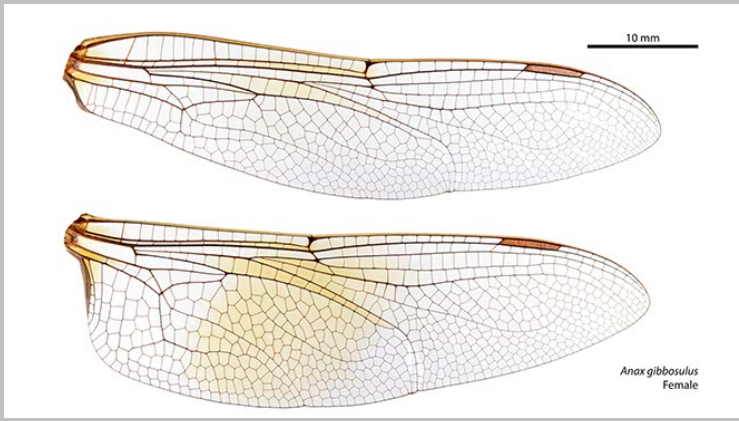
Anaciaeschna jaspidea male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

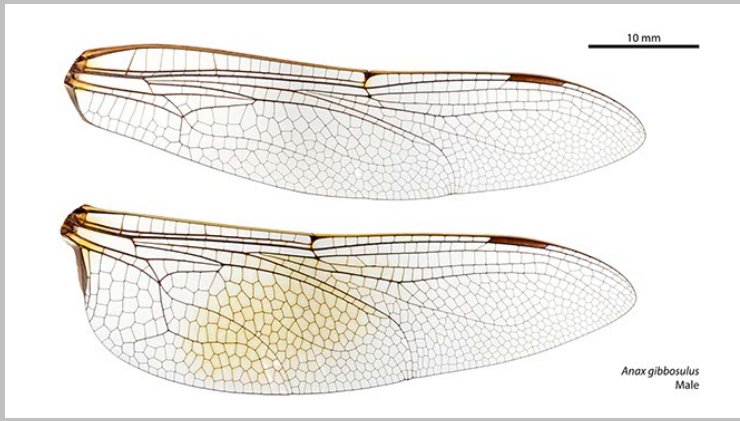
Anax georgius female



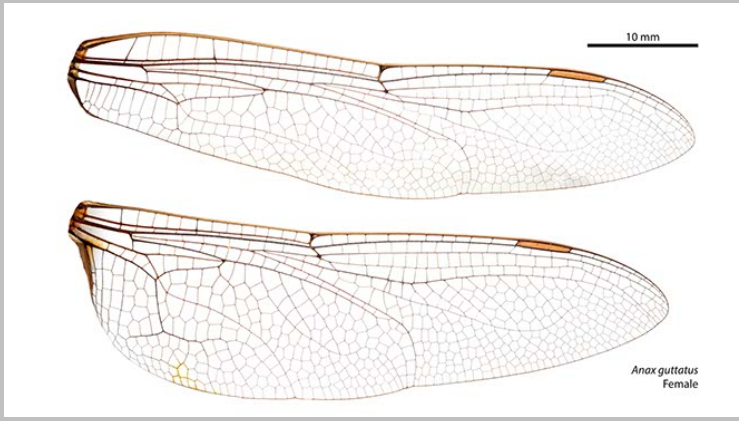
Anax georgius male



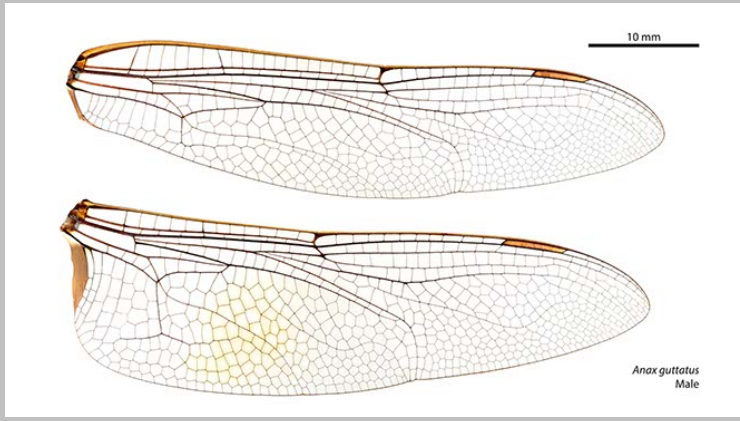
Anax gibbosulus female



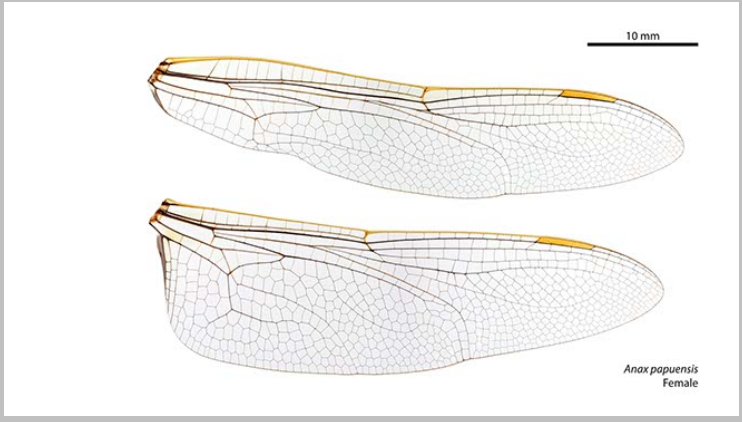
Anax gibbosulus male



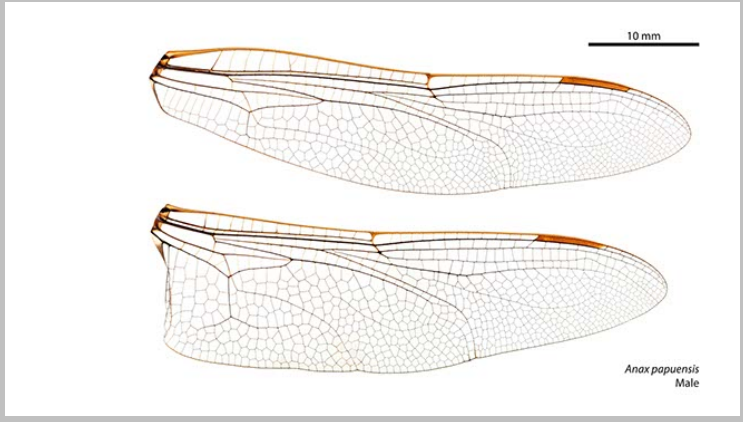
Anax guttatus female



Anax guttatus male



Anax papuensis female



Anax papuensis male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Antipodogomphus acolythus female

Antipodogomphus acolythus male

Antipodogomphus dentosus female

Antipodogomphus dentosus male

Antipodogomphus edentulus female

Antipodogomphus edentulus male

Antipodogomphus hodgkini female

Antipodogomphus hodgkini male

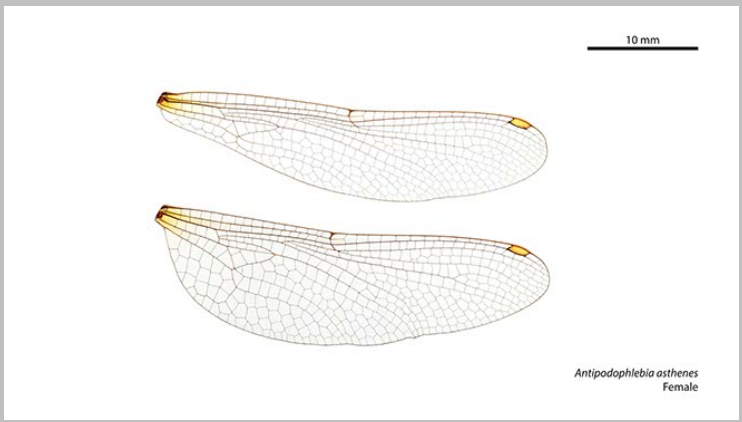
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Antipodogomphus neophytus female

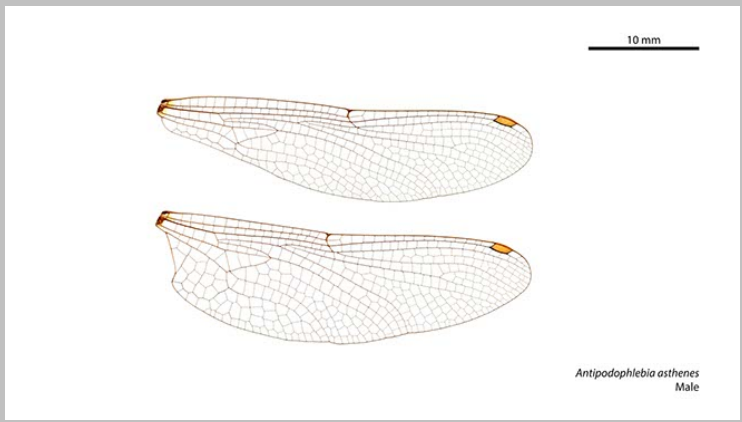
Antipodogomphus neophytus male

Antipodogomphus proselythus female

Antipodogomphus proselythus male



Antipodophlebia asthenes female

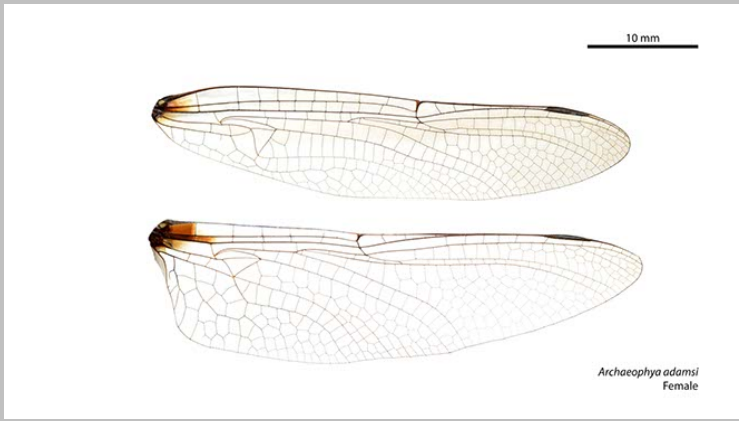


Antipodophlebia asthenes male

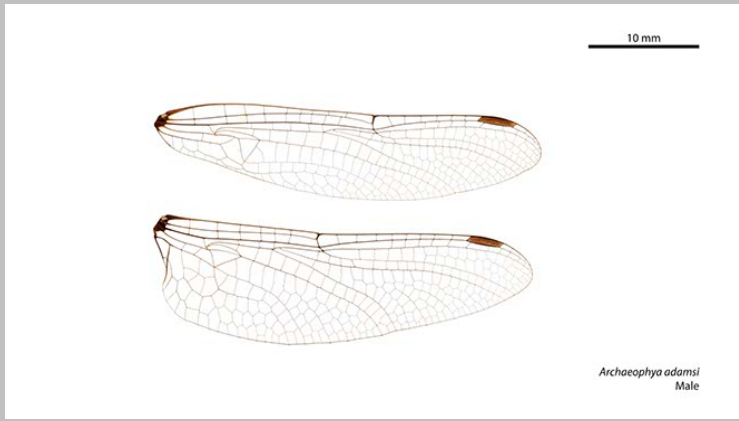
Apocordulia macrops female

Apocordulia macrops male

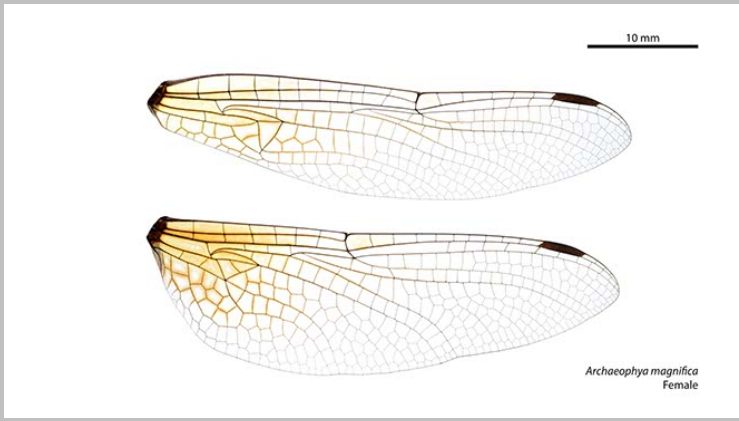
https://doi.org/10.3853/j.1835-4211.33.2021.1767



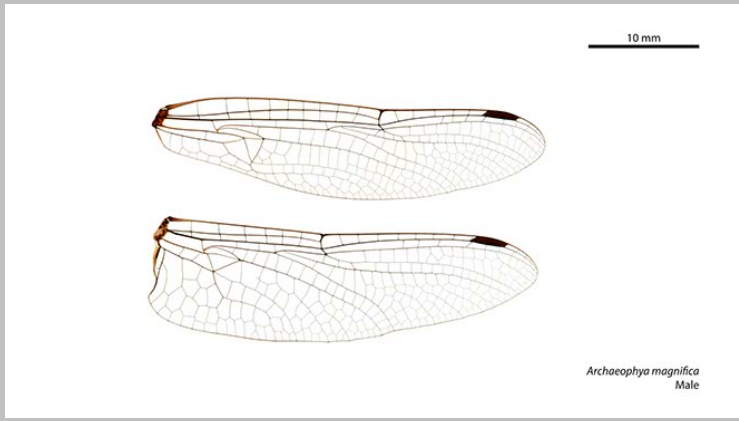
Archaeophya adamsi female



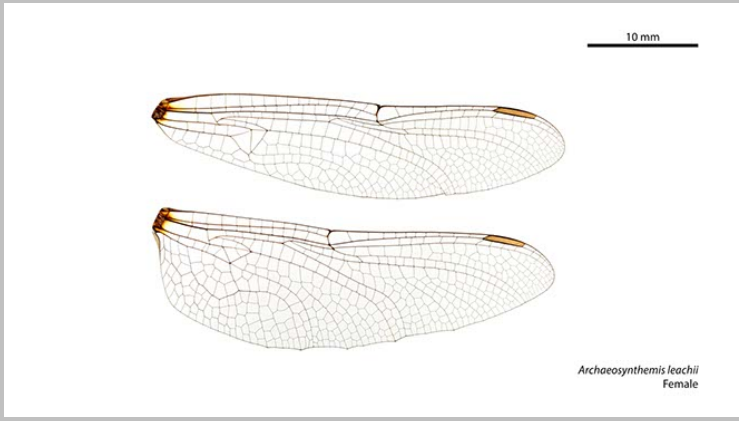
Archaeophya adamsi male



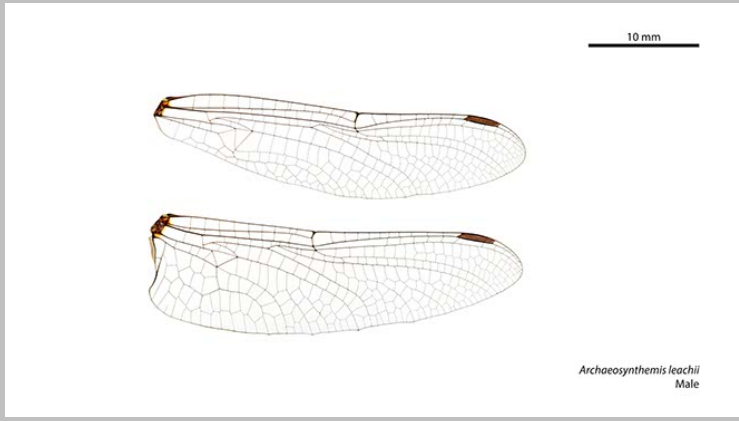
Archaeophya magnifica female



Archaeophya magnifica male

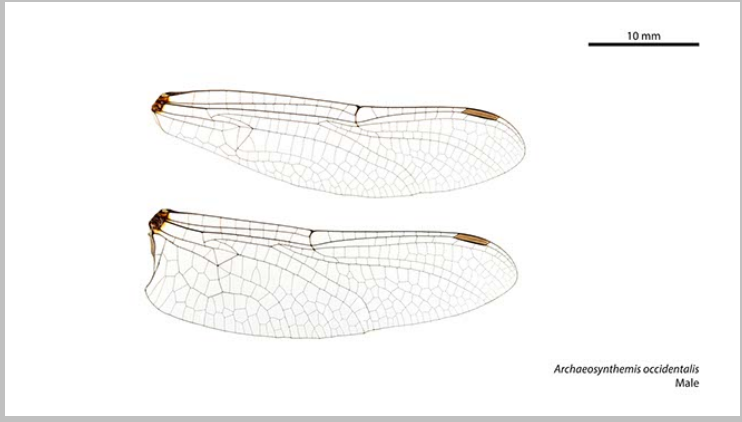


Archaeosynthemis leachii female



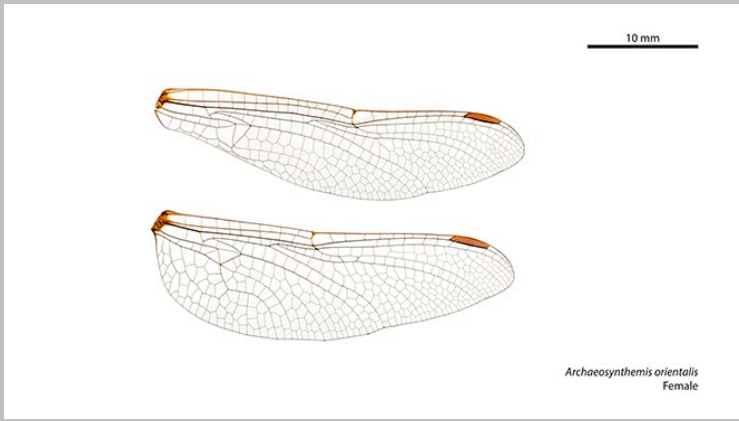
Archaeosynthemis leachii male

Archaeosynthemis occidentalis female

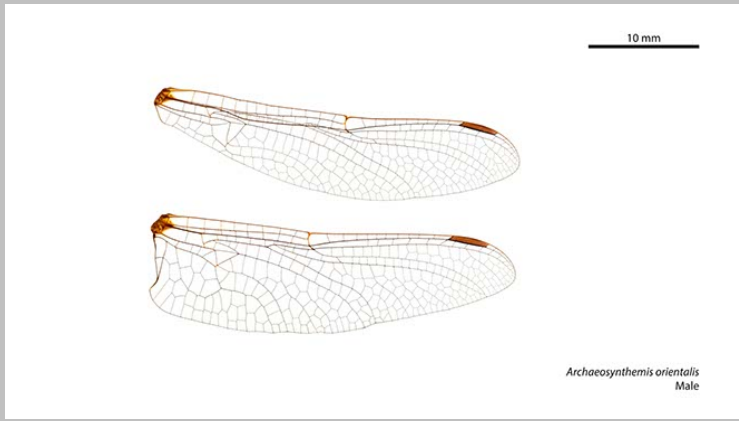


Archaeosynthemis occidentalis male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

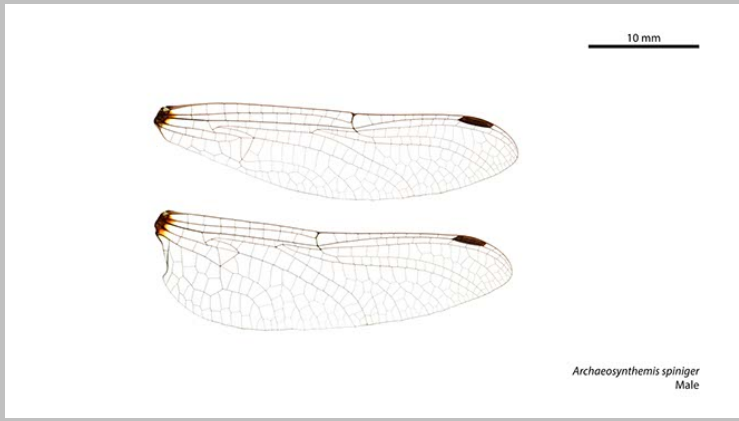


Archaeosynthemis orientalis female



Archaeosynthemis orientalis male

Archaeosynthemis spiniger female



Archaeosynthemis spiniger male

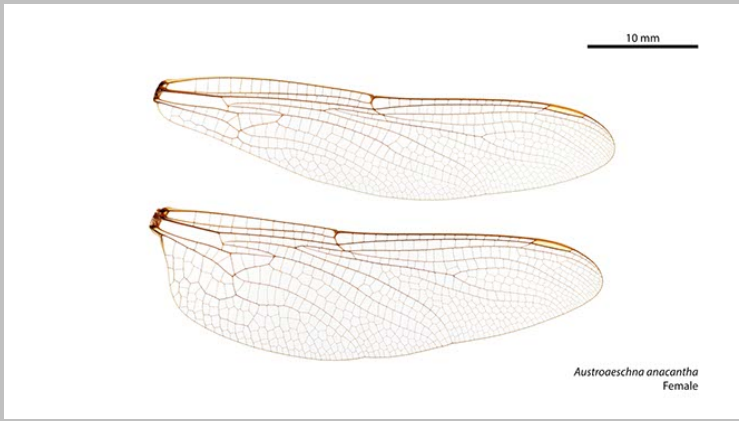
Archipetalia auriculata female

Archipetalia auriculata male

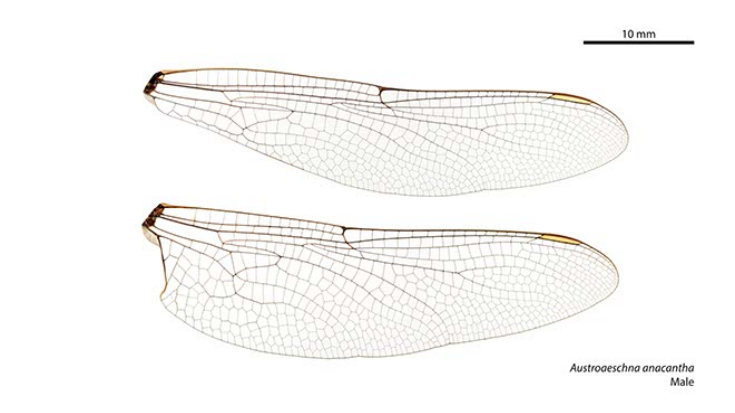
Armagomphus armiger female

Armagomphus armiger male

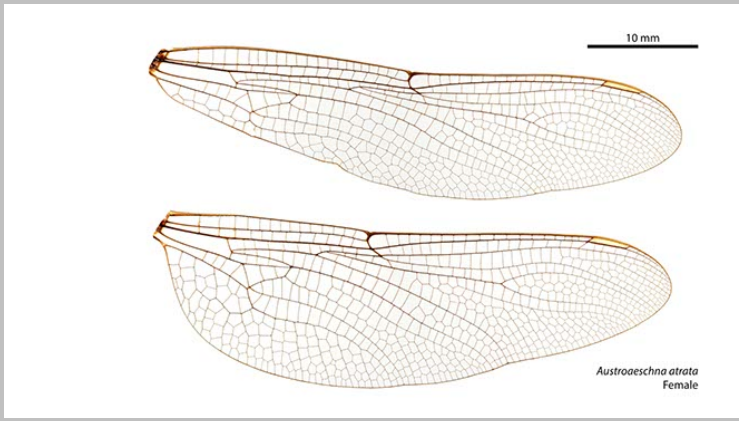
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



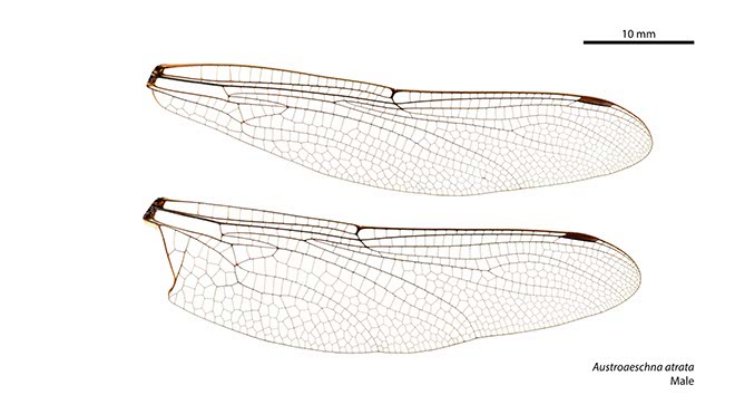
Austroaeschna anacantha female



Austroaeschna anacantha male

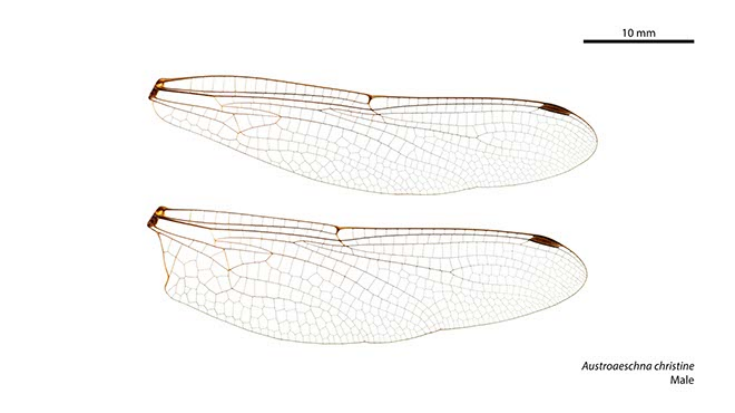


Austroaeschna atrata female

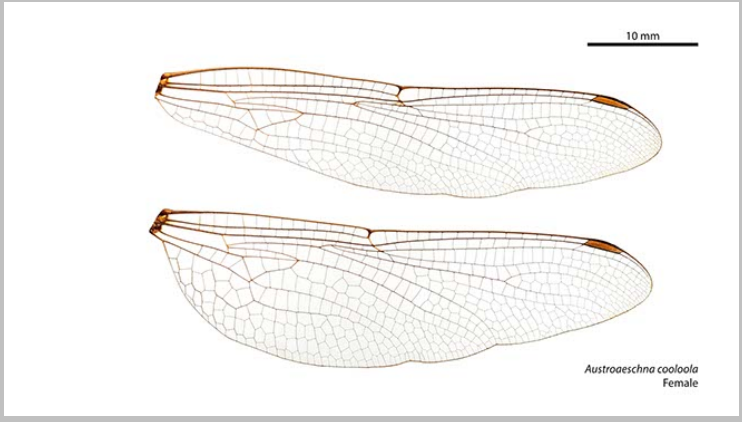


Austroaeschna atrata male

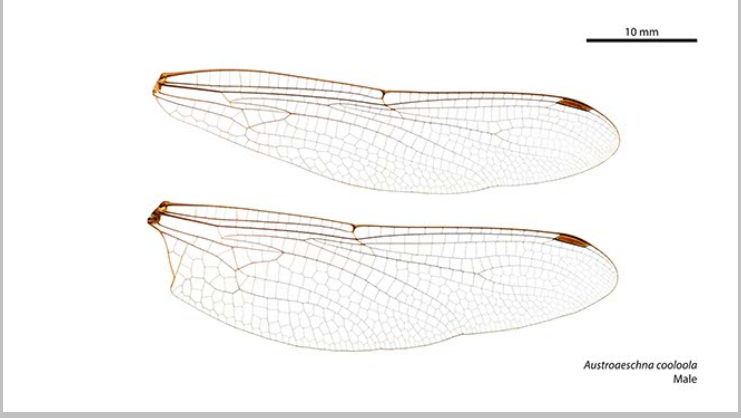
Austroaeschna christine female



Austroaeschna christine male

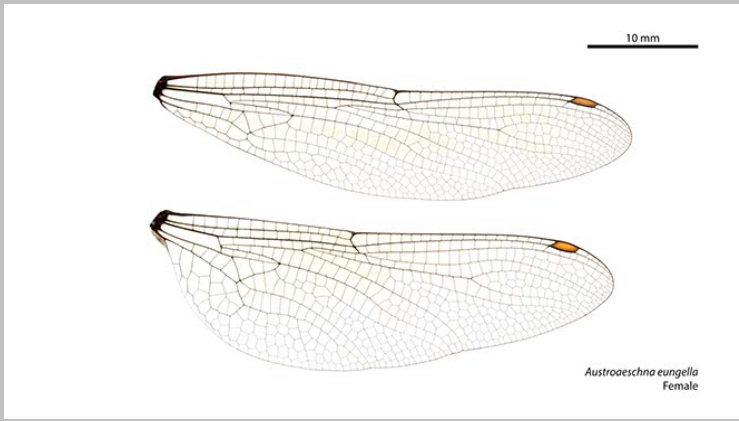


Austroaeschna cooloola female

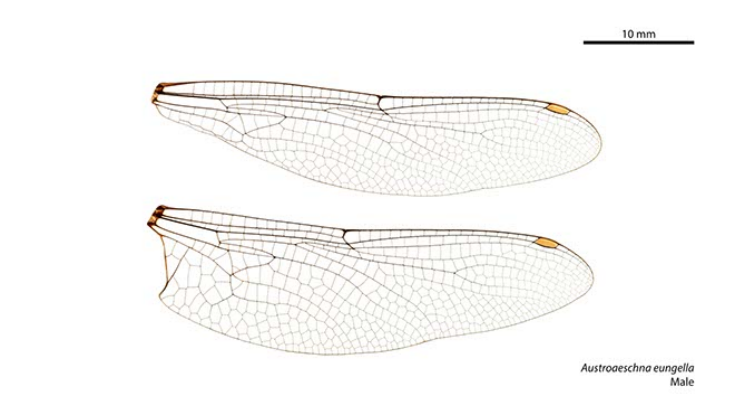


Austroaeschna cooloola male

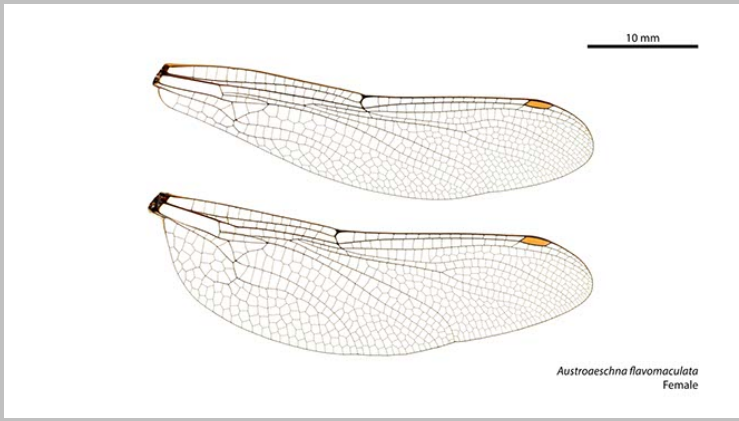
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



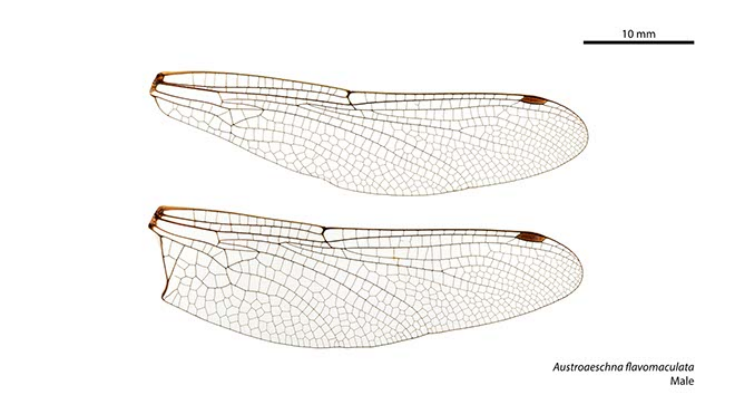
Austroaeschna eungella female



Austroaeschna eungella male

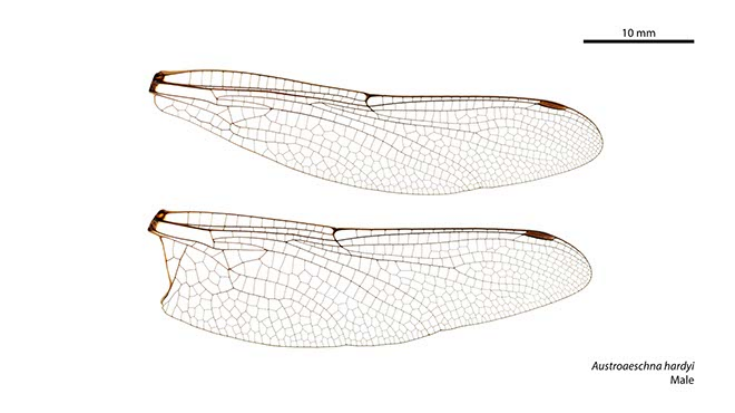


Austroaeschna flavomaculata female

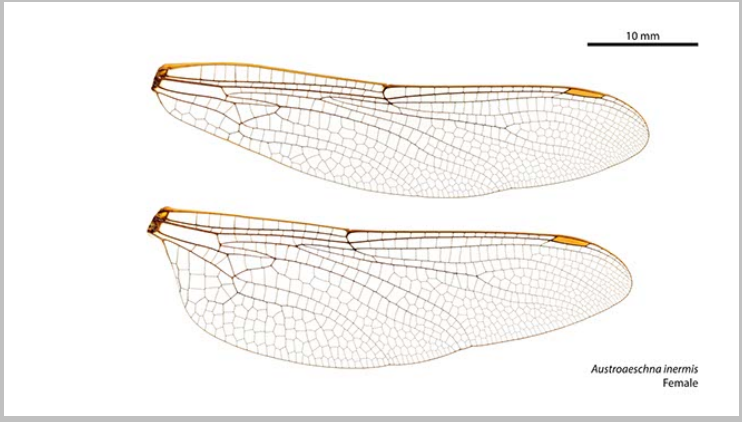


Austroaeschna flavomaculata male

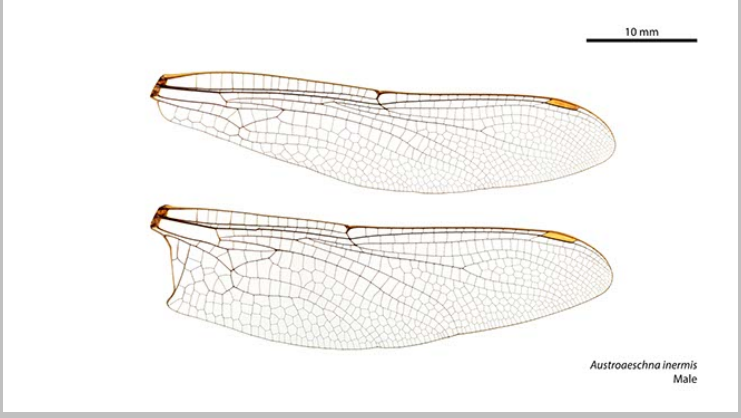
Austroaeschna hardyi female



Austroaeschna hardyi male



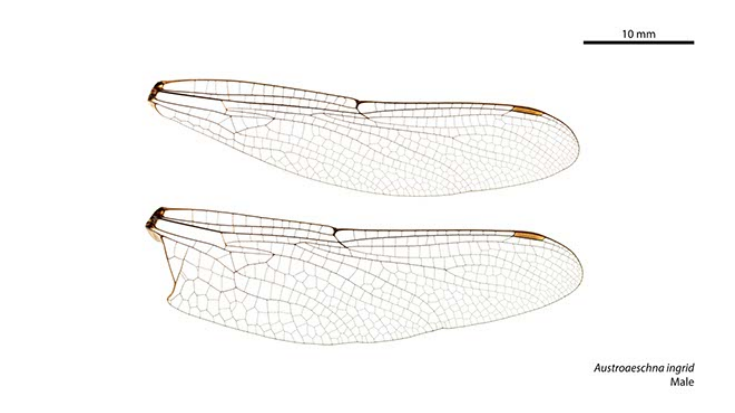
Austroaeschna inermis female



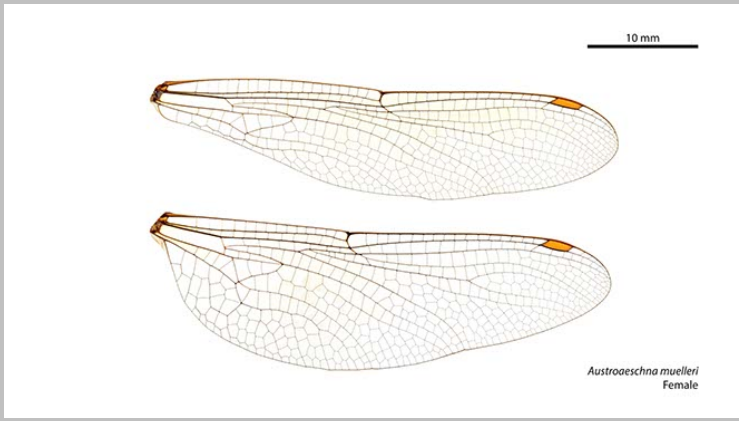
Austroaeschna inermis male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

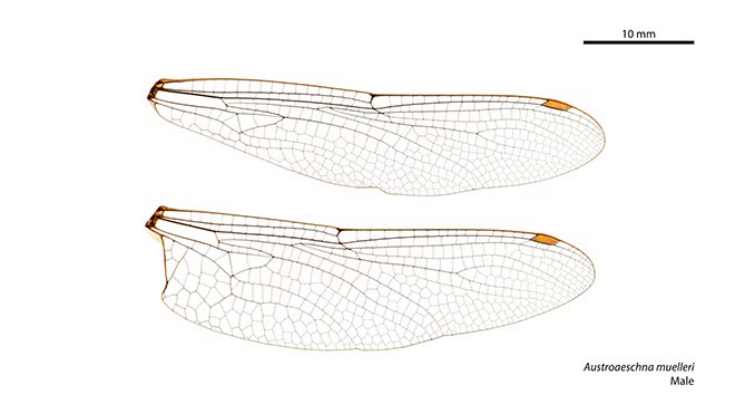
Austroaeschna ingrid female



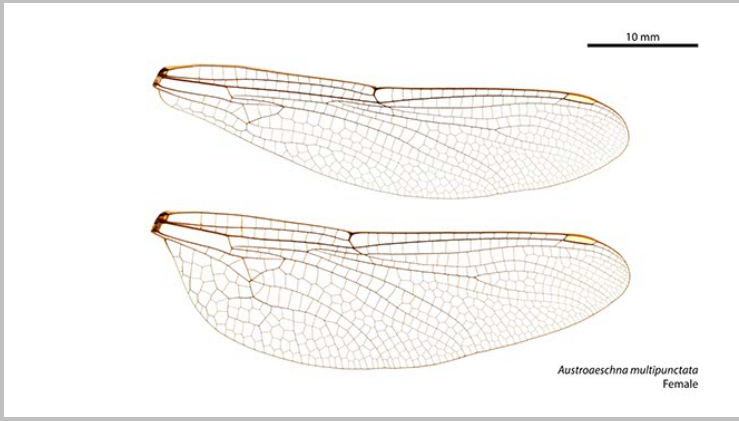
Austroaeschna ingrid male



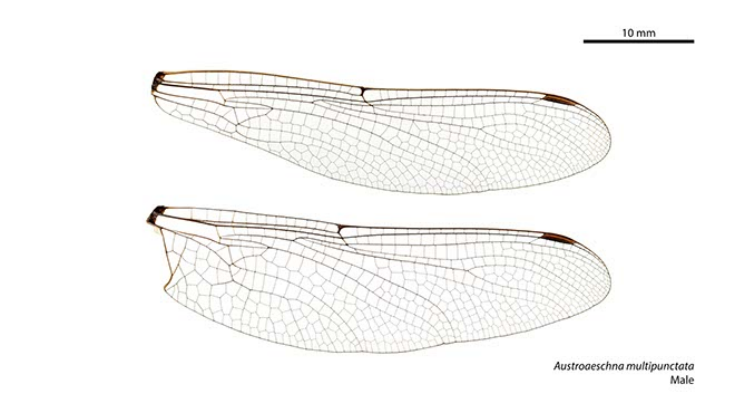
Austroaeschna muelleri female



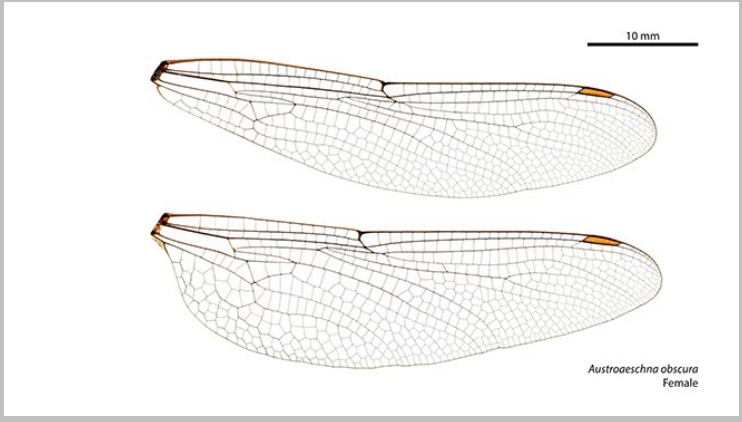
Austroaeschna muelleri male



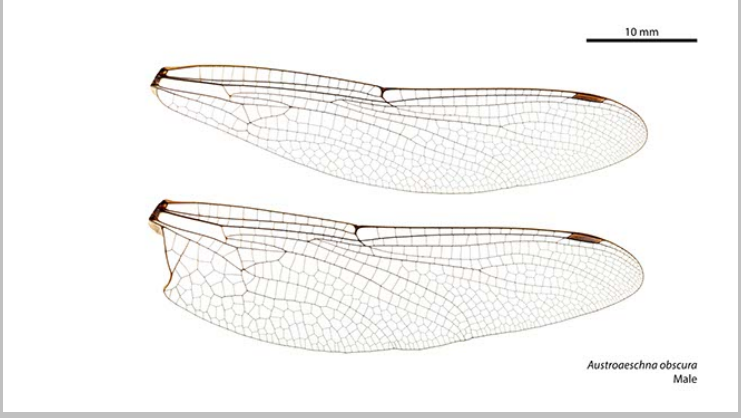
Austroaeschna multipunctata female



Austroaeschna multipunctata male

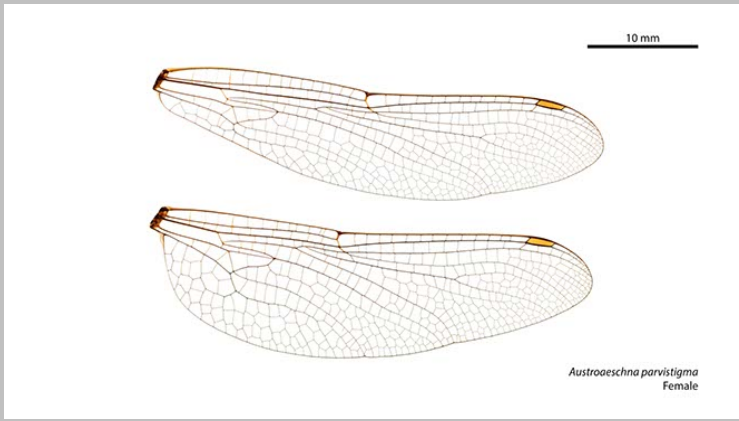


Austroaeschna obscura female

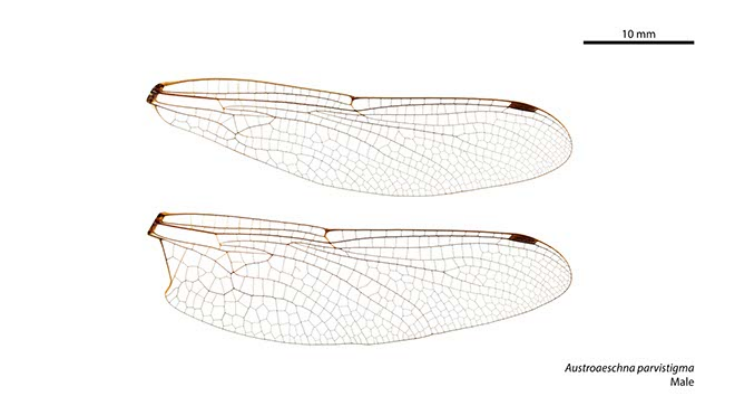


Austroaeschna obscura male

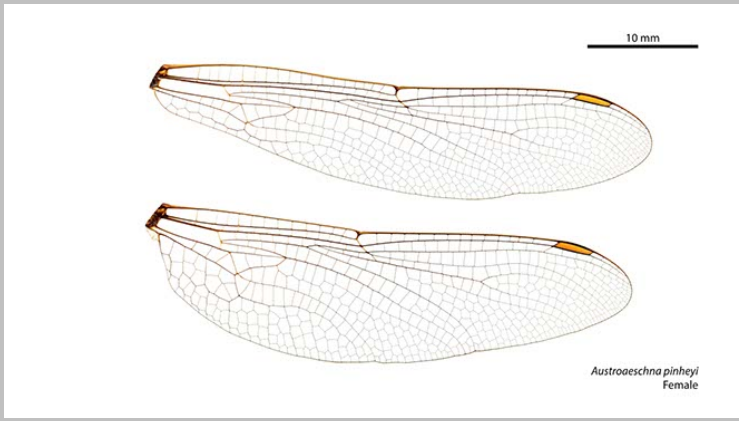
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



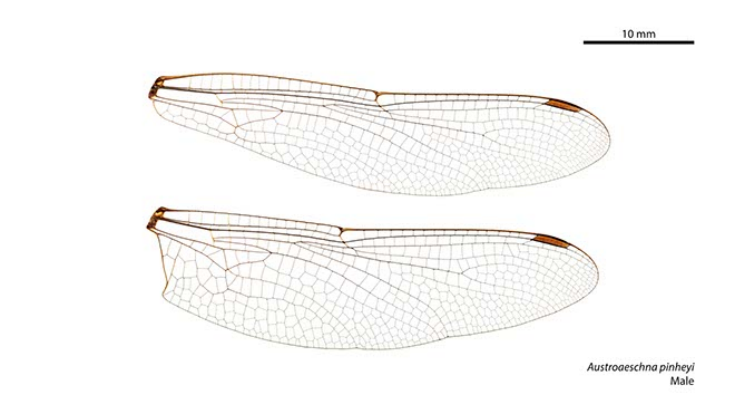
Austroaeschna parvistigma female



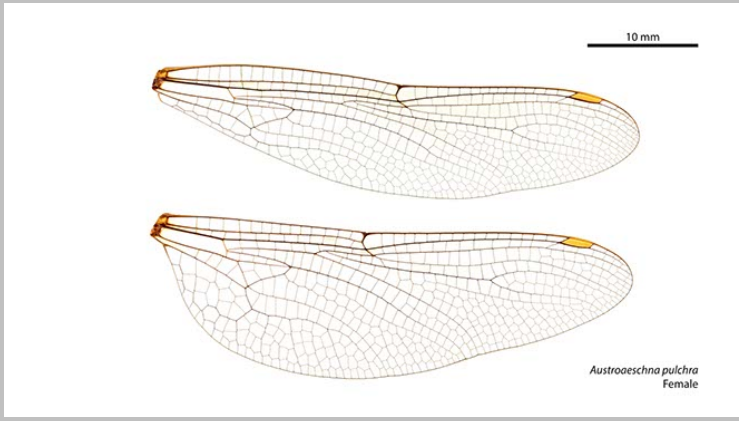
Austroaeschna parvistigma male



Austroaeschna pinheyi female

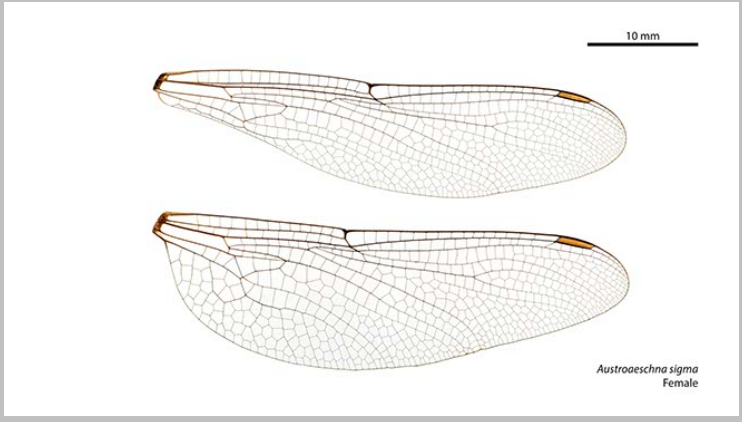


Austroaeschna pinheyi male

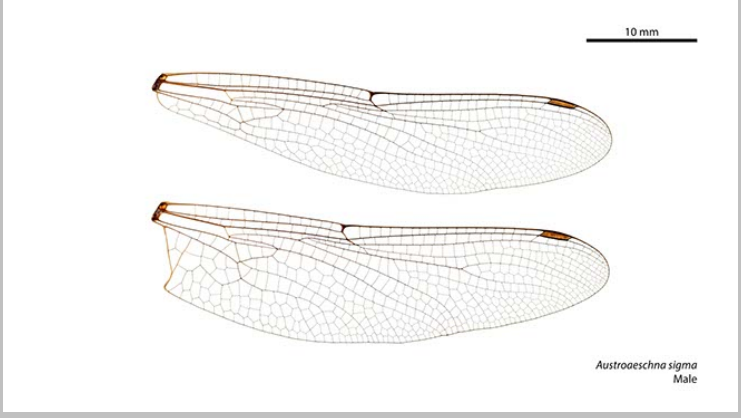


Austroaeschna pulchra female

Austroaeschna pulchra male



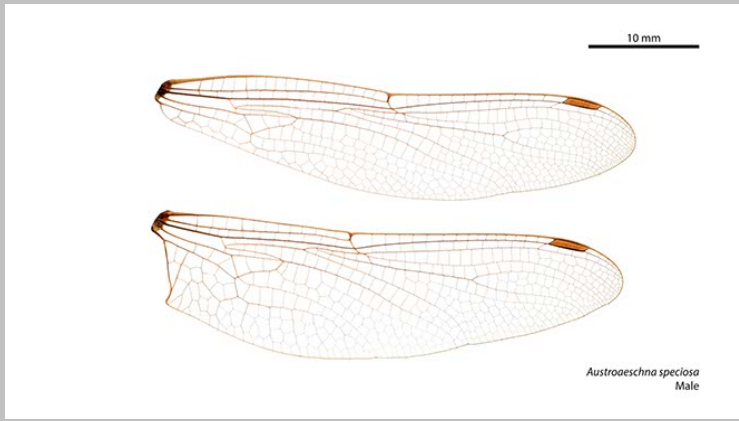
Austroaeschna sigma female



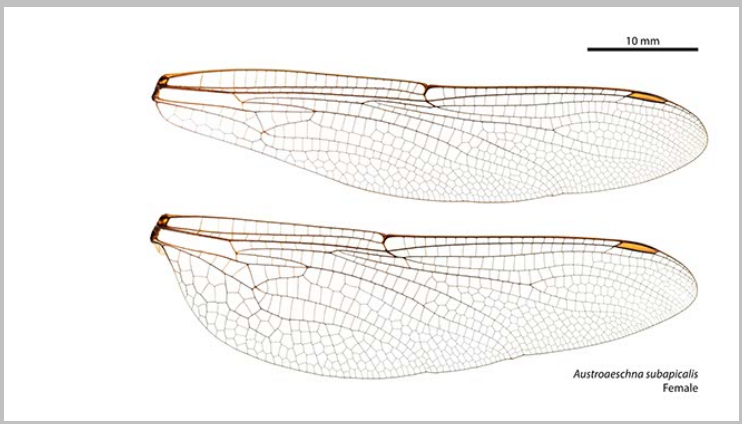
Austroaeschna sigma male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

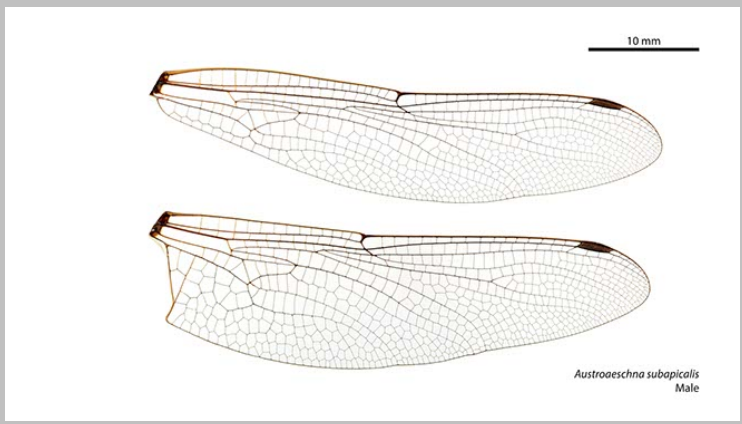
Austroaeschna speciosa female



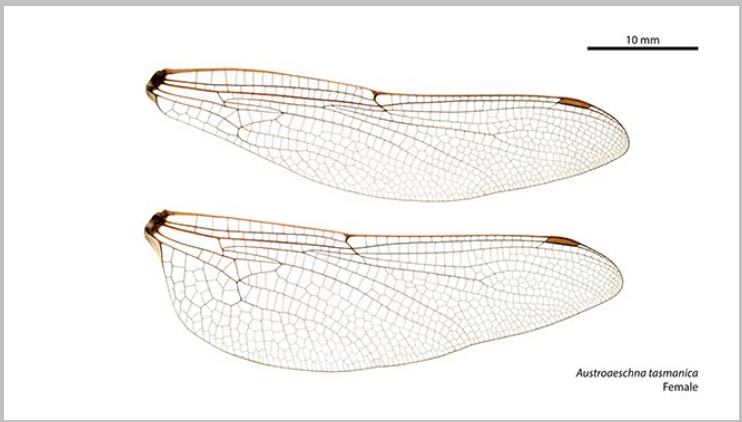
Austroaeschna speciosa male



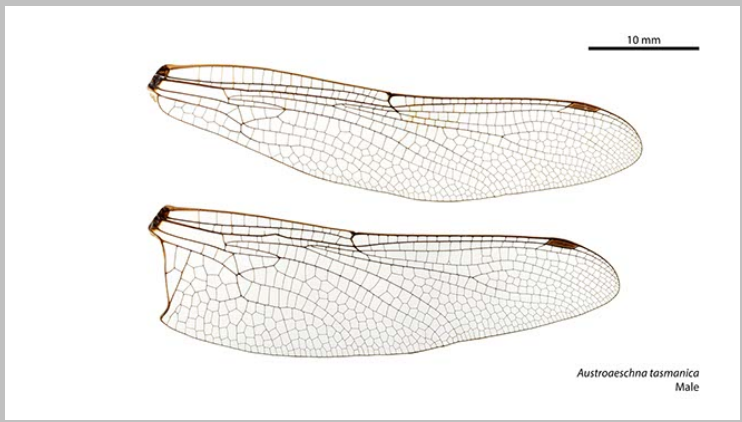
Austroaeschna subapicalis female



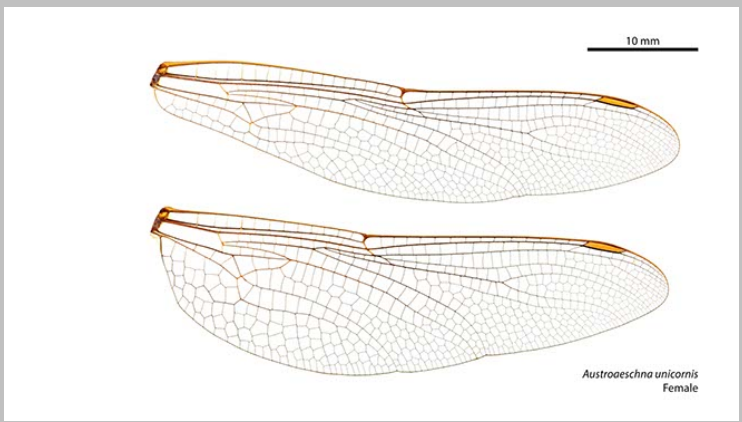
Austroaeschna subapicalis male



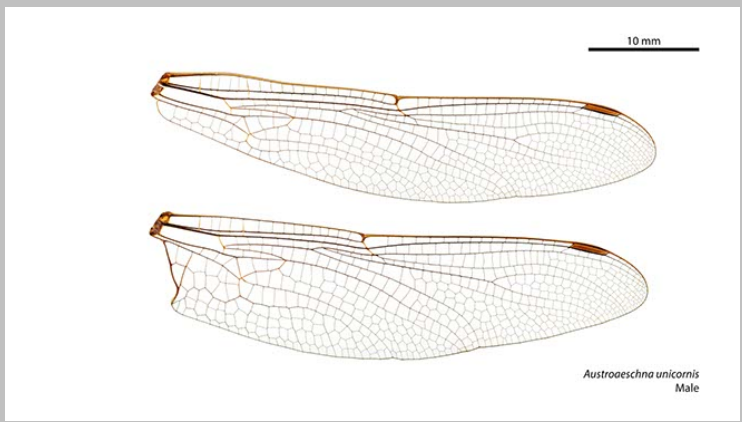
Austroaeschna tasmanica female



Austroaeschna tasmanica male



Austroaeschna unicornis female



Austroaeschna unicornis male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Austrocordulia leonardi female

Austrocordulia leonardi male

Austrocordulia refracta female

Austrocordulia refracta male

Austrocordulia territoria female

Austrocordulia territoria male

Austrogomphus amphiclitus female

Austrogomphus amphiclitus male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Austrogomphus angelorum female

Austrogomphus angelorum male

Austrogomphus arbustorum female

Austrogomphus arbustorum male

Austrogomphus australis female

Austrogomphus australis male

Austrogomphus bifurcatus female

Austrogomphus bifurcatus male

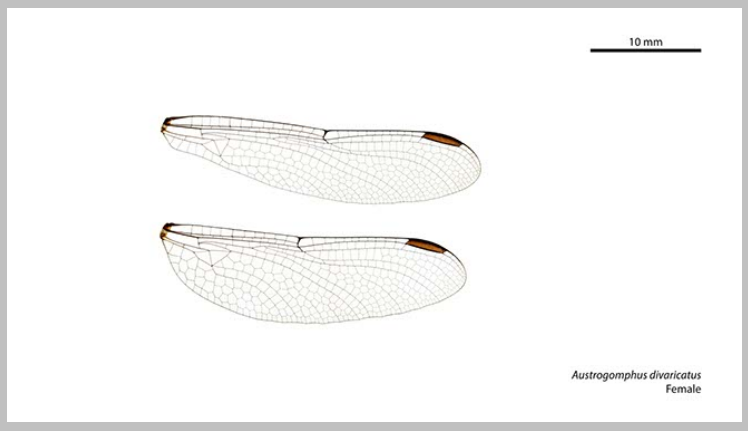
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Austrogomphus collaris female

Austrogomphus collaris male

Austrogomphus cornutus female

Austrogomphus cornutus male



Austrogomphus divaricatus female

Austrogomphus divaricatus male

Austrogomphus doddi female

Austrogomphus doddi male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Austrogomphus gordoni female

Austrogomphus gordoni male

Austrogomphus guerini female

Austrogomphus guerini male

Austrogomphus mjobergi female

Austrogomphus mjobergi male

Austrogomphus mouldsorum female

Austrogomphus mouldsorum male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Austrogomphus ochraceus female

Austrogomphus ochraceus male

Austrogomphus praeruptus female

Austrogomphus praeruptus male

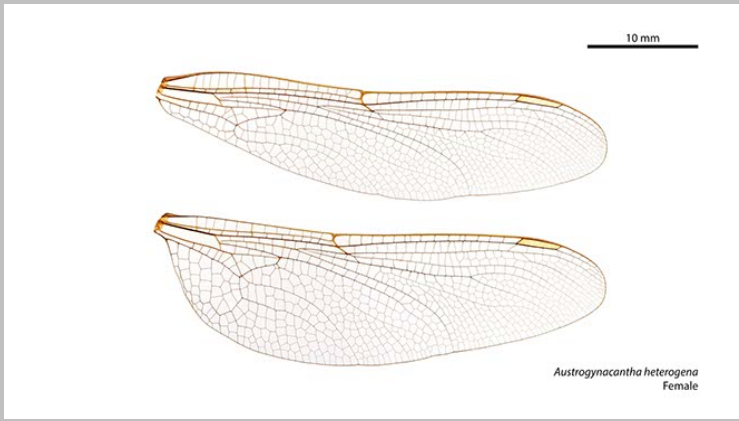
Austrogomphus prasinus female

Austrogomphus prasinus male

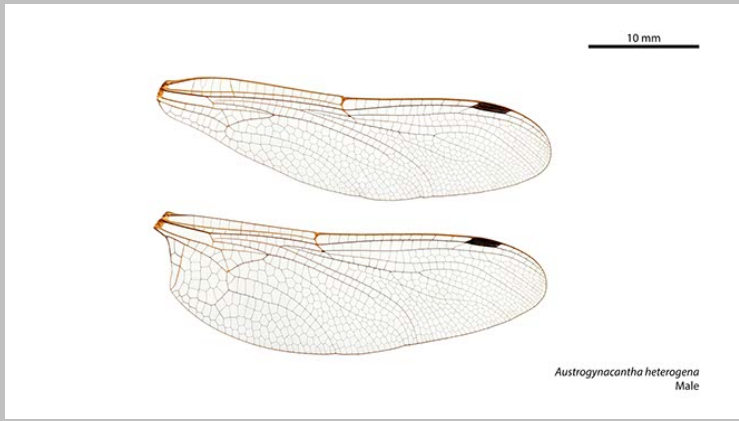
Austrogomphus turneri female

Austrogomphus turneri male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



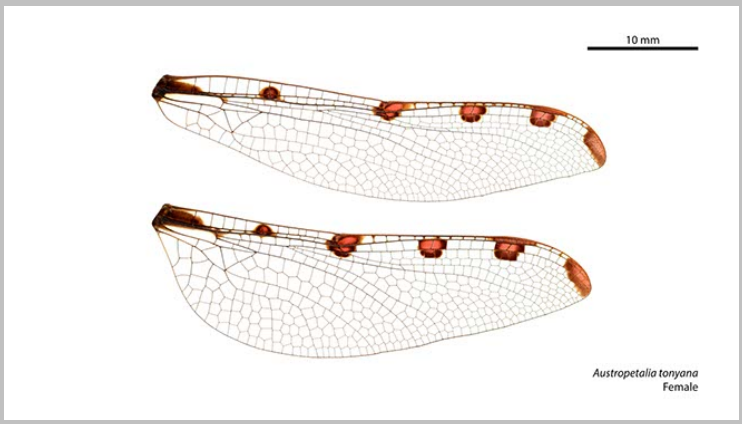
Austrogynacantha heterogena female



Austrogynacantha heterogena male

Austropetalia patricia female

Austropetalia patricia male



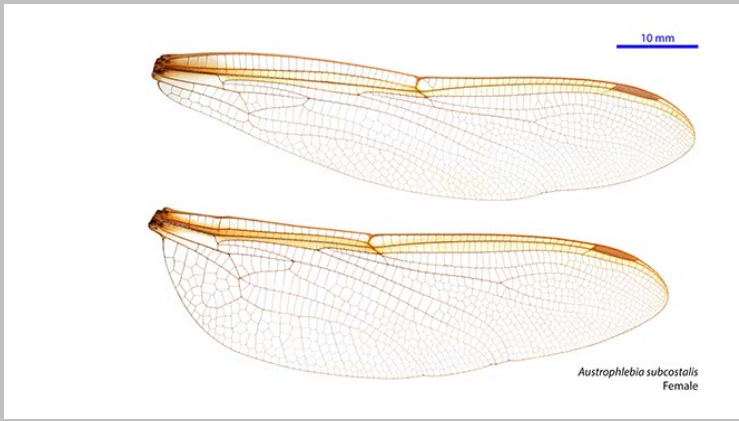
Austropetalia tonyana female

Austropetalia tonyana male

Austrophlebia costalis female

Austrophlebia costalis male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



Austrophlebia subcostalis female

Austrophlebia subcostalis male

Austrophya mystica female

Austrophya mystica male

Austrosynthemis cyanitincta female

Austrosynthemis cyanitincta male

Austrothemis nigrescens female

Austrothemis nigrescens male

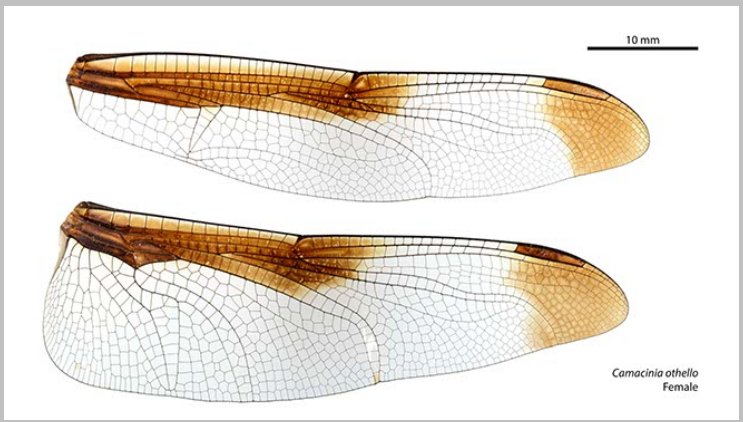
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Brachydiplax denticauda female

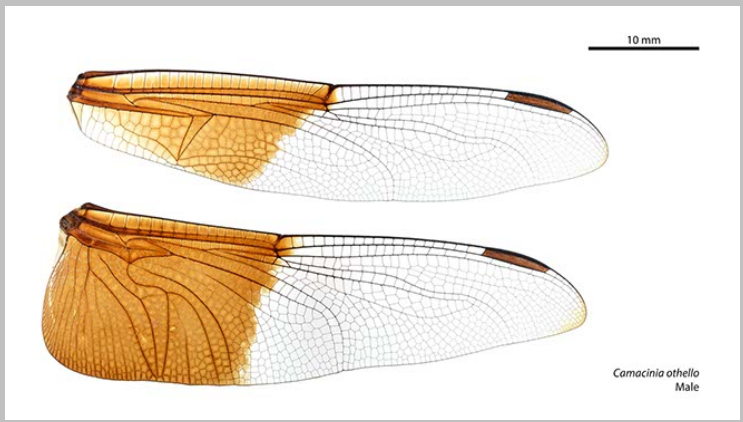
Brachydiplax denticauda male

Brachydiplax duivenbodei female

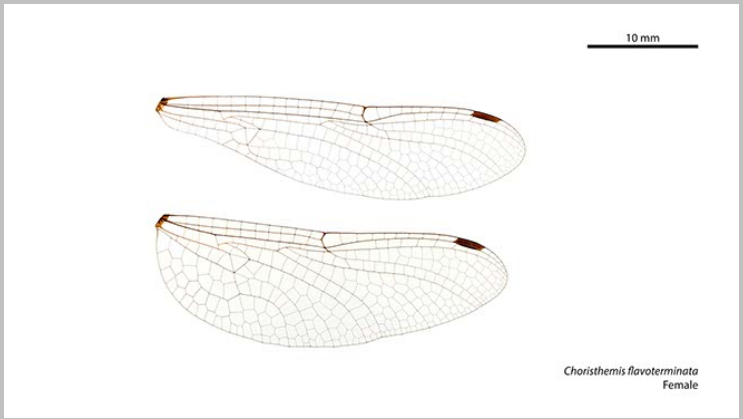
Brachydiplax duivenbodei male



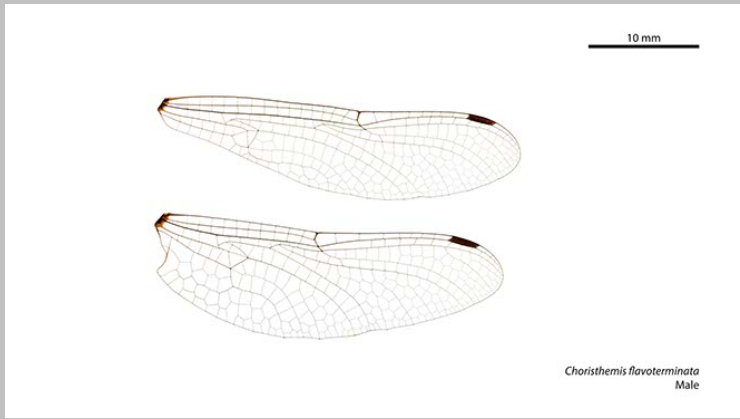
Camacinia othello female



Camacinia othello male



Choristhemis flavoterminata female



Choristhemis flavoterminata male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Cordulephya bidens female

Cordulephya bidens male

Cordulephya divergens female

Cordulephya divergens male

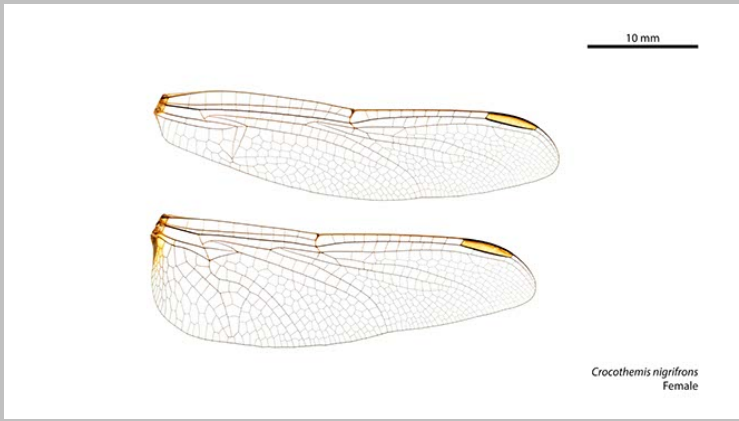
Cordulephya montana female

Cordulephya montana male

Cordulephya pygmaea female

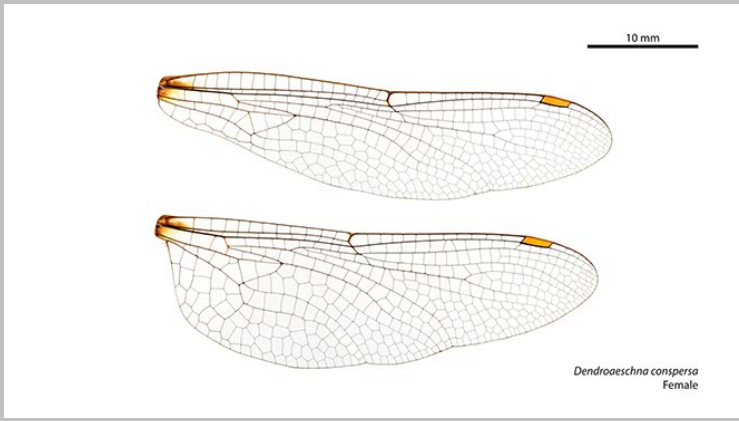
Cordulephya pygmaea male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

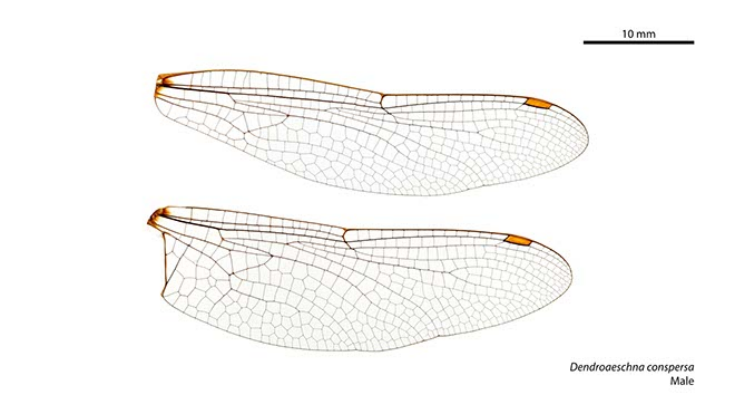


Crocothemis nigrifrons female

Crocothemis nigrifrons male



Dendroaeschna conspersa female



Dendroaeschna conspersa male

Diplacodes bipunctata female

Diplacodes bipunctata male

Diplacodes haematodes female

Diplacodes haematodes male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Diplacodes melanopsis female

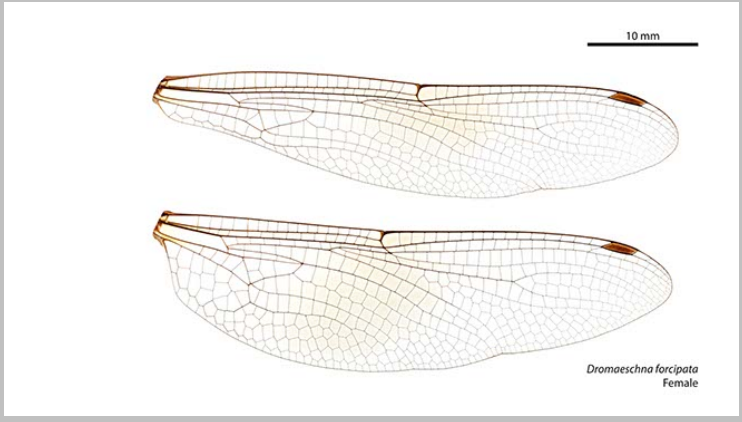
Diplacodes melanopsis male

Diplacodes nebulosa female

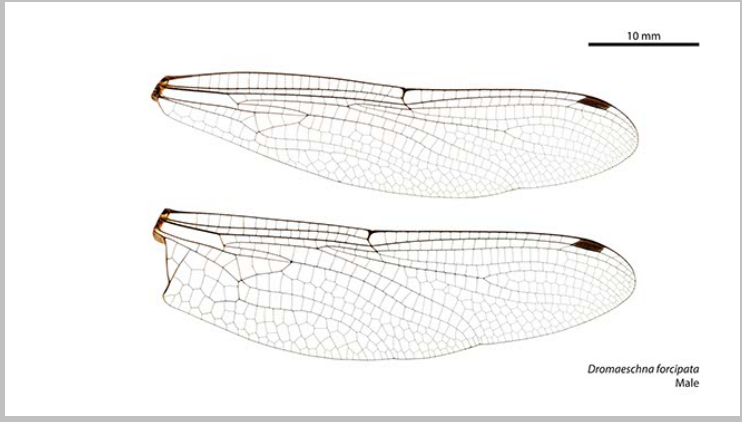
Diplacodes nebulosa male

Diplacodes trivialis female

Diplacodes trivialis male

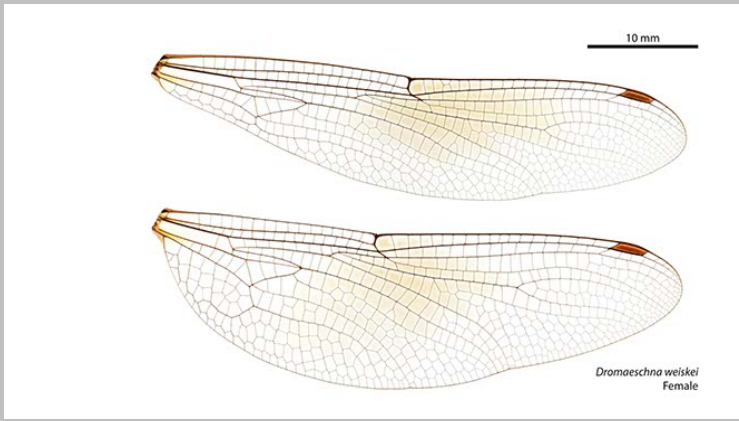


Dromaeschna forcipata female

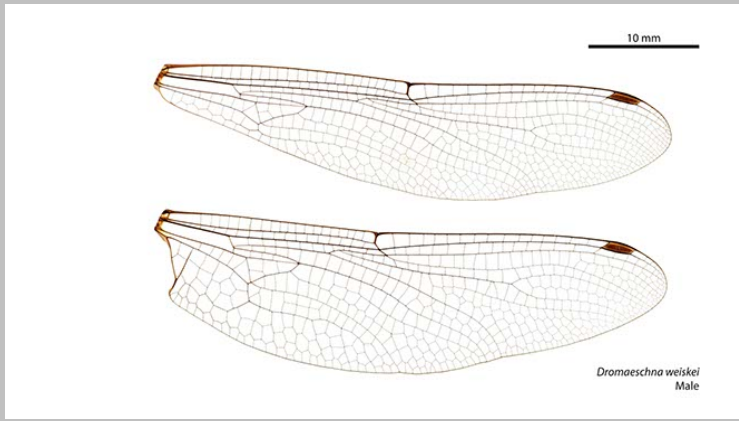


Dromaeschna forcipata male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



Dromaeschna weiskei female



Dromaeschna weiskei male

Eusynthemis aurolineata female

Eusynthemis aurolineata male

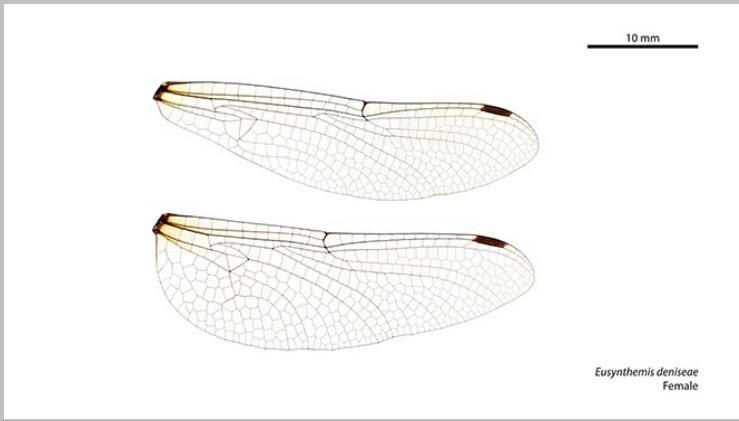
Eusynthemis barbarae female

Eusynthemis barbarae male

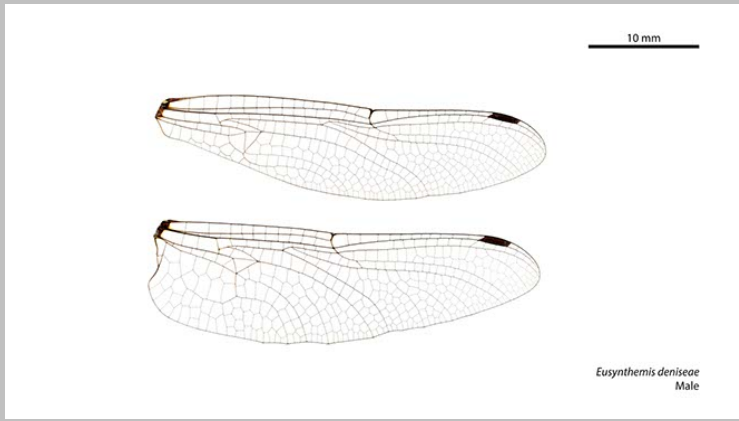
Eusynthemis brevistyla female

Eusynthemis brevistyla male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



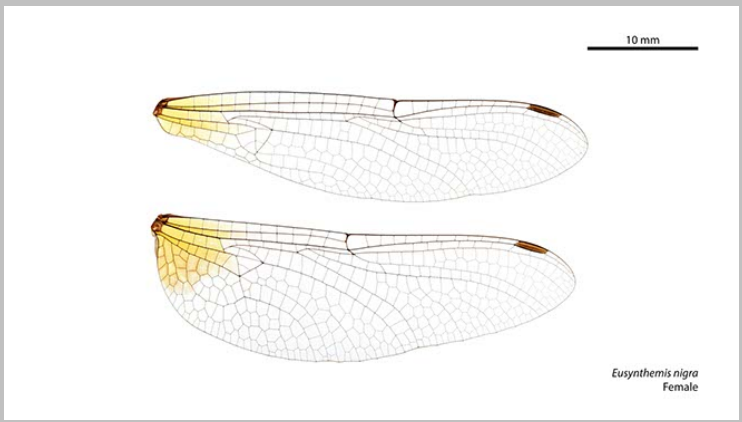
Eusynthemis deniseae female



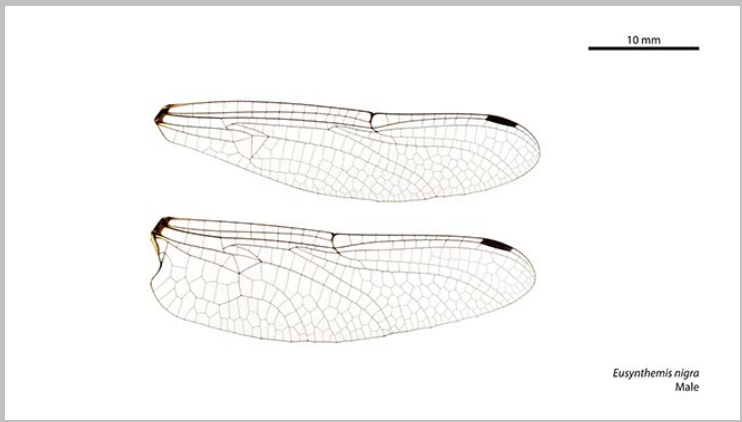
Eusynthemis deniseae male

Eusynthemis guttata female

Eusynthemis guttata male



Eusynthemis nigra female



Eusynthemis nigra male

Eusynthemis rentziana female

Eusynthemis rentziana male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

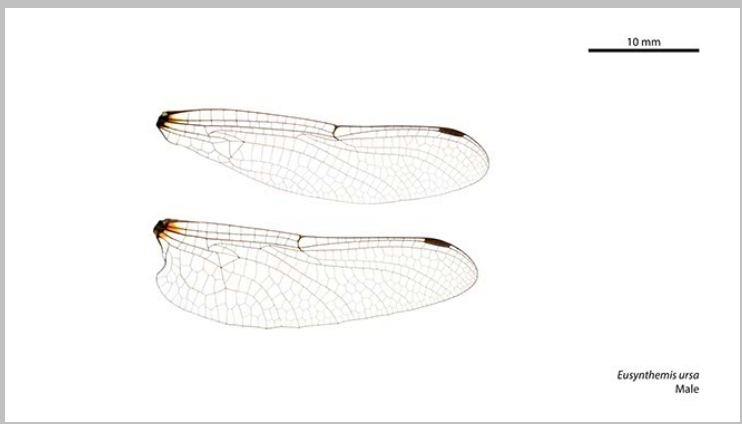
Eusynthemis tenera female

Eusynthemis tenera male

Eusynthemis tillyardi female

Eusynthemis tillyardi male

Eusynthemis ursa female



Eusynthemis ursa male

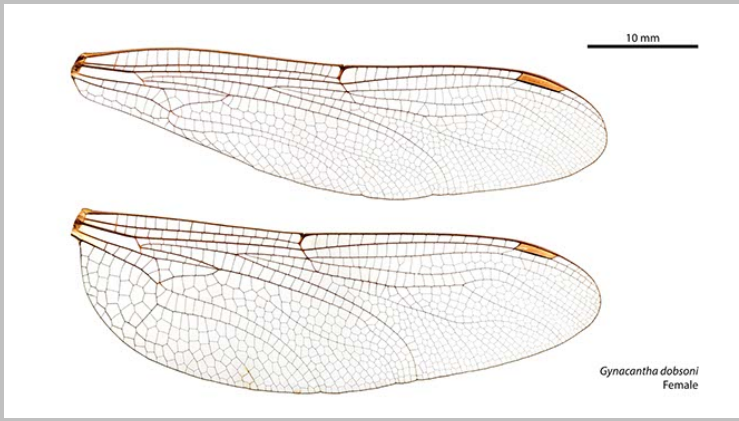
Eusynthemis ursula female

Eusynthemis ursula male

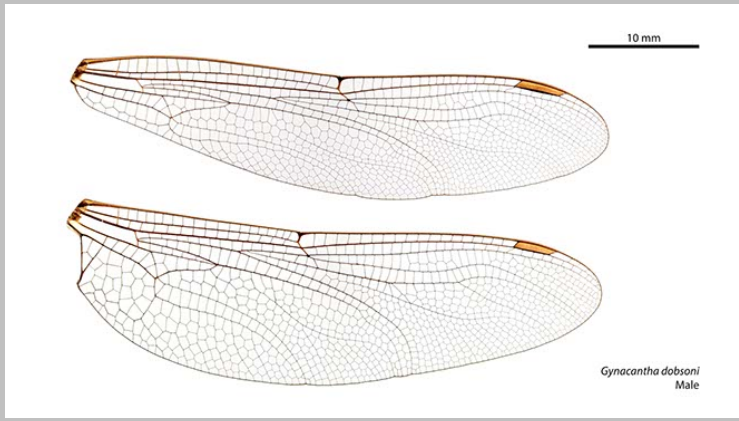
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Eusynthemis virgula female

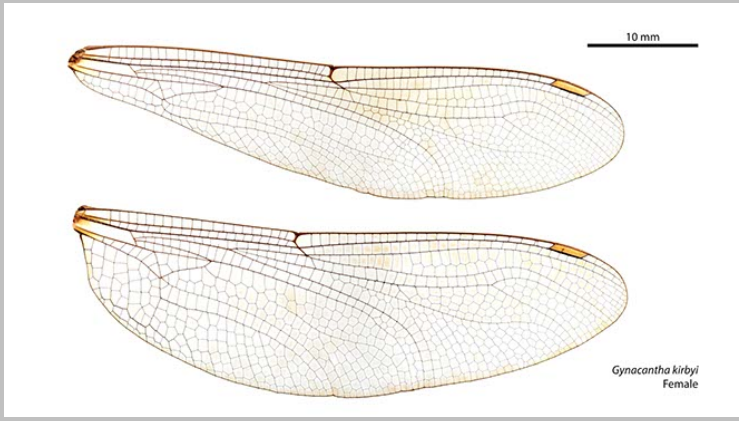
Eusynthemis virgula male



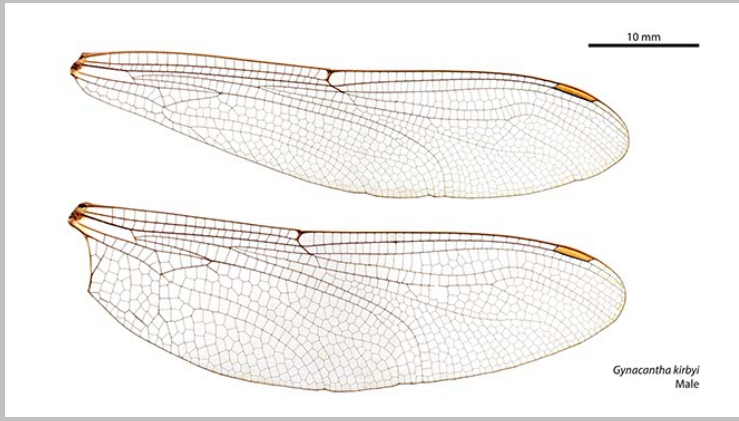
Gynacantha dobsoni female



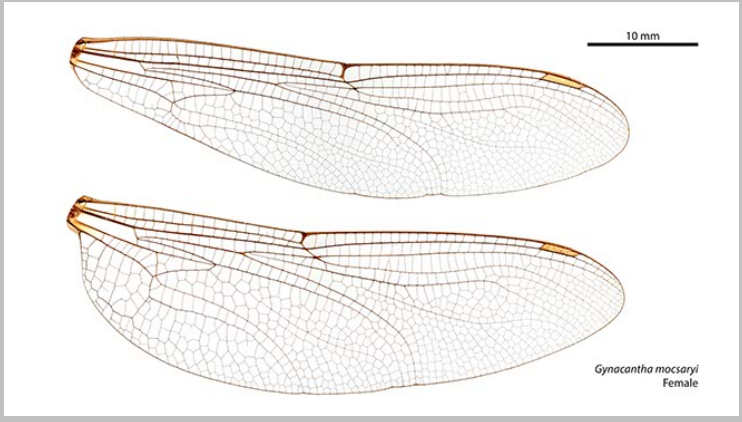
Gynacantha dobsoni male



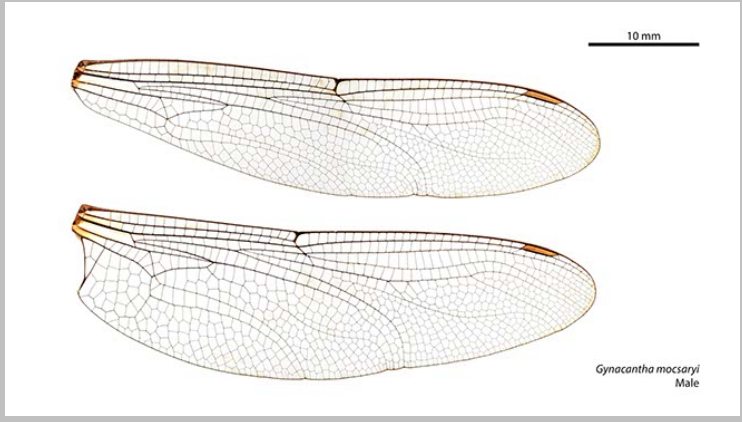
Gynacantha kirbyi female



Gynacantha kirbyi male

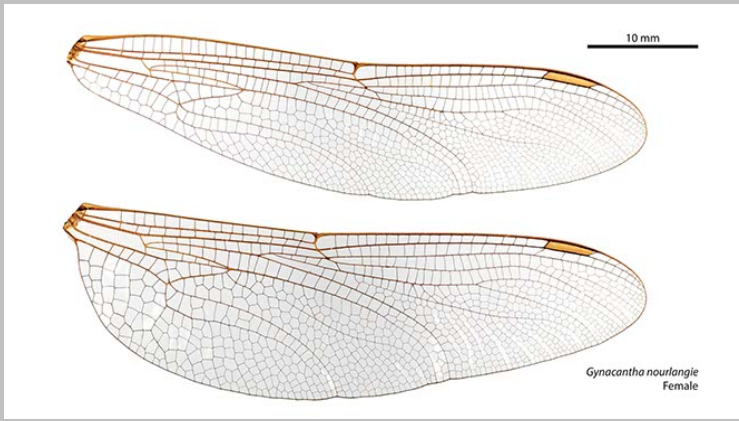


Gynacantha mocsaryi female

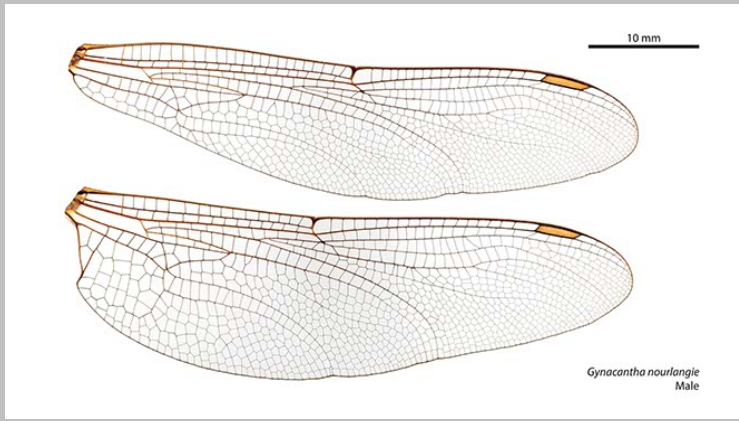


Gynacantha mocsaryi male

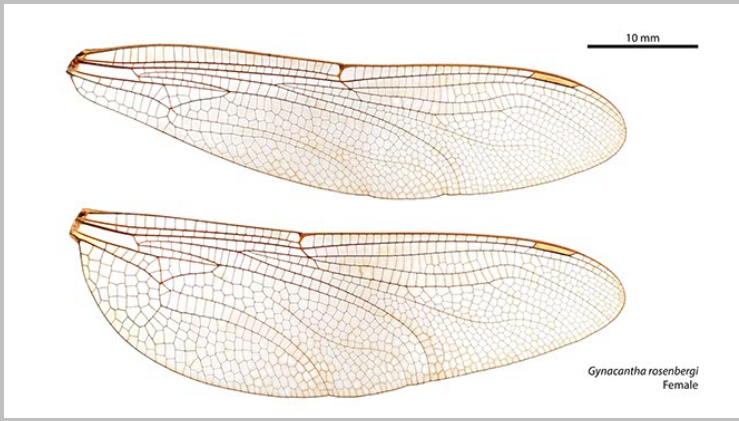
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



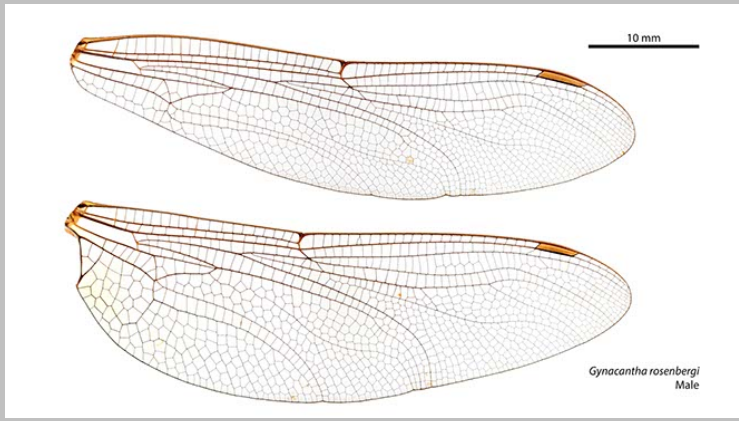
Gynacantha nourlangie female



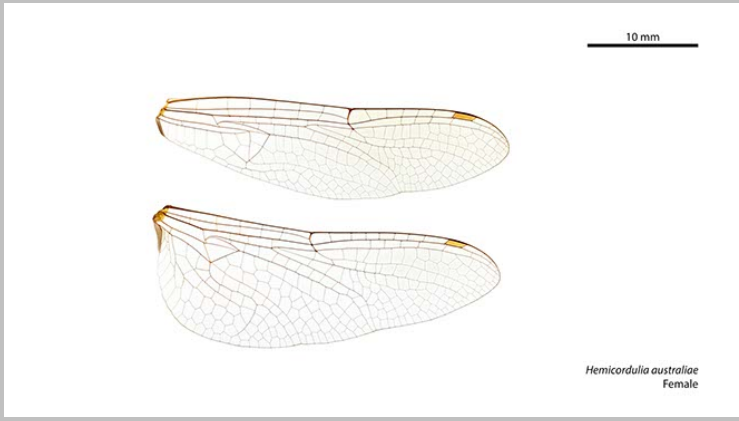
Gynacantha nourlangie male



Gynacantha rosenbergi female



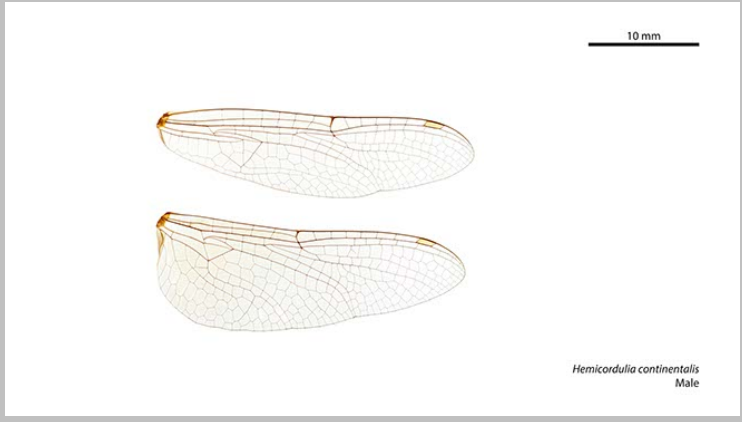
Gynacantha rosenbergi male



Hemicordulia australiae female

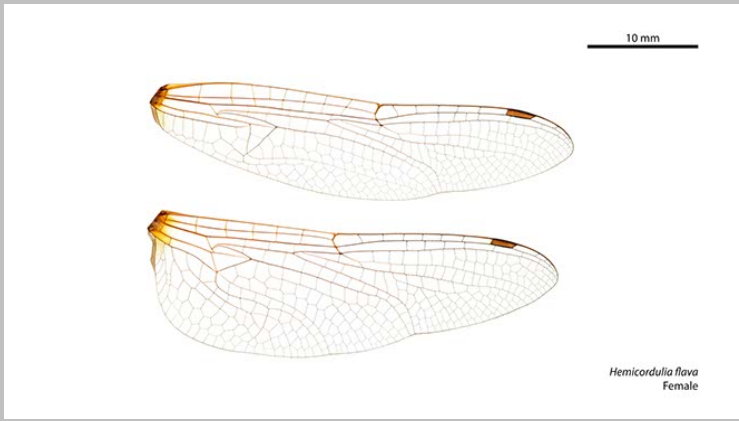
Hemicordulia australiae male

Hemicordulia continentalis female



Hemicordulia continentalis male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

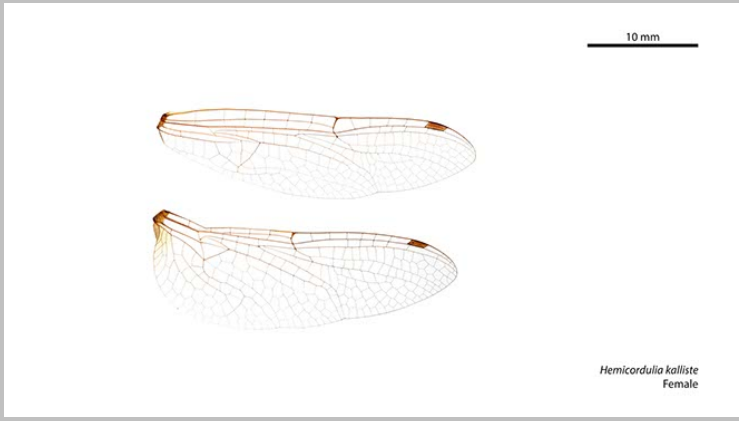


Hemicordulia flava female

Hemicordulia flava male

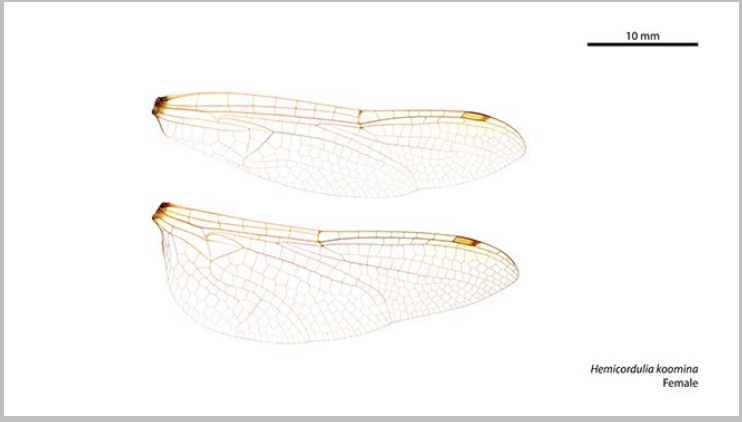
Hemicordulia intermedia female

Hemicordulia intermedia male



Hemicordulia kalliste female

Hemicordulia kalliste male



Hemicordulia koomina female

Hemicordulia koomina male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Hemicordulia superba female

Hemicordulia superba male

Hemicordulia tau female

Hemicordulia tau male

Hemigomphus atratus female

Hemigomphus atratus male

Hemigomphus comitatus female

Hemigomphus comitatus male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

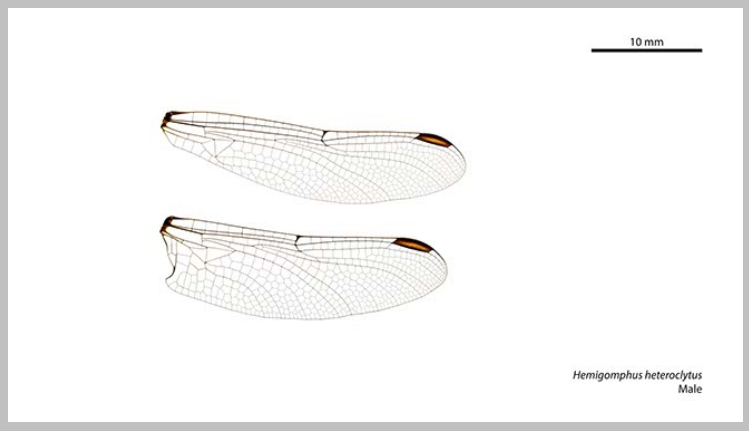
Hemigomphus cooloola female

Hemigomphus cooloola male

Hemigomphus gouldii female

Hemigomphus gouldii male

Hemigomphus heteroclytus female



Hemigomphus heteroclytus male

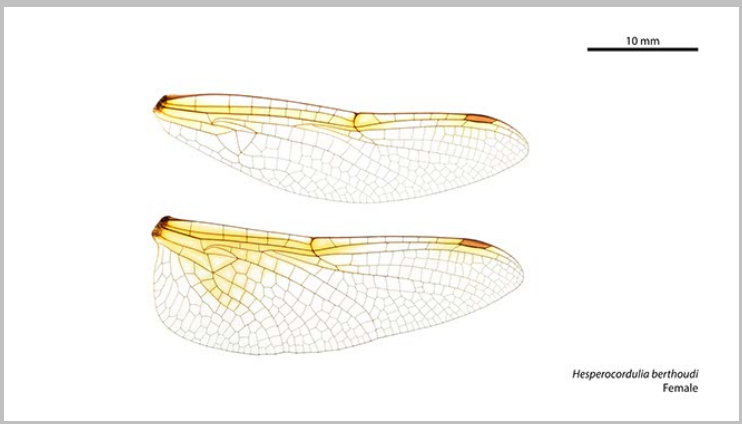
Hemigomphus magela female

Hemigomphus magela male

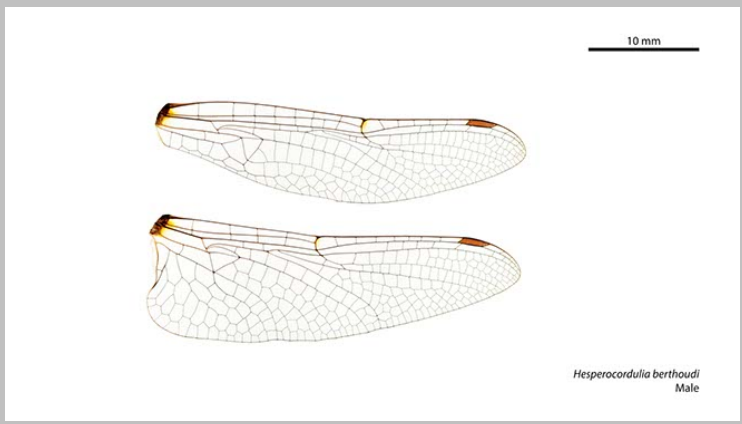
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Hemigomphus theischingeri female

Hemigomphus theischingeri male



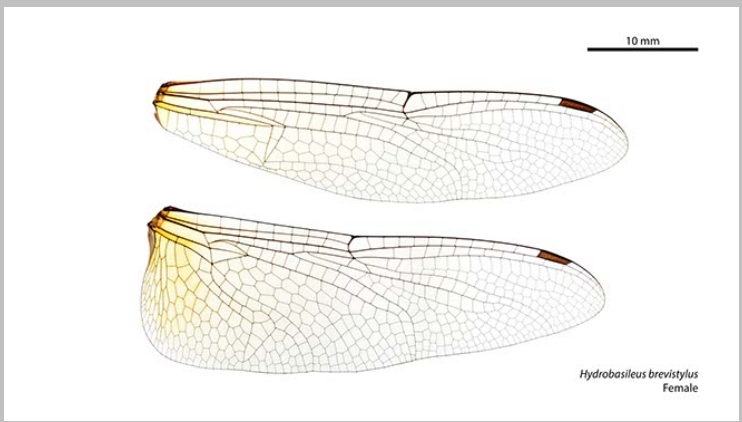
Hesperocordulia berthoudi female



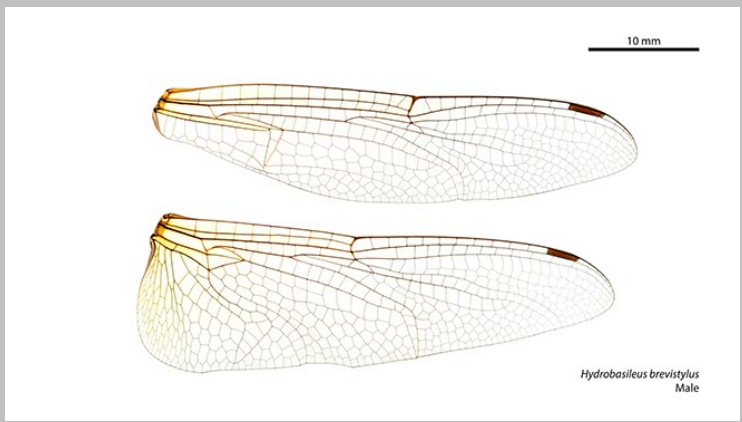
Hesperocordulia berthoudi male

Huonia melvillensis female

Huonia melvillensis male



Hydrobasileus brevistylus female



Hydrobasileus brevistylus male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Ictinogomphus australis female

Ictinogomphus australis male

Ictinogomphus dobsoni female

Ictinogomphus dobsoni male

Ictinogomphus paulini female

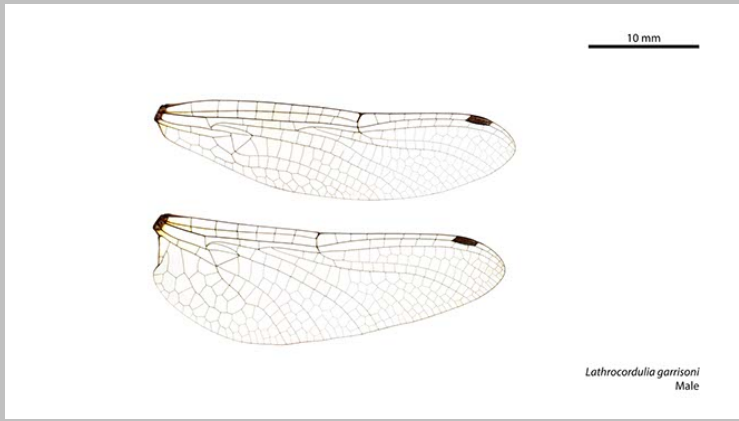
Ictinogomphus paulini male

Lathrecista asiatica female

Lathrecista asiatica male

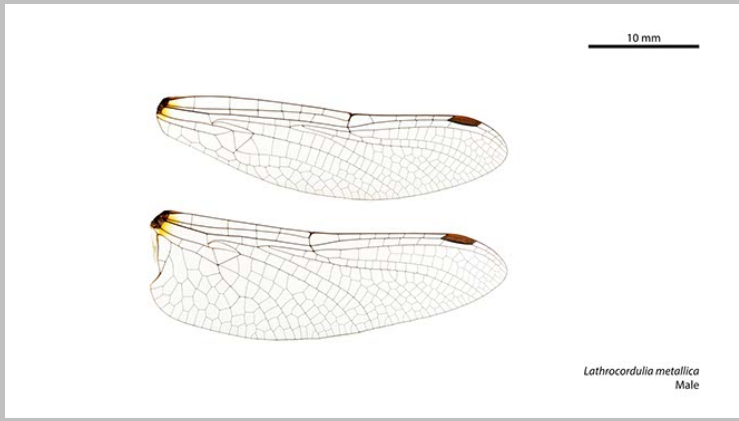
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Lathrocordulia garrisoni female



Lathrocordulia garrisoni male

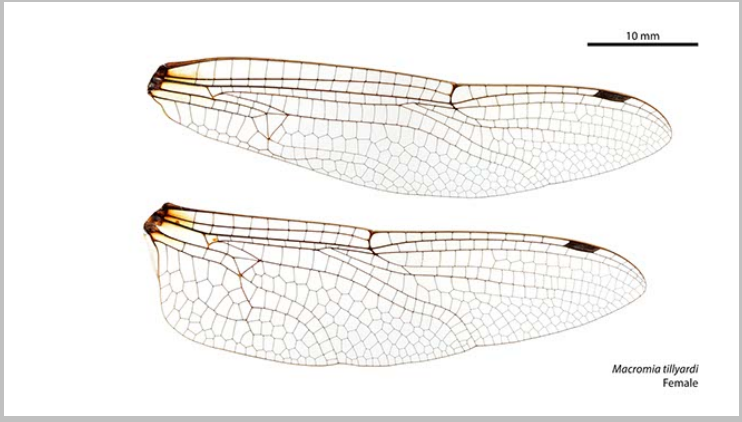
Lathrocordulia metallica female



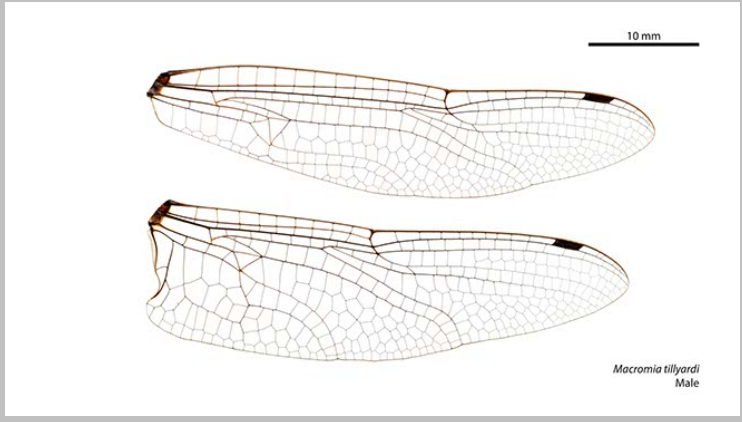
Lathrocordulia metallica male

Macrodiplax cora female

Macrodiplax cora male

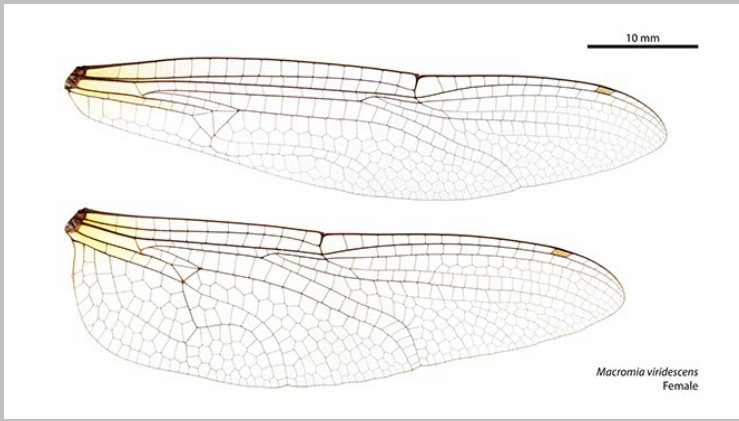


Macromia tillyardi female

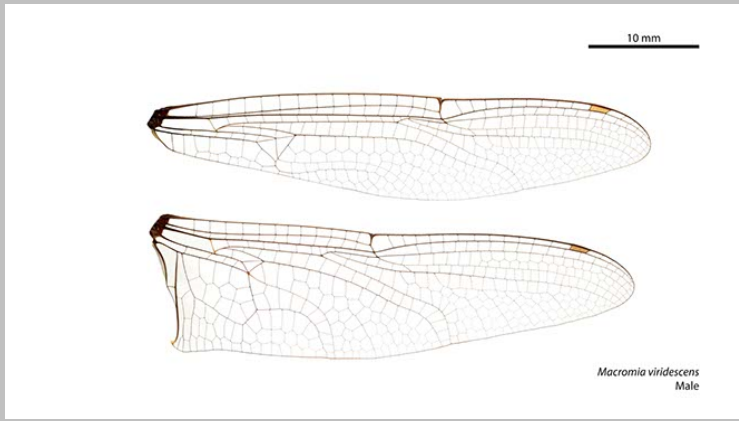


Macromia tillyardi male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



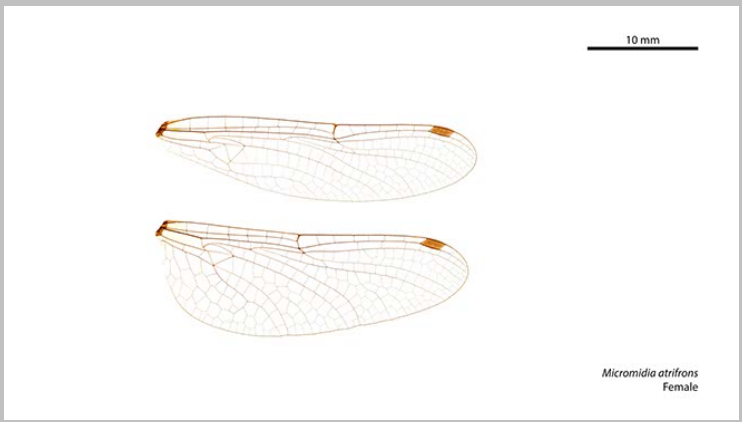
Macromia viridescens female



Macromia viridescens male

Metaphya tillyardi female

Metaphya tillyardi male



Micromidia atrifrons female

Micromidia atrifrons male

Micromidia convergens female

Micromidia convergens male

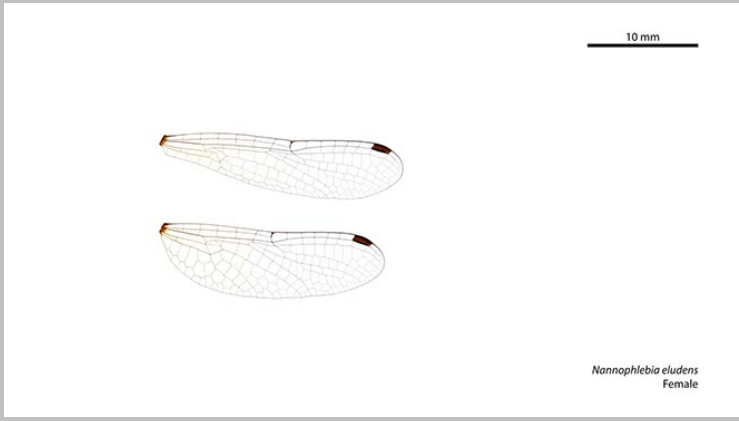
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Micromidia rodericki female

Micromidia rodericki male

Nannodiplax rubra female

Nannodiplax rubra male



Nannophlebia eludens female

Nannophlebia eludens male

Nannophlebia injibandi female

Nannophlebia injibandi male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Nannophlebia mudginberri female

Nannophlebia mudginberri male

Nannophlebia risi female

Nannophlebia risi male

Nannophya australis female

Nannophya australis male

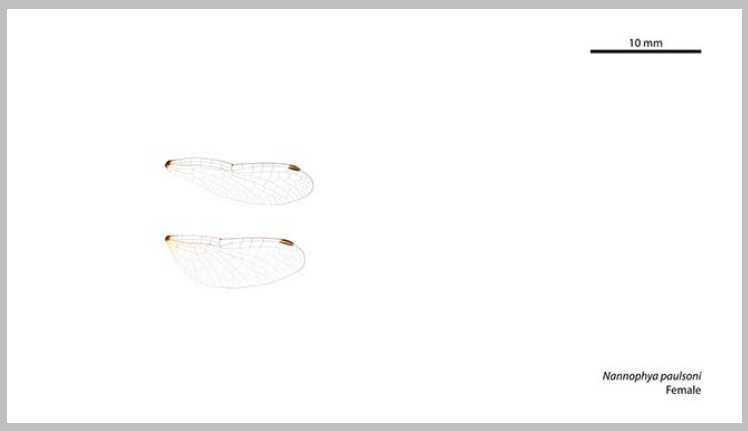
Nannophya dalei female

Nannophya dalei male

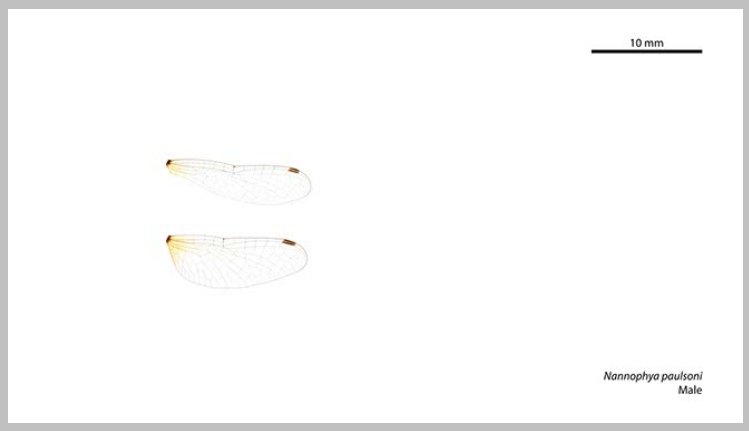
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Nannophya occidentalis female

Nannophya occidentalis male



Nannophya paulsoni female



Nannophya paulsoni male

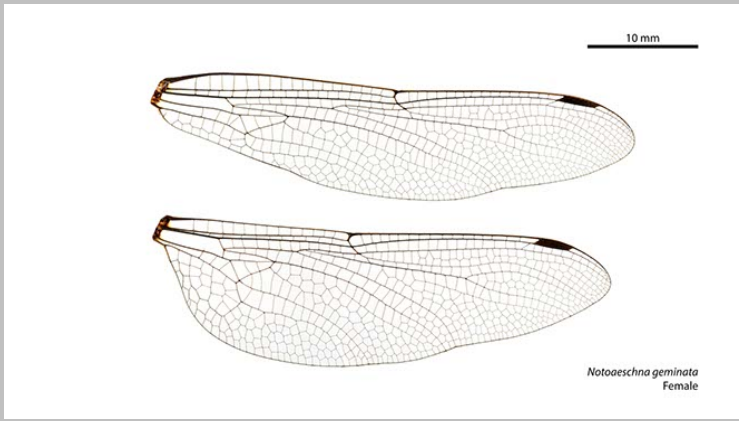
Neurothemis oligoneura female

Neurothemis oligoneura male

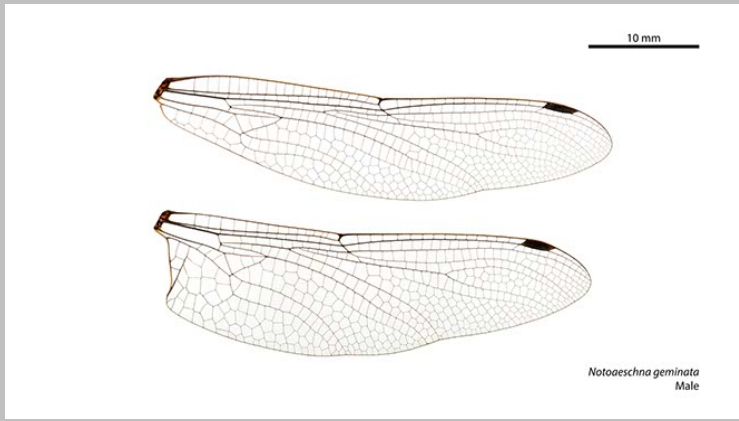
Neurothemis stigmatizans female

Neurothemis stigmatizans male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

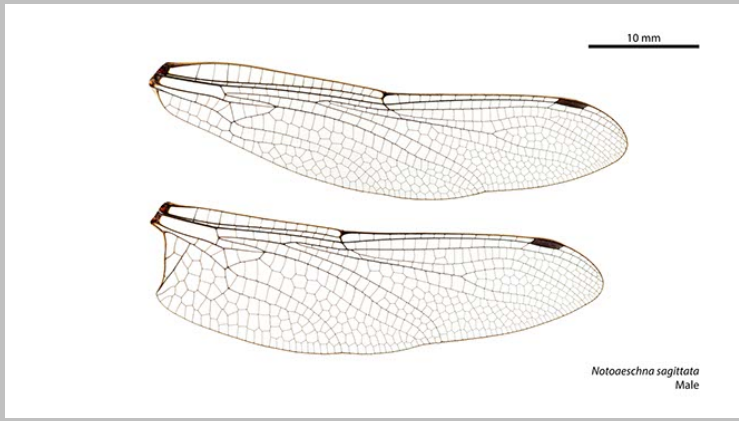


Notoaeschna geminata female



Notoaeschna geminata male

Notoaeschna sagittata female



Notoaeschna sagittata male

Notolibellula bicolor female

Notolibellula bicolor male

Odontogomphus donnellyi female

Odontogomphus donnellyi male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Orthetrum balteatum female

Orthetrum balteatum male

Orthetrum boumiera female

Orthetrum boumiera male

Orthetrum caledonicum female

Orthetrum caledonicum male

Orthetrum migratum female

Orthetrum migratum male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

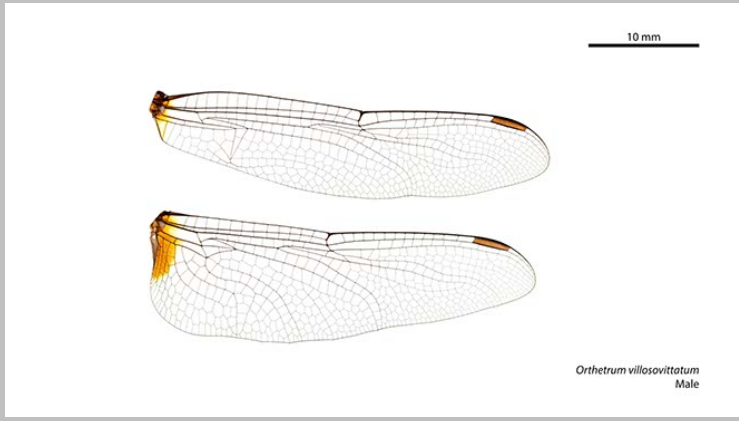
Orthetrum sabina female

Orthetrum sabina male

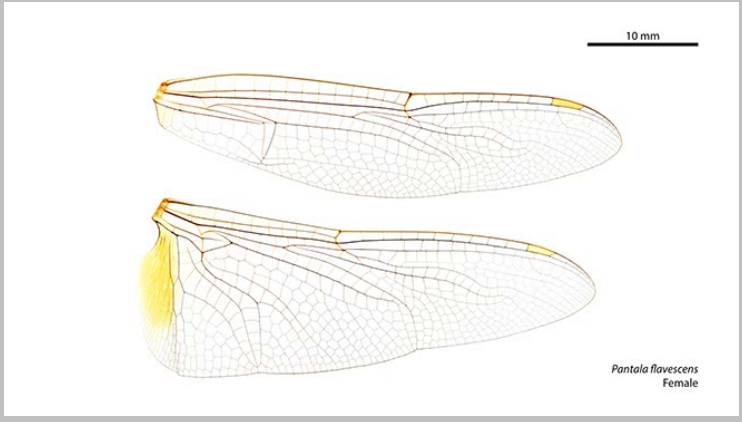
Orthetrum serapia female

Orthetrum serapia male

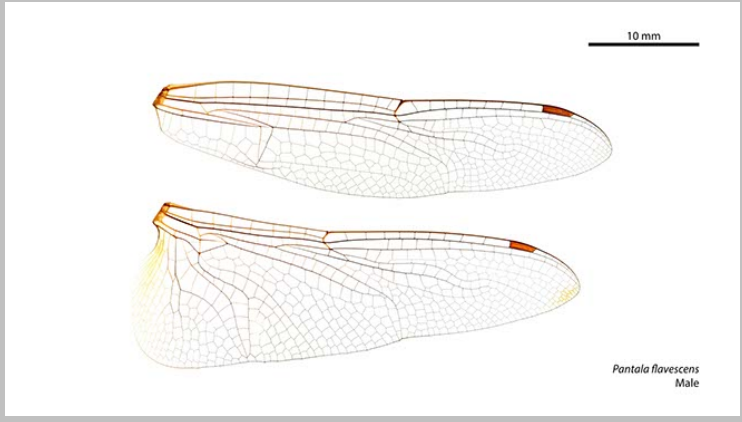
Orthetrum villosovittatum female



Orthetrum villosovittatum male

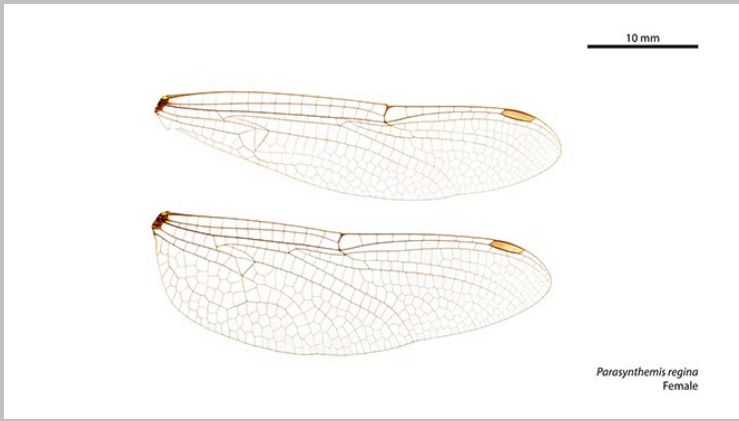


Pantala flavescens female

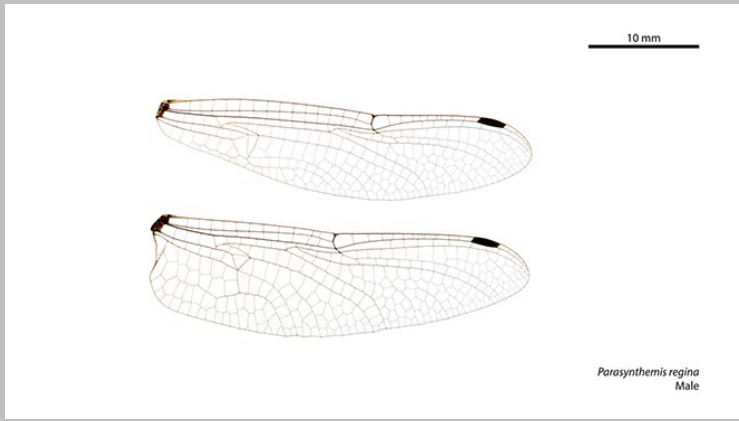


Pantala flavescens male

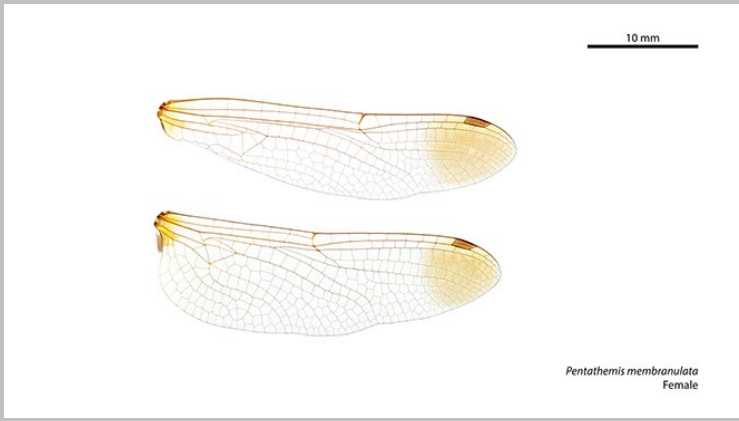
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



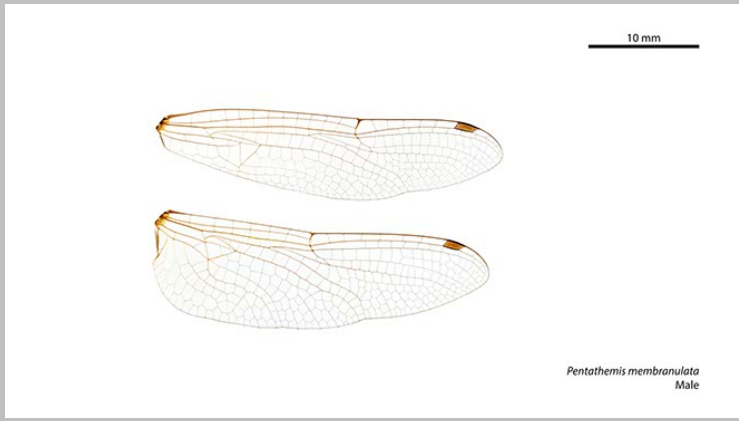
Parasynthemis regina female



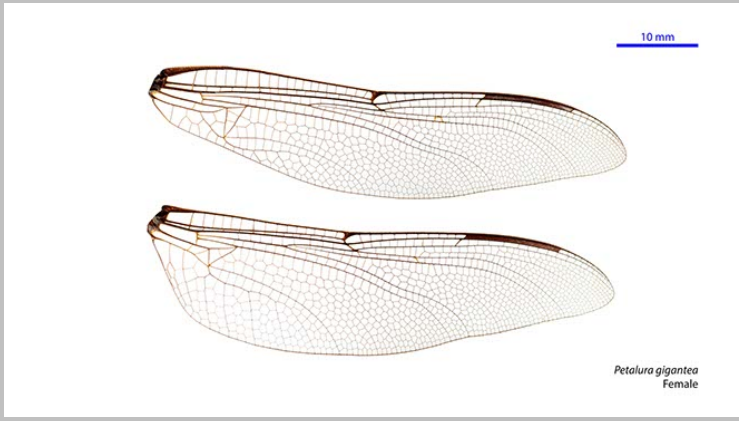
Parasynthemis regina male



Pentathemis membranulata female



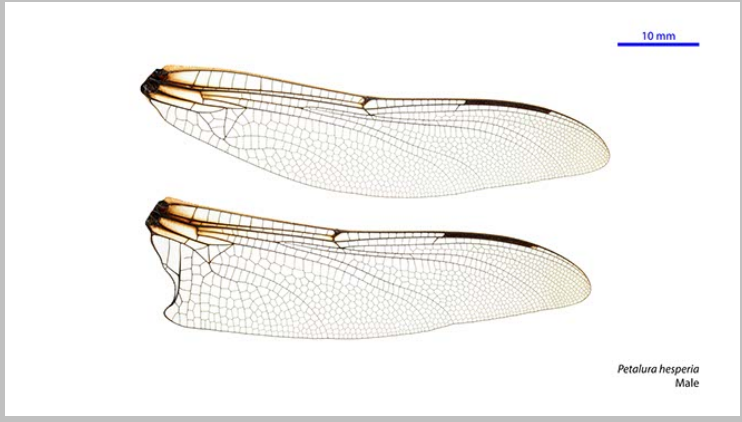
Pentathemis membranulata male



Petalura gigantea female

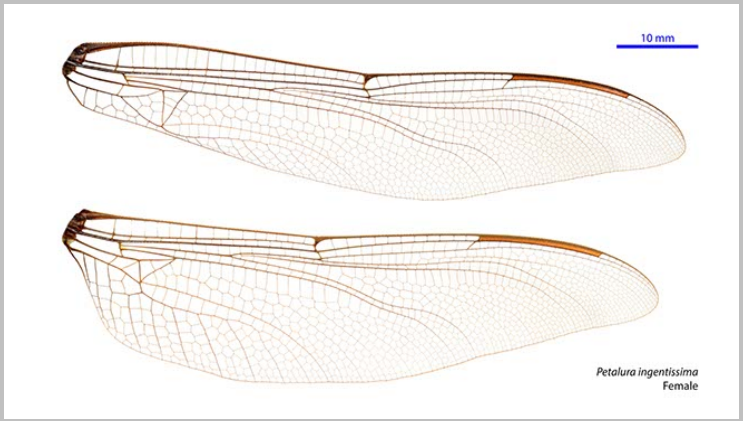
Petalura gigantea male

Petalura hesperia female

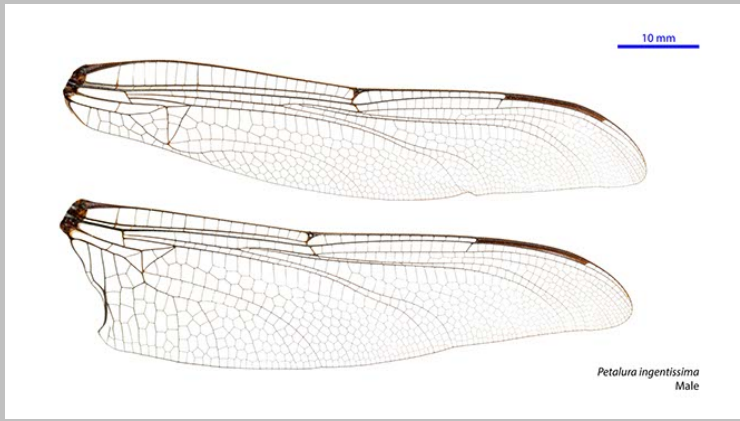


Petalura hesperia male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

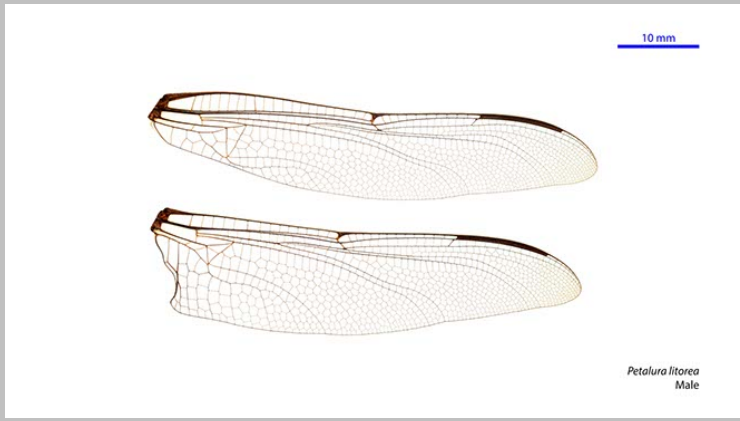


Petalura ingentissima female



Petalura ingentissima male

Petalura litorea female



Petalura litorea male

Potamarcha congener female

Potamarcha congener male

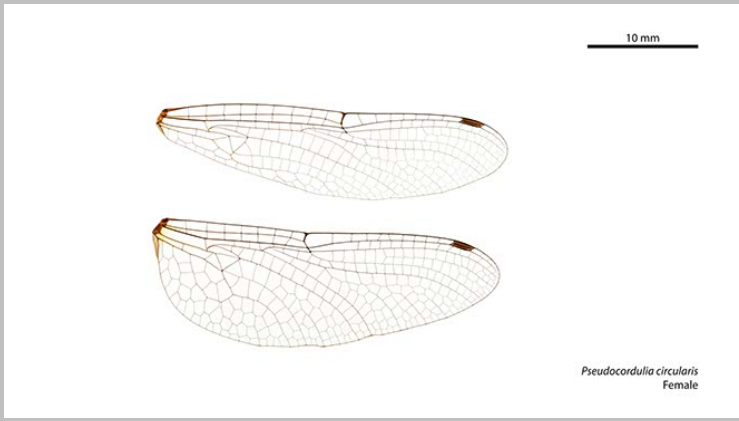
Procordulia affinis female

Procordulia affinis male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

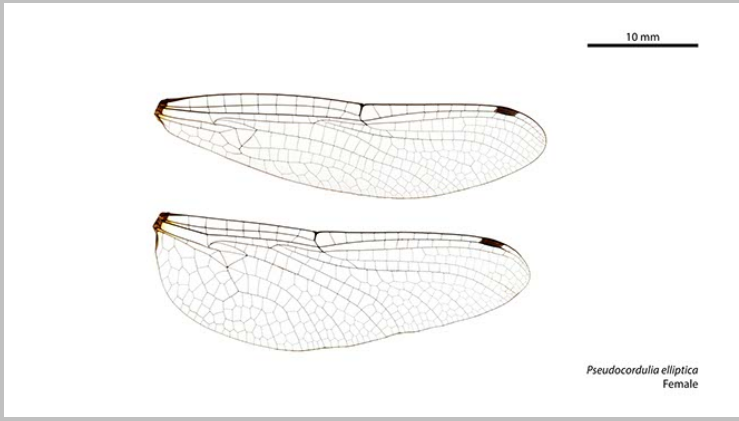
Procordulia jacksoniensis female

Procordulia jacksoniensis male

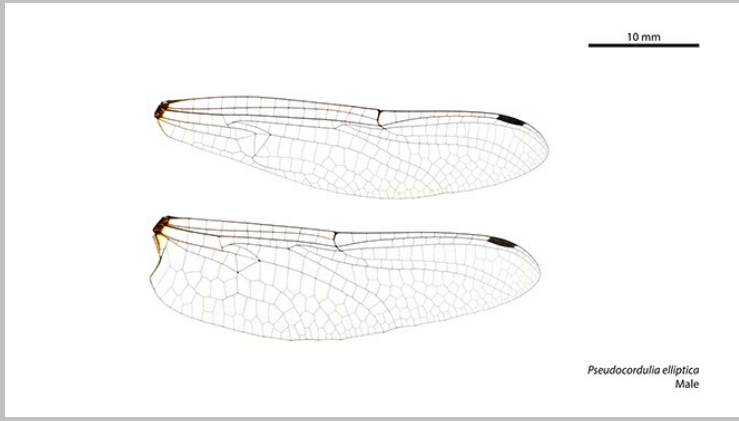


Pseudocordulia circularis female

Pseudocordulia circularis male



Pseudocordulia elliptica female

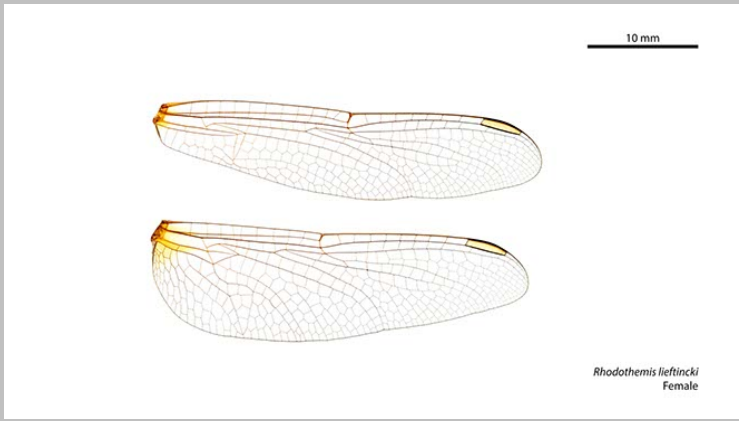


Pseudocordulia elliptica male

Raphismia bispina female

Raphismia bispina male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



Rhodothemis lieftincki female

Rhodothemis lieftincki male

Rhyothemis braganza female

Rhyothemis braganza male

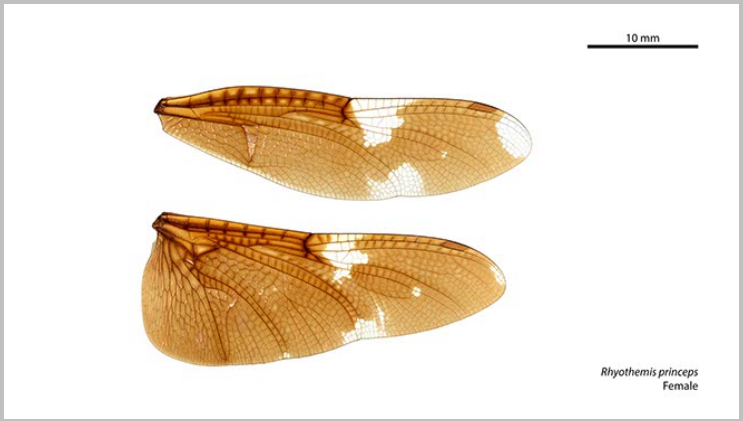
Rhyothemis graphiptera female

Rhyothemis graphiptera male

Rhyothemis phyllis female

Rhyothemis phyllis male

https://doi.org/10.3853/j.1835-4211.33.2021.1767



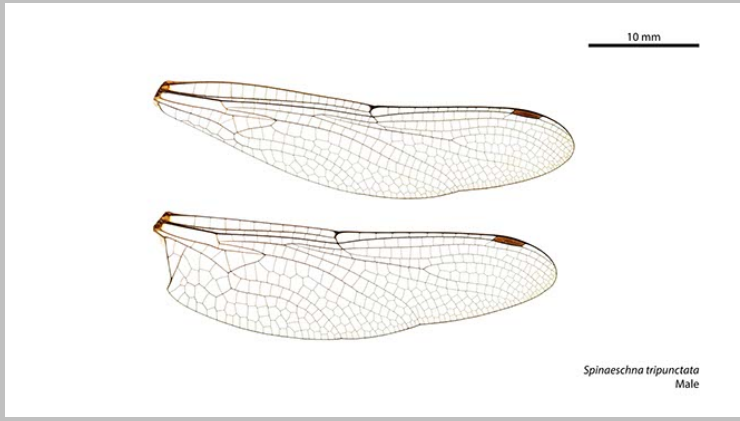
Rhyothemis princeps female

Rhyothemis princeps male

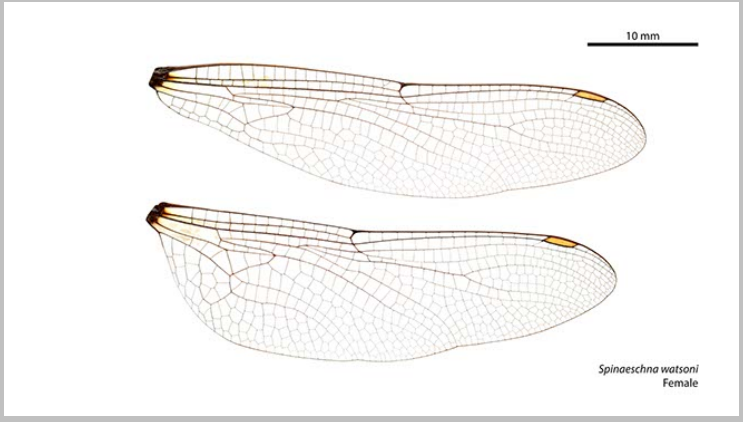
Rhyothemis resplendens female

Rhyothemis resplendens male

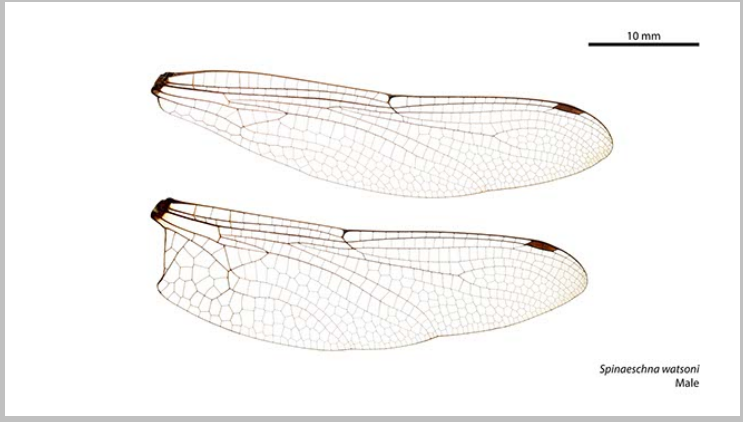
Spinaeschna tripunctata female



Spinaeschna tripunctata male



Spinaeschna watsoni female



Spinaeschna watsoni male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Synthemiopsis gomphomacromioides female

Synthemiopsis gomphomacromioides male

Synthemis eustalacta female

Synthemis eustalacta male

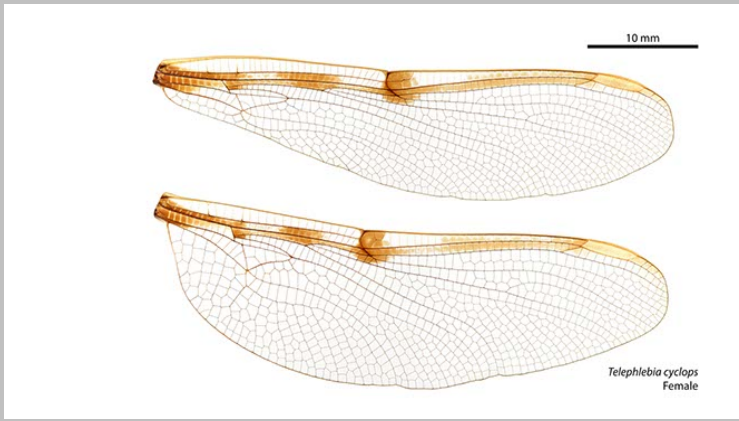
Synthemis tasmanica female

Synthemis tasmanica male

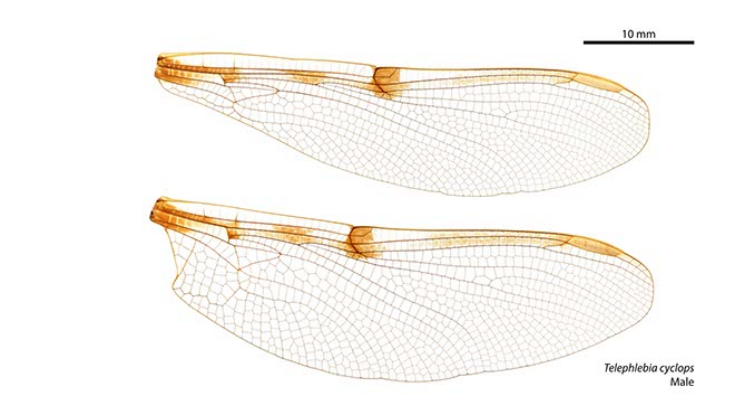
Telephlebia brevicauda female

Telephlebia brevicauda male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

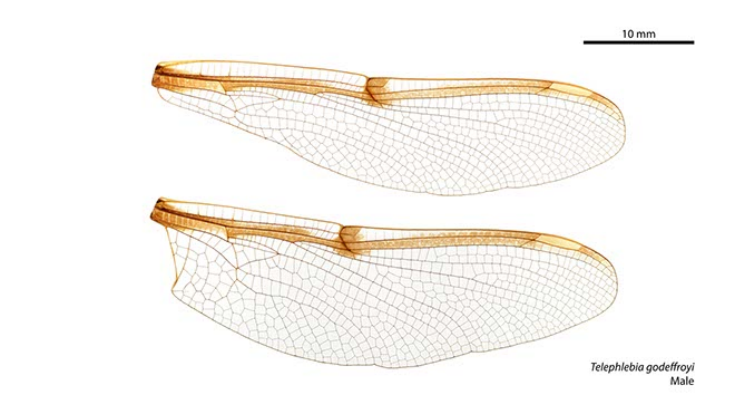


Telephlebia cyclops female

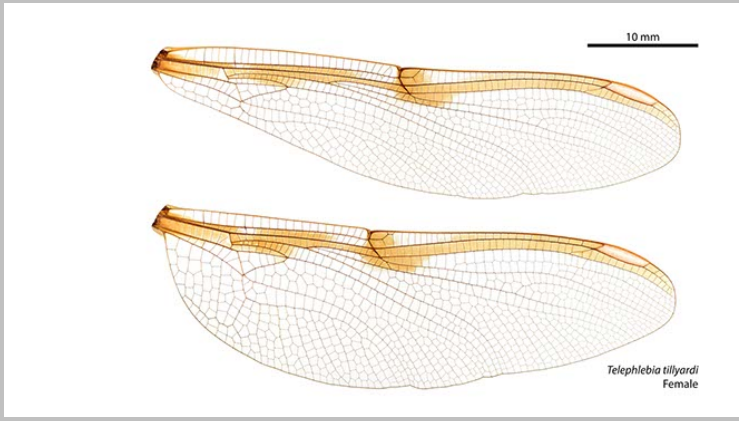


Telephlebia cyclops male

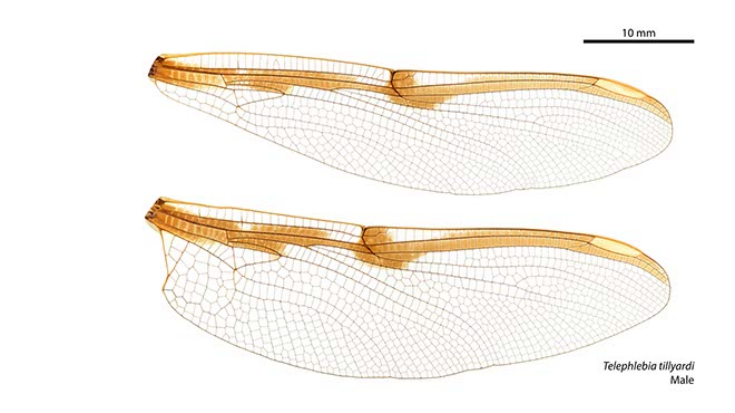
Telephlebia godeffroyi female



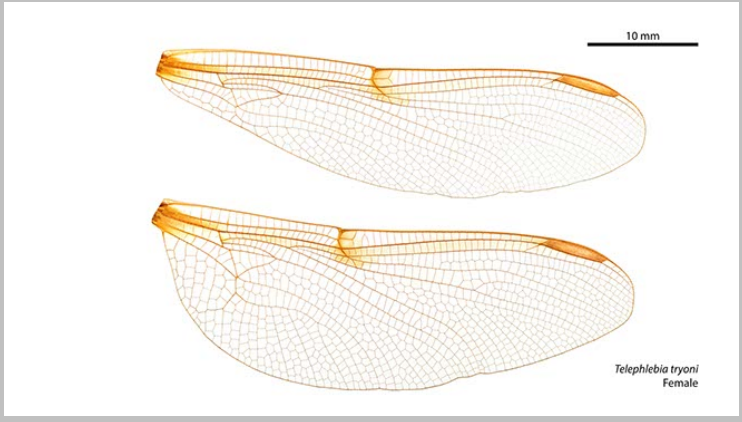
Telephlebia godeffroyi male



Telephlebia tillyardi female



Telephlebia tillyardi male

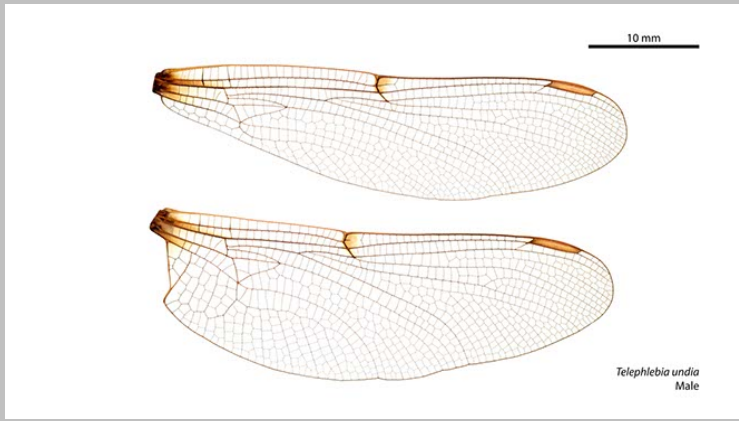


Telephlebia tryoni female

Telephlebia tryoni male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

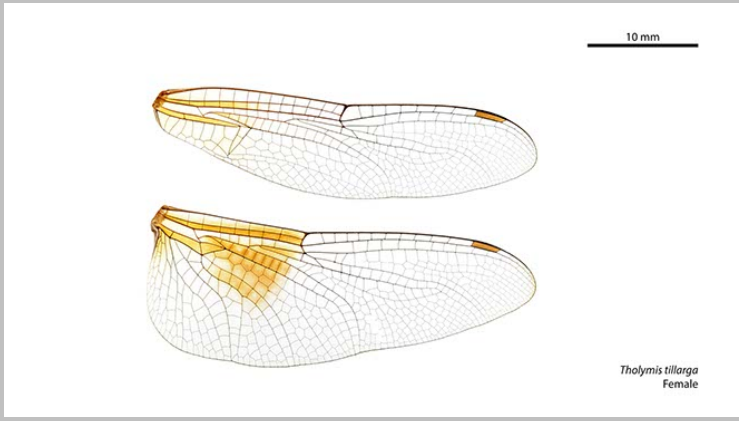
Telephlebia undia female



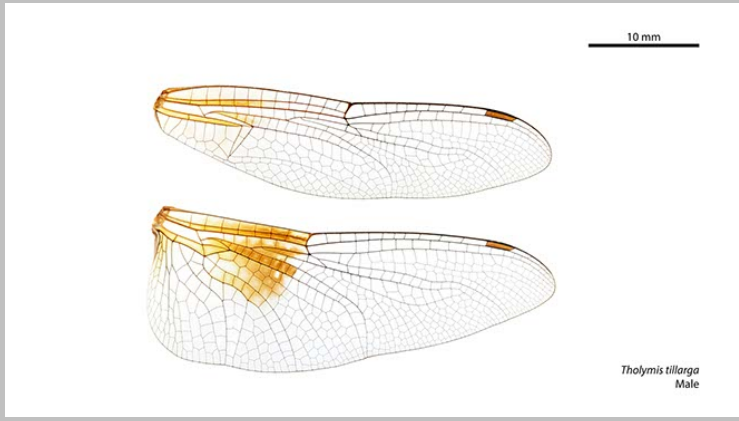
Telephlebia undia male

Tetrathemis irregularis female

Tetrathemis irregularis male

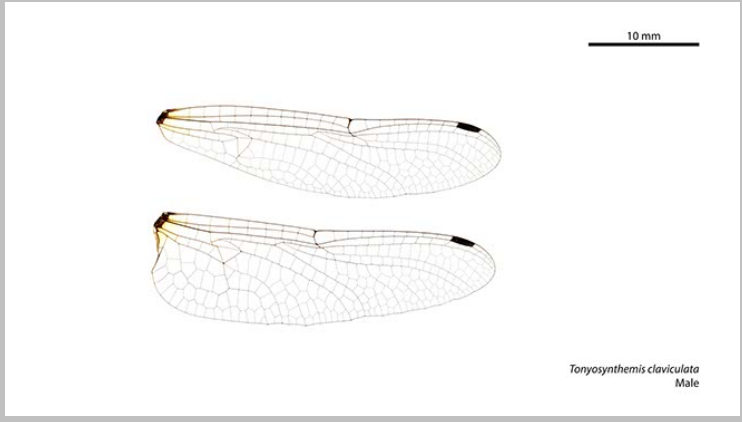


Tholymis tillarga female



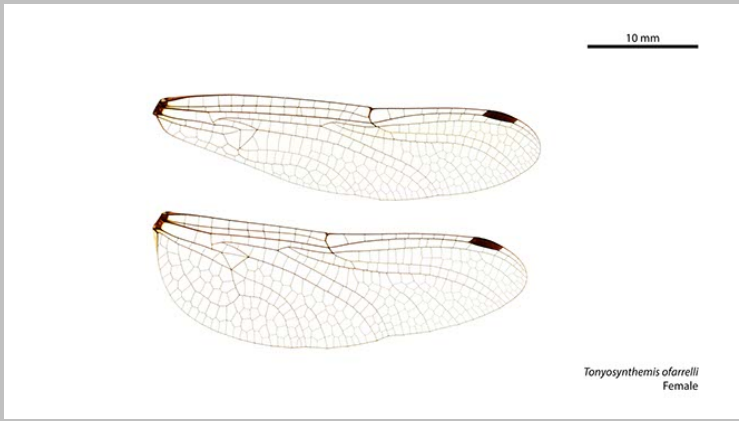
Tholymis tillarga male

Tonyosynthemis claviculata female



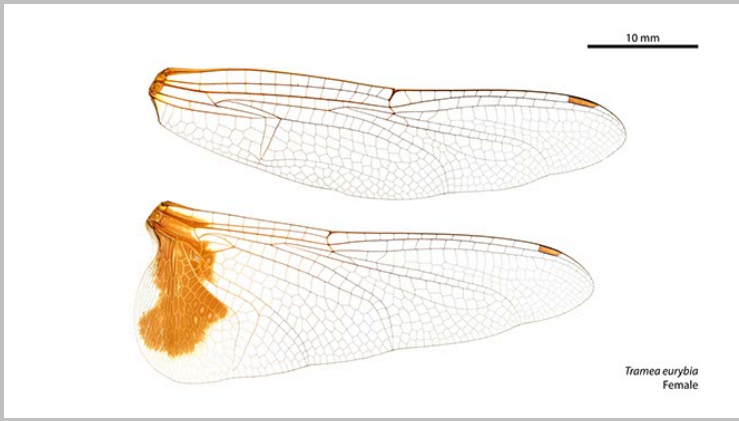
Tonyosynthemis claviculata male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



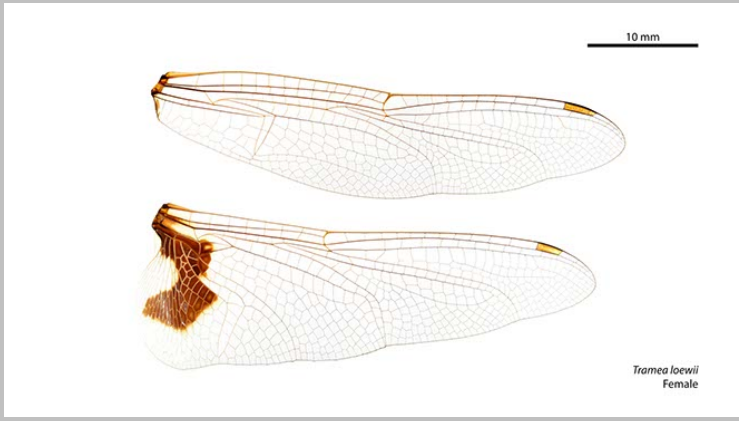
Tonyosynthemis ofarrelli female

Tonyosynthemis ofarrelli male



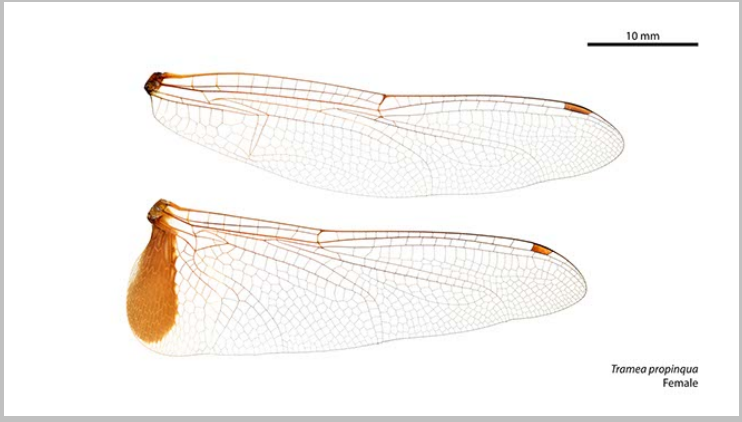
Tramea eurybia female

Tramea eurybia male



Tramea loewii female

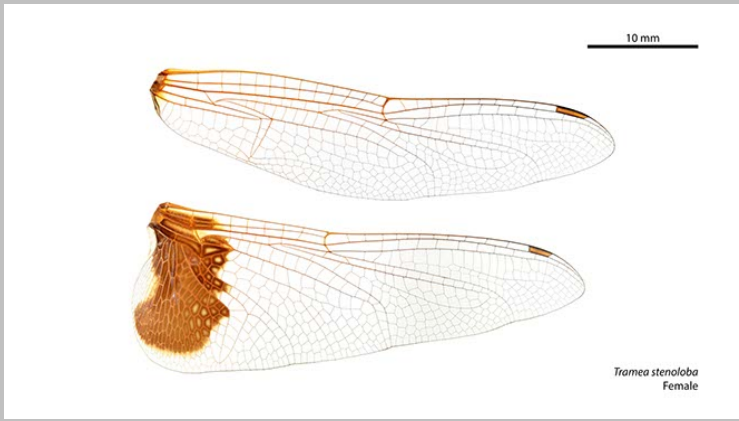
Tramea loewii male



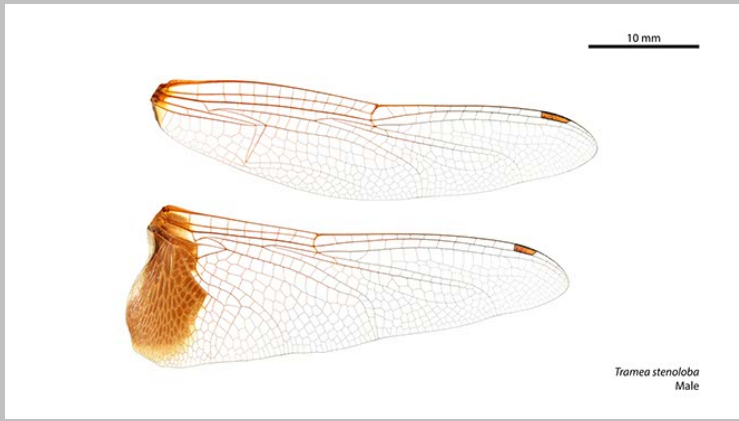
Tramea propinqua female

Tramea propinqua male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

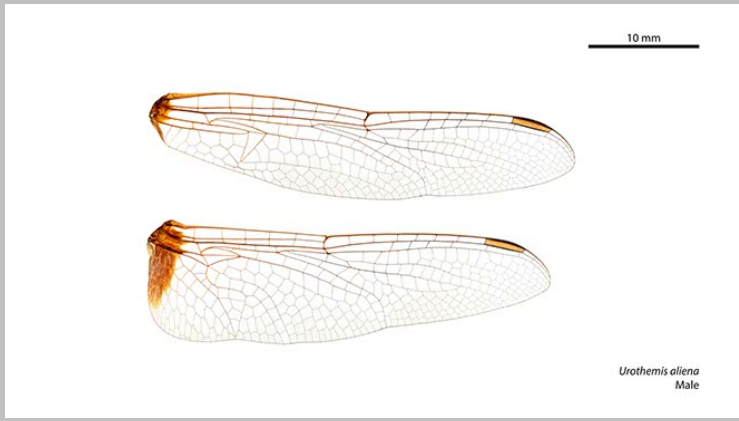


Tramea stenoloba female



Tramea stenoloba male

Urothemis aliena female



Urothemis aliena male

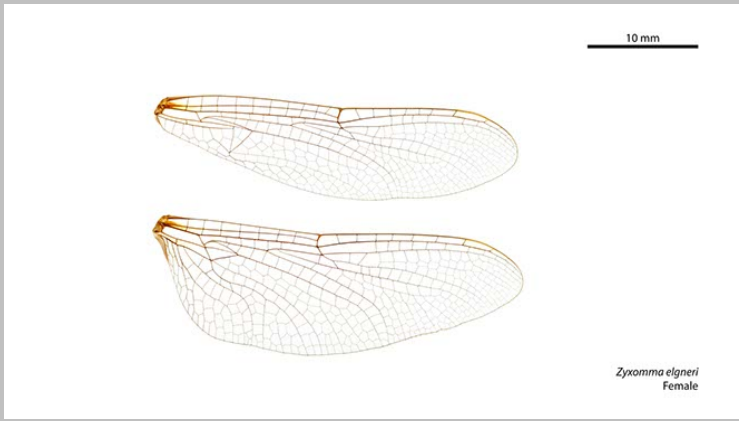
Zephyrogomphus lateralis female

Zephyrogomphus lateralis male

Zephyrogomphus longipositor female

Zephyrogomphus longipositor male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

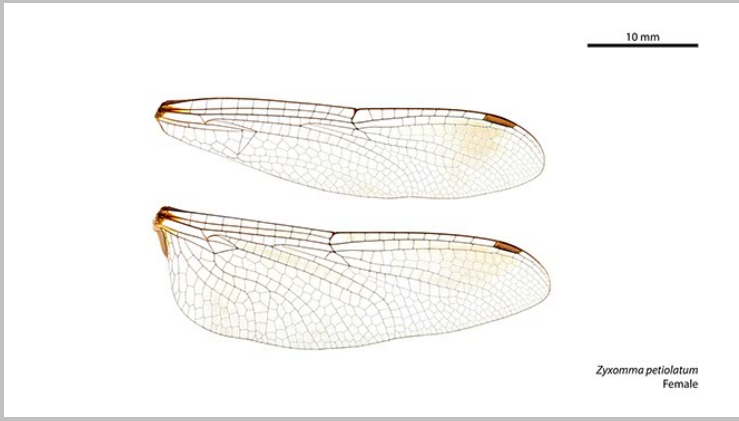


Zyxomma elgneri female

Zyxomma elgneri male

Zyxomma multinervorum female

Zyxomma multinervorum male



Zyxomma petiolatum female

Zyxomma petiolatum male

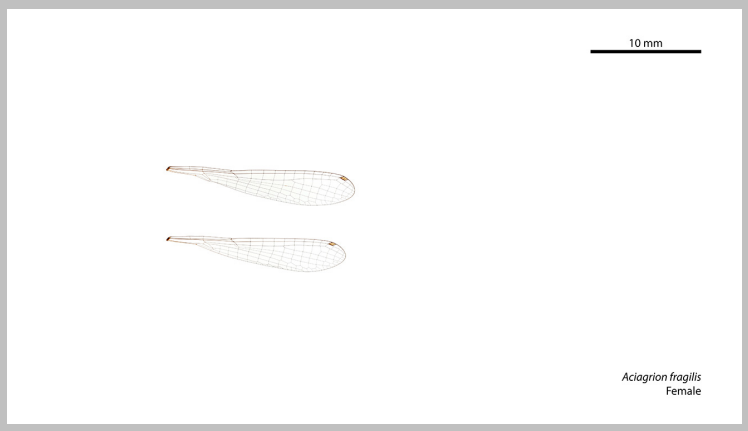
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Appendix 2—Zygoptera wings

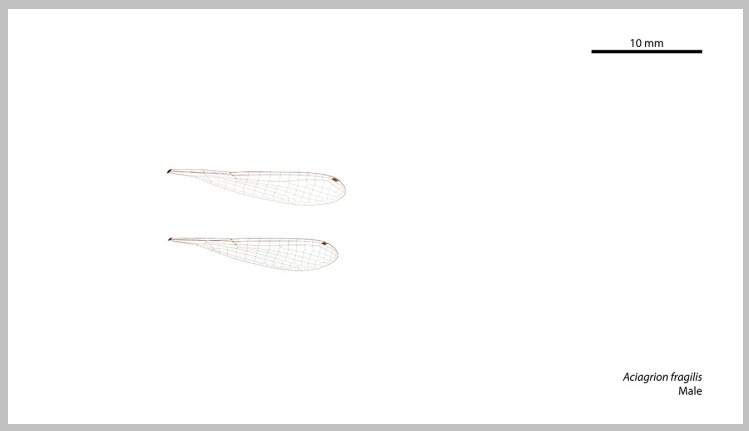
Photographs of female and male wings of 111 species of Australian damselfly (Zygoptera). Each image shows a pair of right wings, a scale, a taxonomic name and sex. A link is provided in Appendix 3 to a high-resolution photograph of each species.

Images presented below are low resolution "thumbnails" providing a visual ready-reckoner and quick guide to more detailed imagery. The entire photographic library, at highest resolution, is openly accessible to view or download from *figshare* as either individual images or as a complete set of Australian Odonata wing images (Tann, 2020a–d).

All damselfly images are presented here at a consistent fixed scale for ready comparison between species.



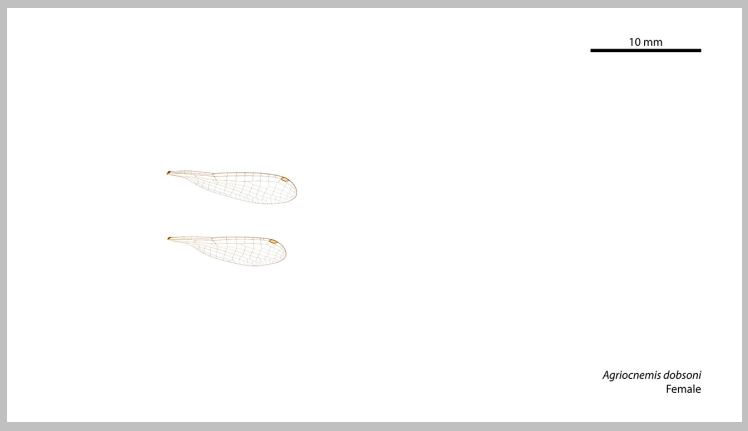
Aciagrion fragilis female



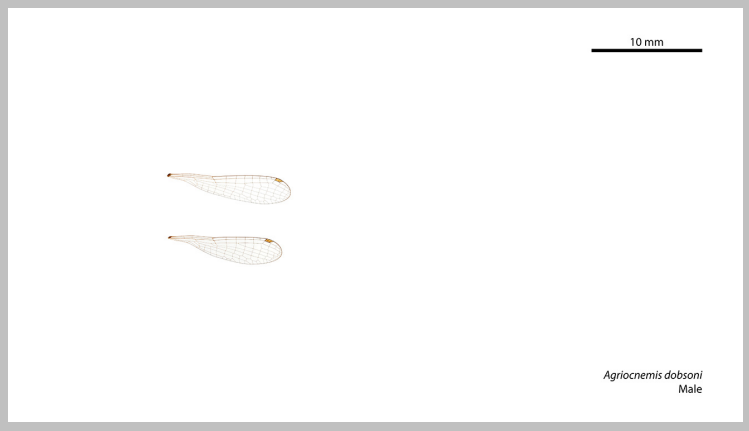
Aciagrion fragilis male

Agriocnemis argentea female

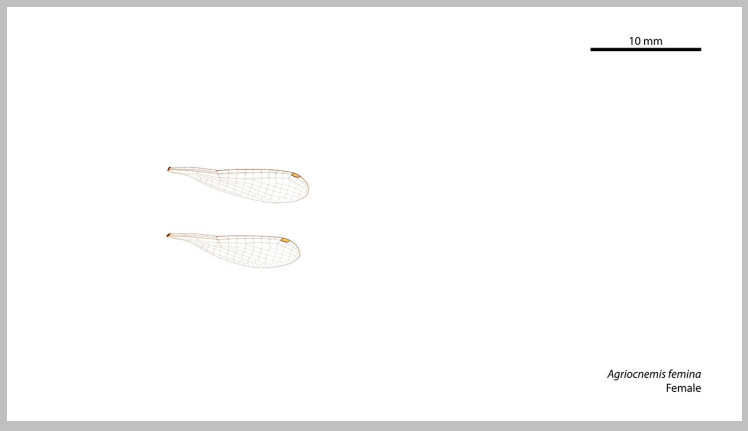
Agriocnemis argentea male



Agriocnemis dobsoni female



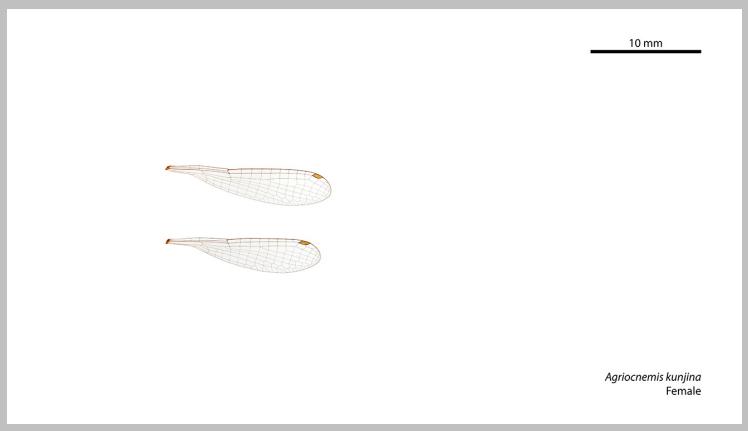
Agriocnemis dobsoni male



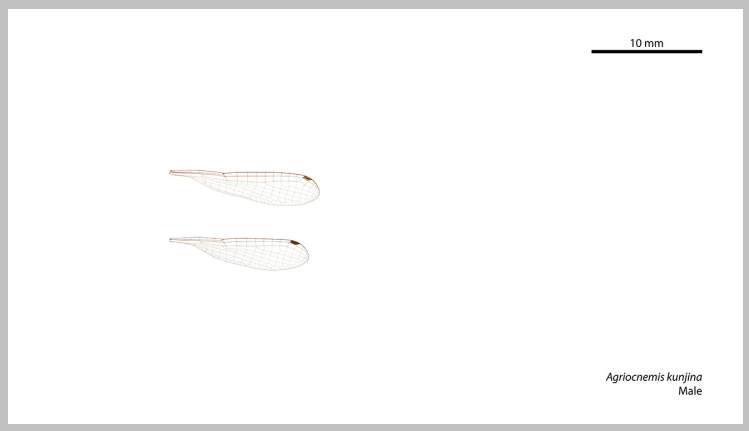
Agriocnemis femina female

Agriocnemis femina male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



Agriocnemis kunjina female



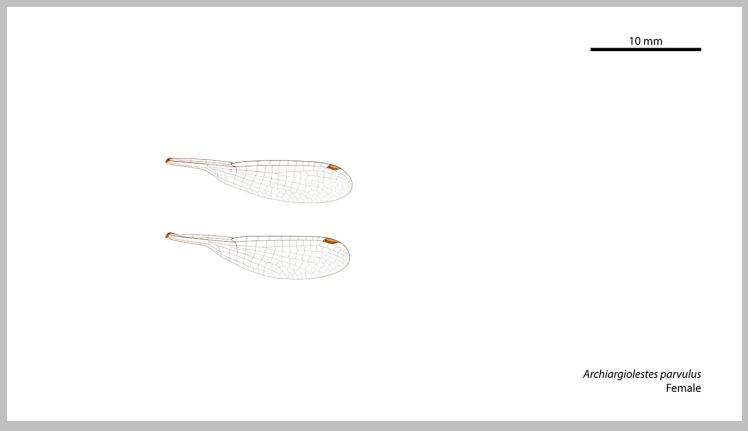
Agriocnemis kunjina male

Agriocnemis pygmaea female

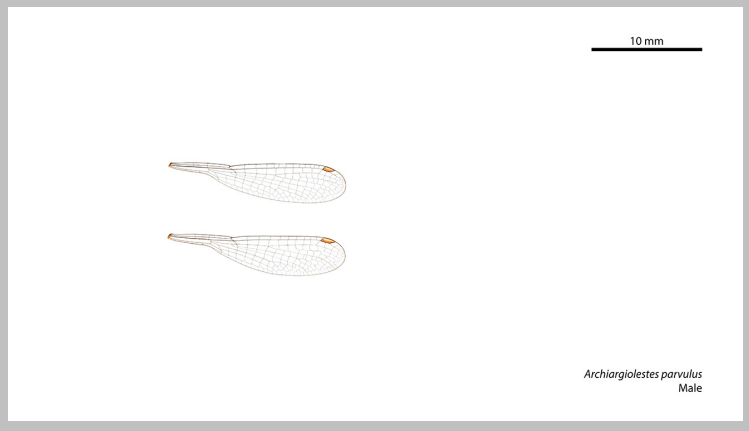
Agriocnemis pygmaea male

Agriocnemis rubricauda female

Agriocnemis rubricauda male

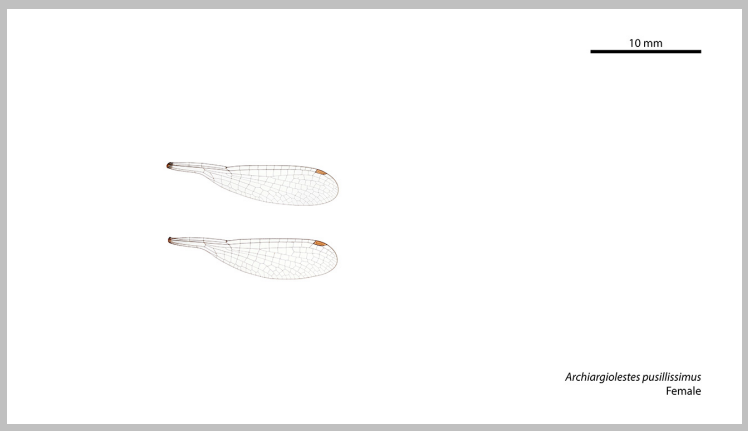


Archiargiolestes parvulus female

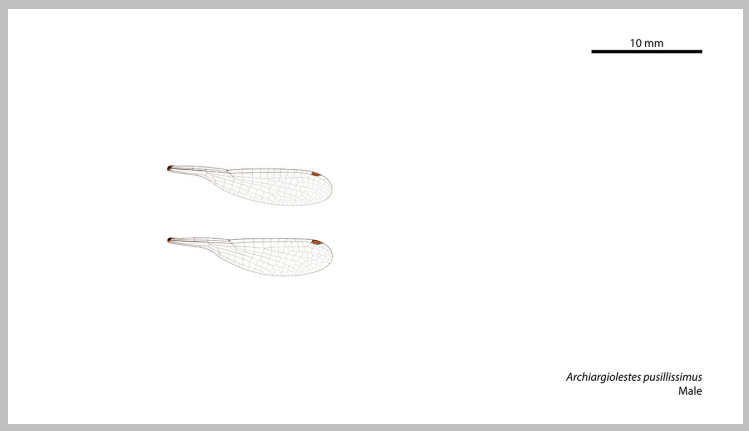


Archiargiolestes parvulus male

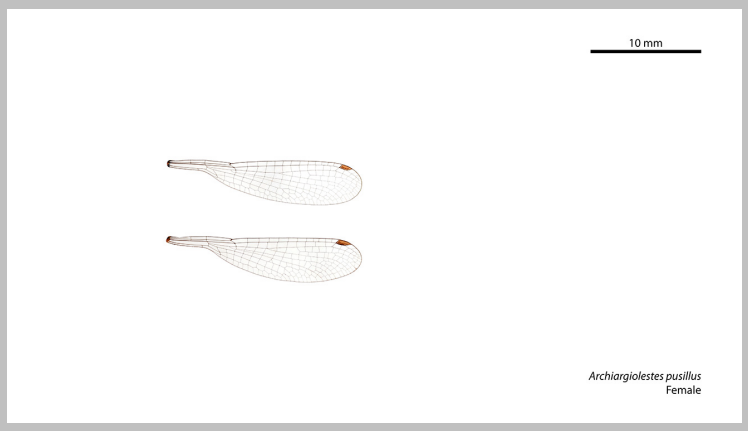
https://doi.org/10.3853/j.1835-4211.33.2021.1767



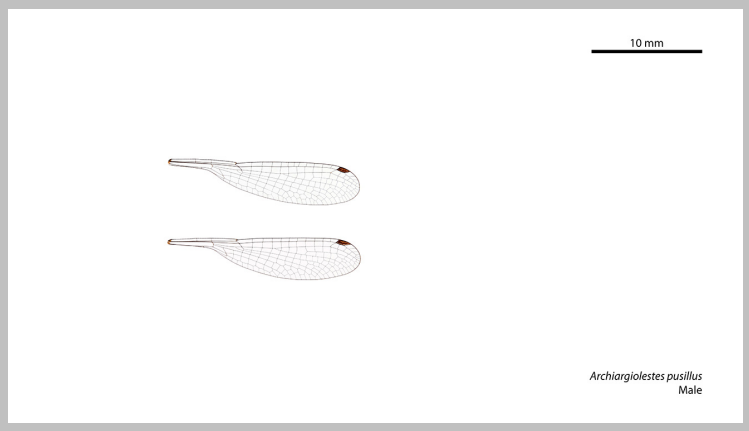
Archiargiolestes pusillissimus female



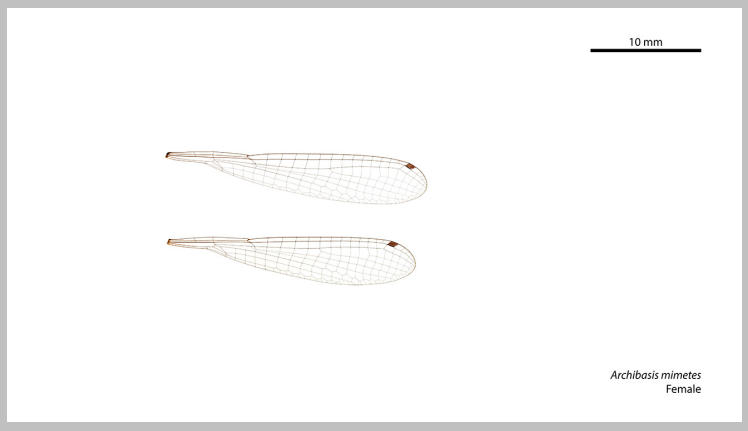
Archiargiolestes pusillissimus male



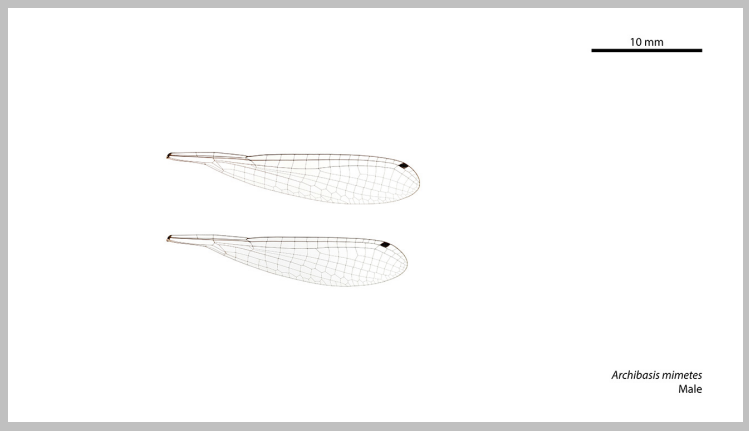
Archiargiolestes pusillus female



Archiargiolestes pusillus male

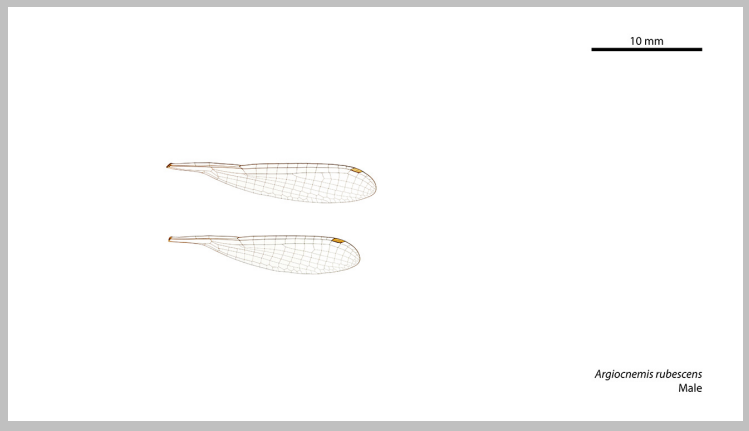


Archibasis mimetes female



Archibasis mimetes male

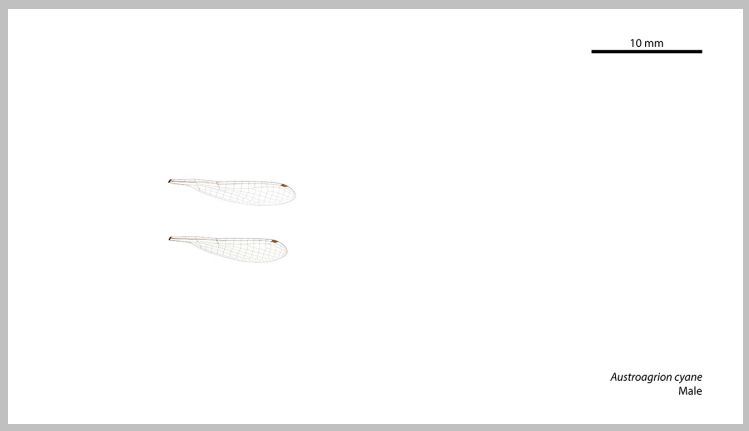
Argiocnemis rubescens female



Argiocnemis rubescens male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Austroagrion cyane female



Austroagrion cyane male

Austroagrion exclamationis female

Austroagrion exclamationis male

Austroagrion pindrina female

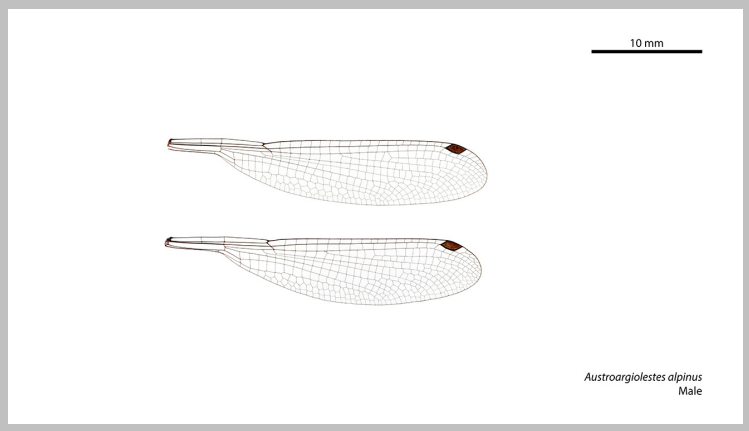
Austroagrion pindrina male

Austroagrion watsoni female

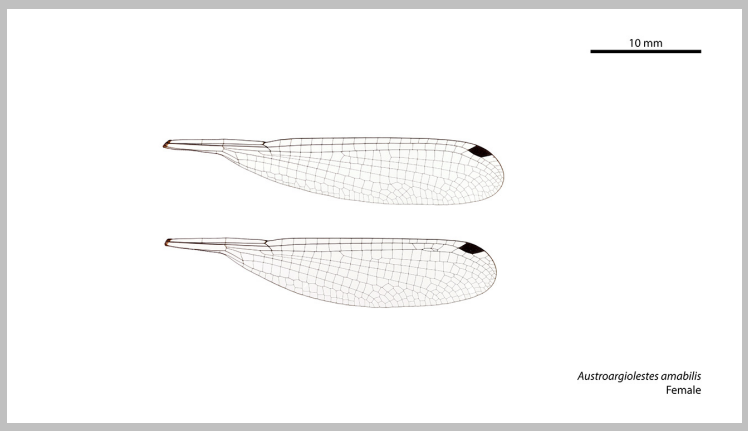
Austroagrion watsoni male

https://doi.org/10.3853/j.1835-4211.33.2021.1767

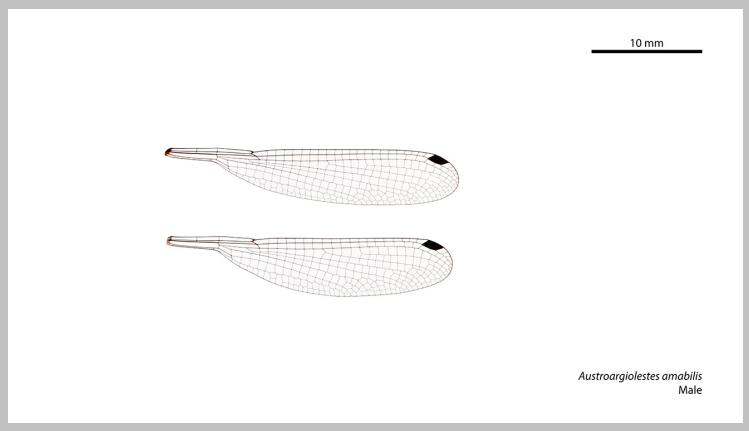
Austroargiolestes alpinus female



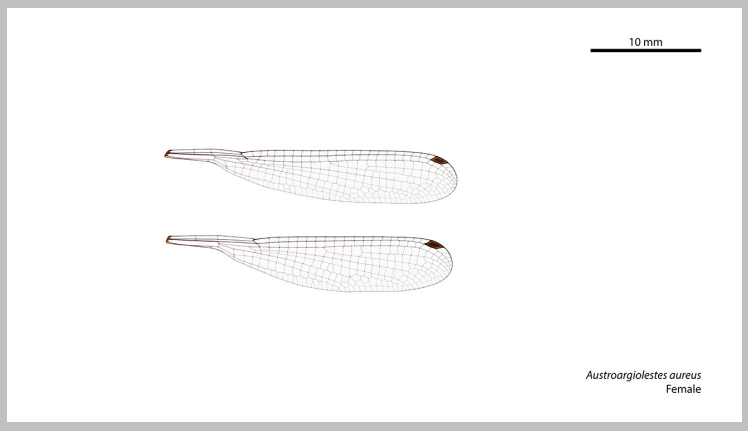
Austroargiolestes alpinus male



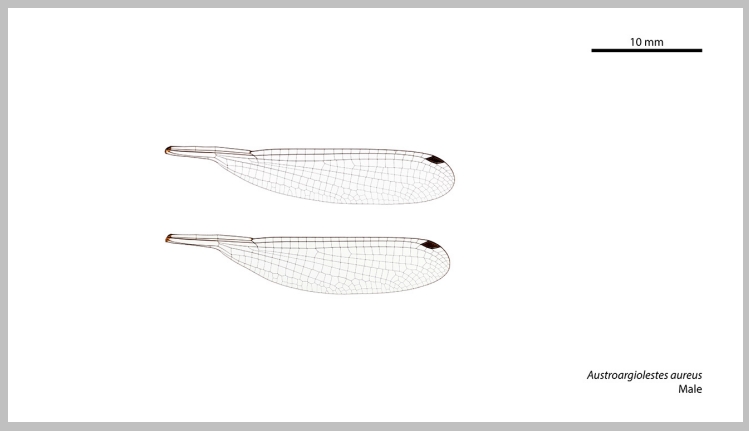
Austroargiolestes amabilis female



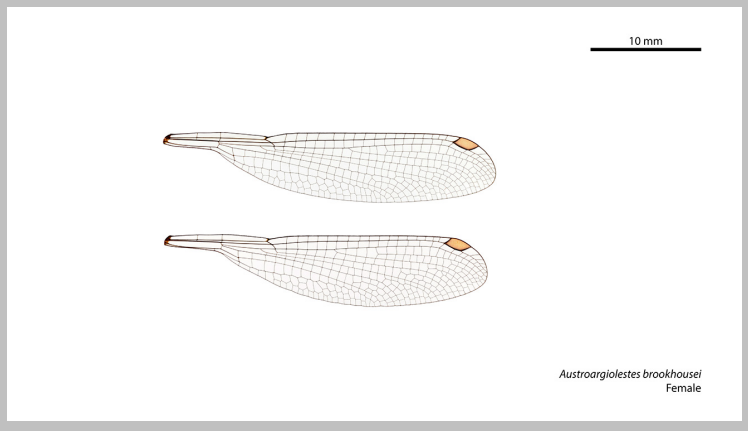
Austroargiolestes amabilis male



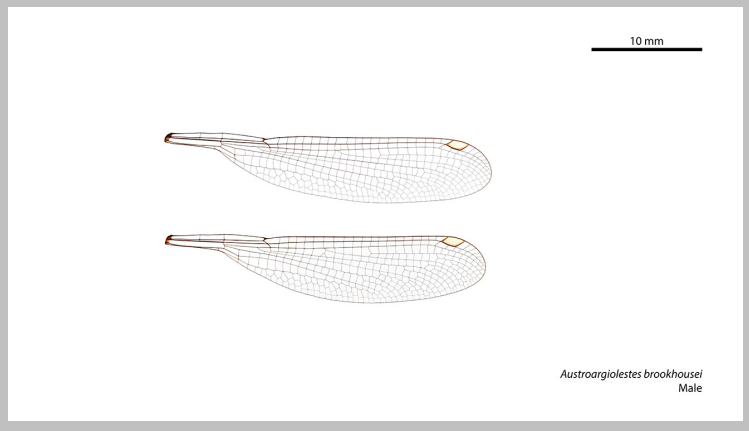
Austroargiolestes aureus female



Austroargiolestes aureus male

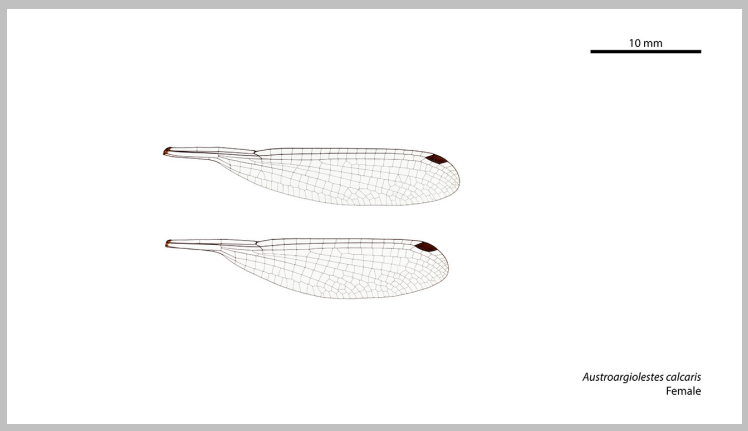


Austroargiolestes brookhousei female

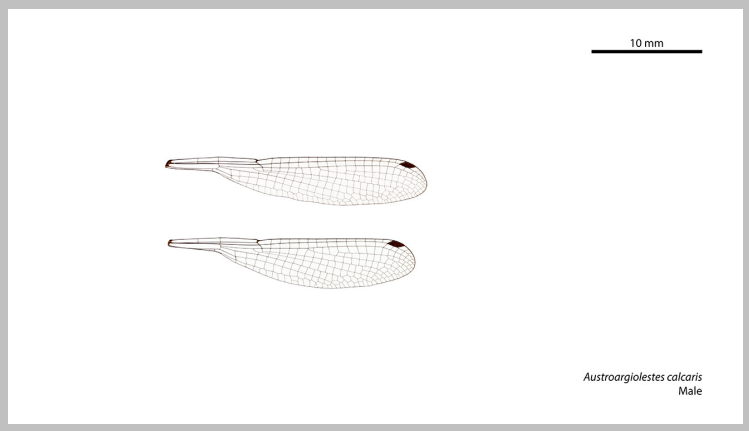


Austroargiolestes brookhousei male

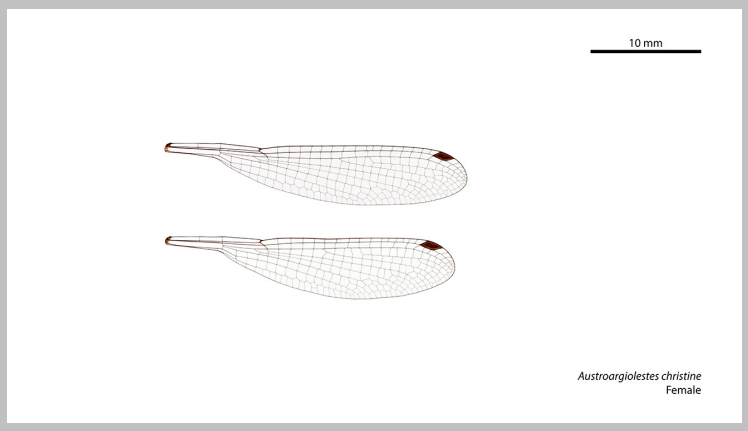
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



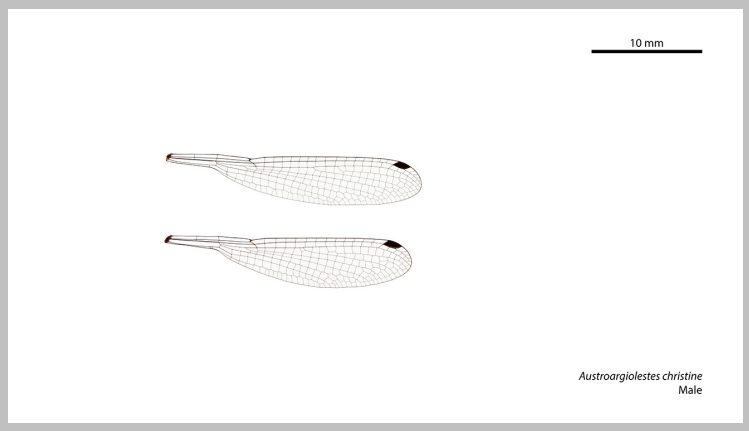
Austroargiolestes calcaris female



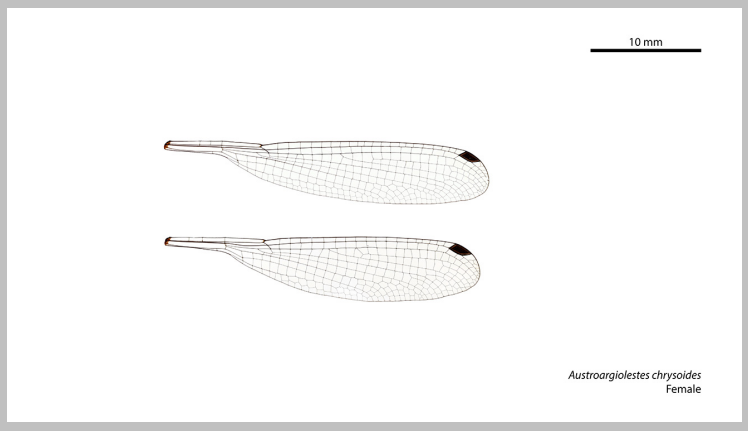
Austroargiolestes calcaris male



Austroargiolestes christine female



Austroargiolestes christine male



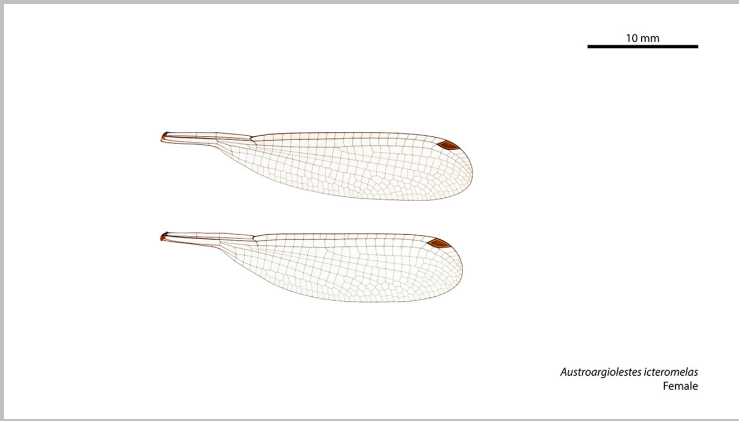
Austroargiolestes chrysoides female

Austroargiolestes chrysoides male

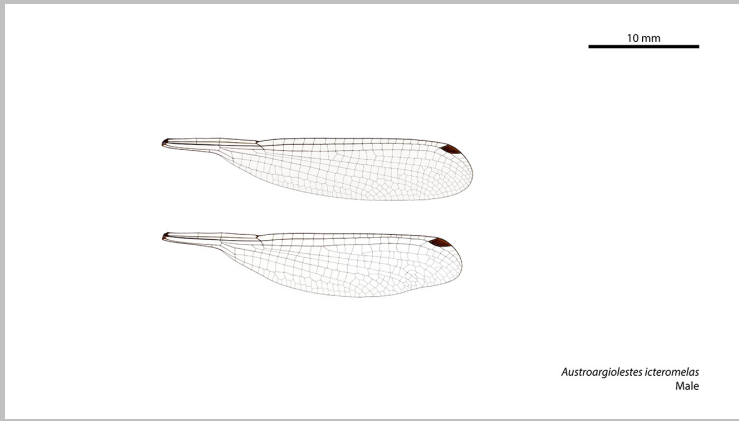
Austroargiolestes elke female

Austroargiolestes elke male

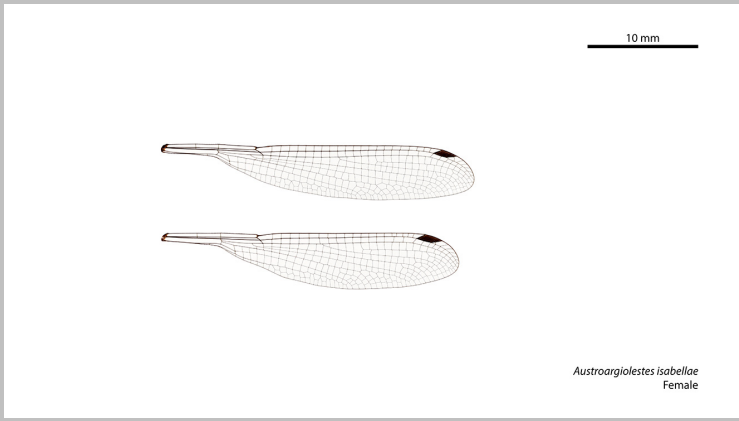
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



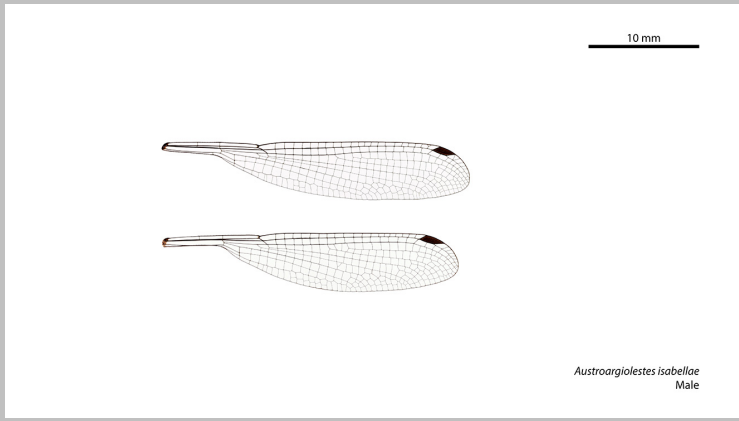
Austroargiolestes icteromelas female



Austroargiolestes icteromelas male



Austroargiolestes isabellae female



Austroargiolestes isabellae male

Austrocnemis maccullochi female

Austrocnemis maccullochi male

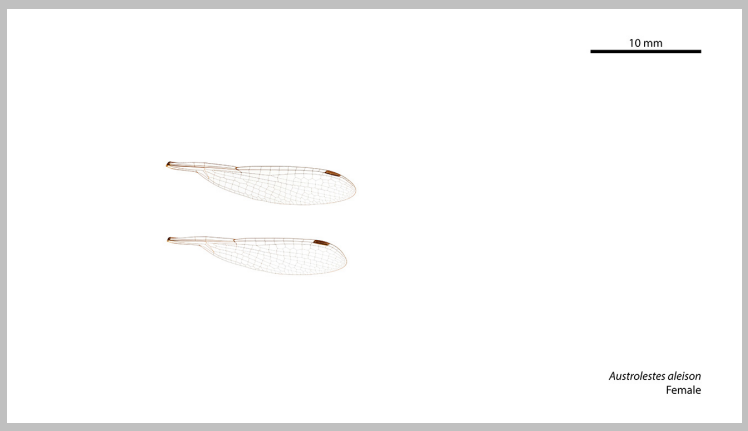
Austrocnemis obscura female

Austrocnemis obscura male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

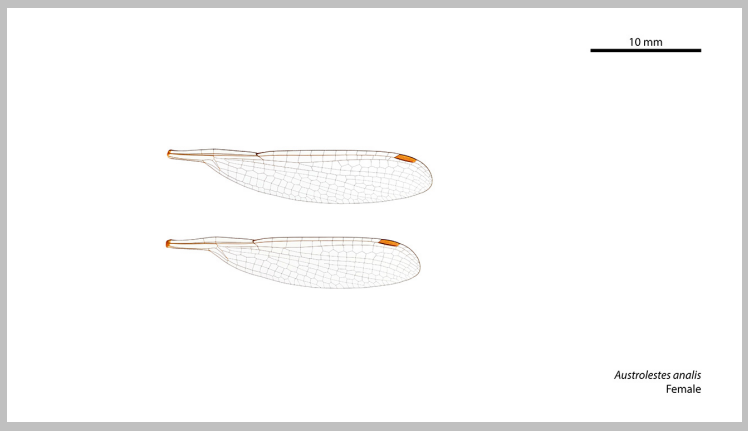
Austrocnemis splendida female

Austrocnemis splendida male



Austrolestes aleison female

Austrolestes aleison male



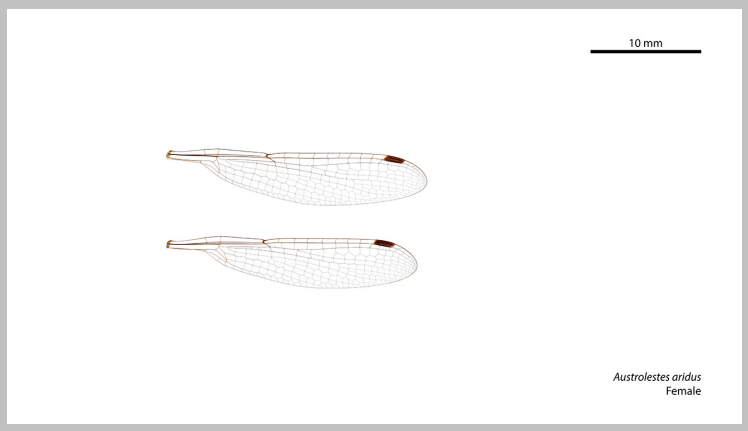
Austrolestes analis female

Austrolestes analis male

Austrolestes annulosus female

Austrolestes annulosus male

https://doi.org/10.3853/j.1835-4211.33.2021.1767

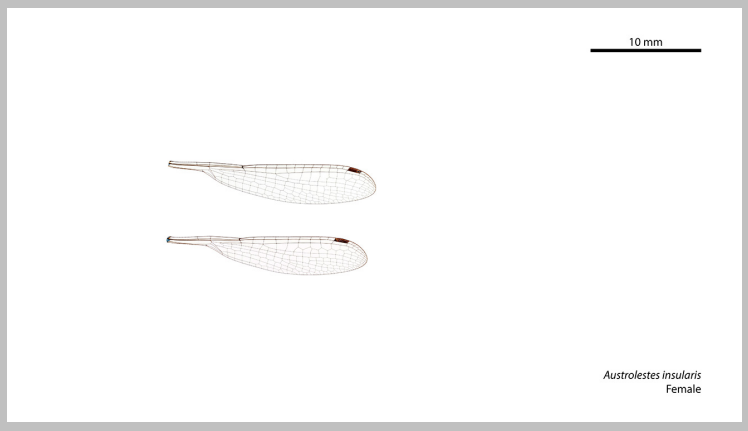


Austrolestes aridus female

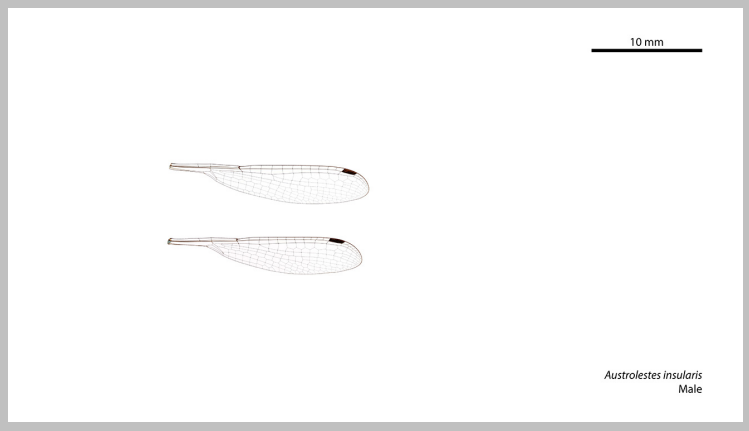
Austrolestes aridus male

Austrolestes cingulatus female

Austrolestes cingulatus male

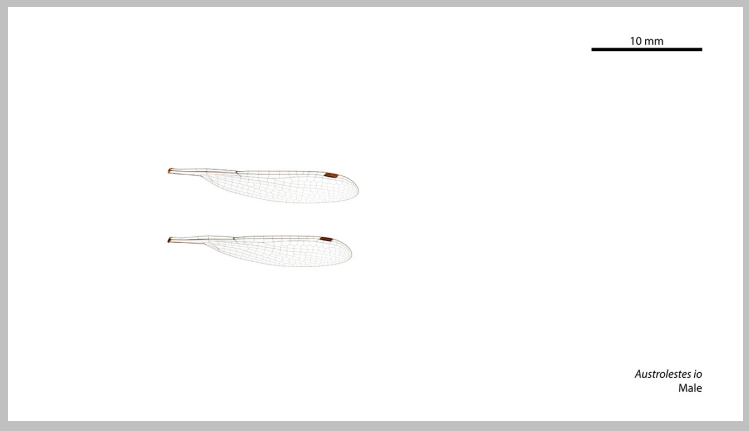


Austrolestes insularis female



Austrolestes insularis male

Austrolestes io female



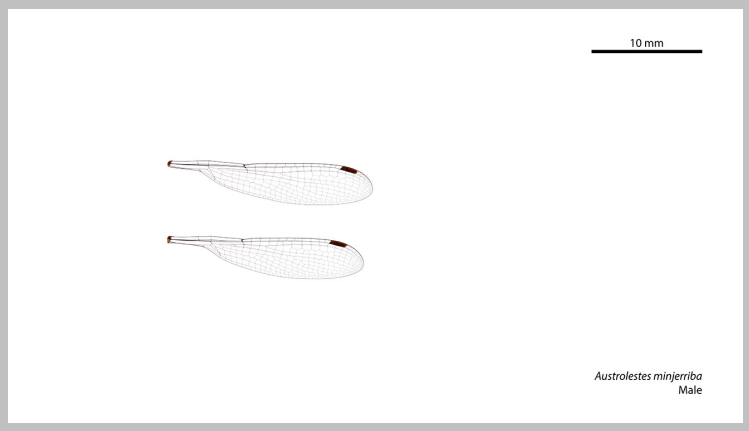
Austrolestes io male

https://doi.org/10.3853/j.1835-4211.33.2021.1767

Austrolestes leda female

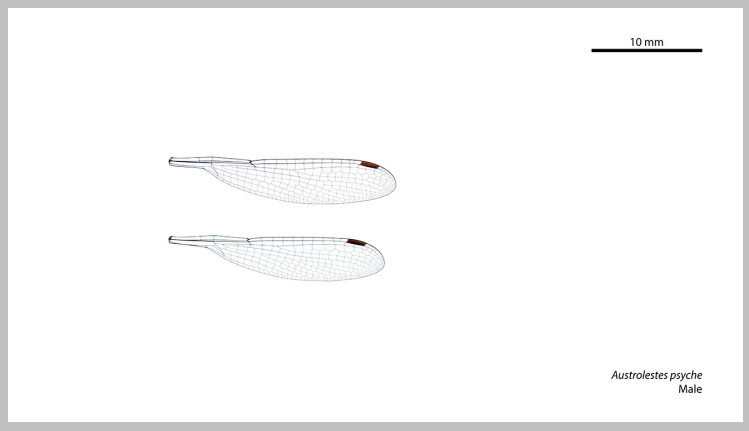
Austrolestes leda male

Austrolestes minjerriba female

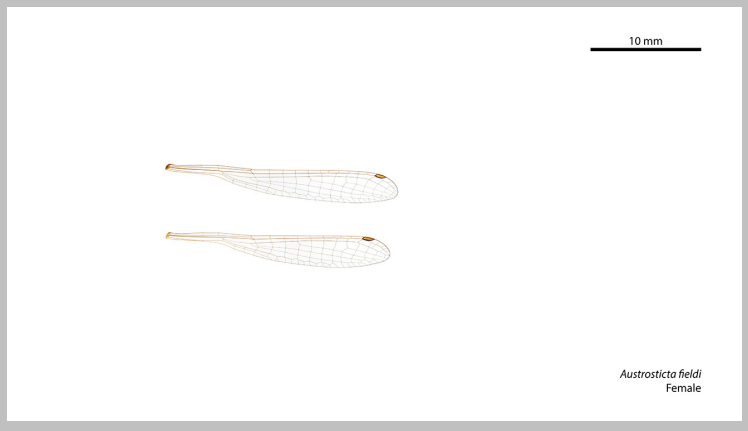


Austrolestes minjerriba male

Austrolestes psyche female



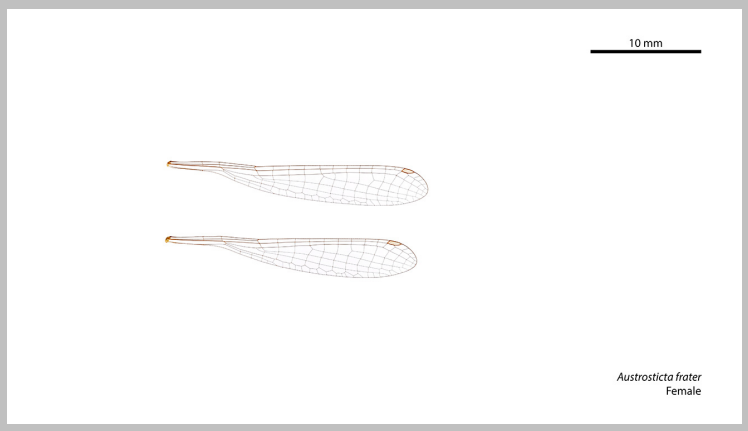
Austrolestes psyche male



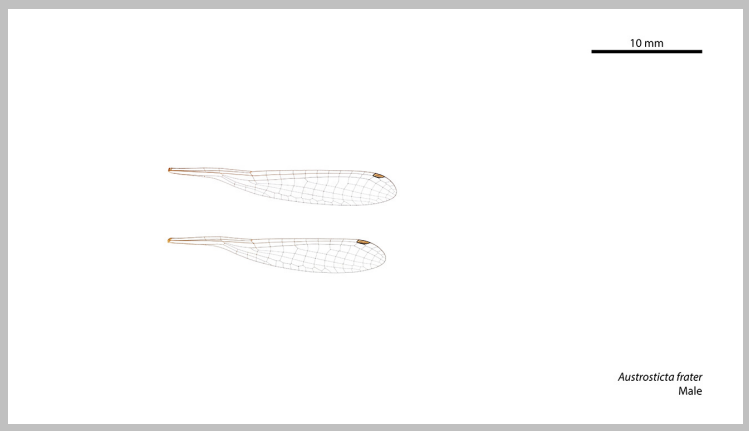
Austrosticta fieldi female

Austrosticta fieldi male

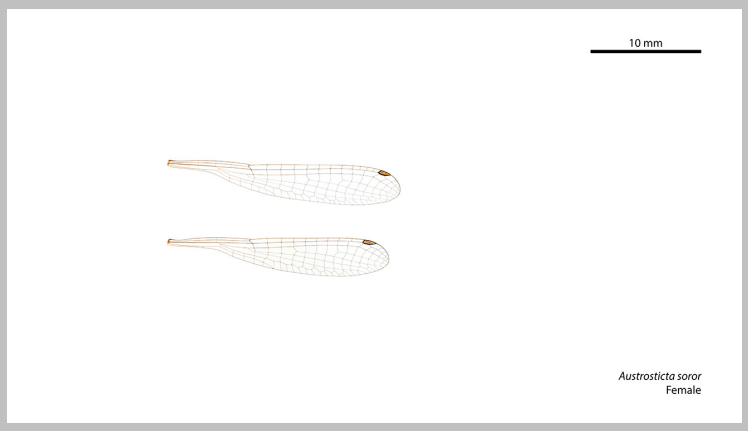
https://doi.org/10.3853/j.1835-4211.33.2021.1767



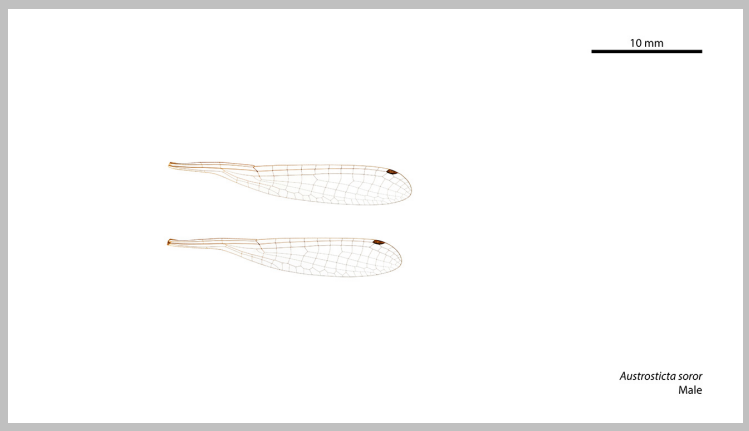
Austrosticta frater female



Austrosticta frater male



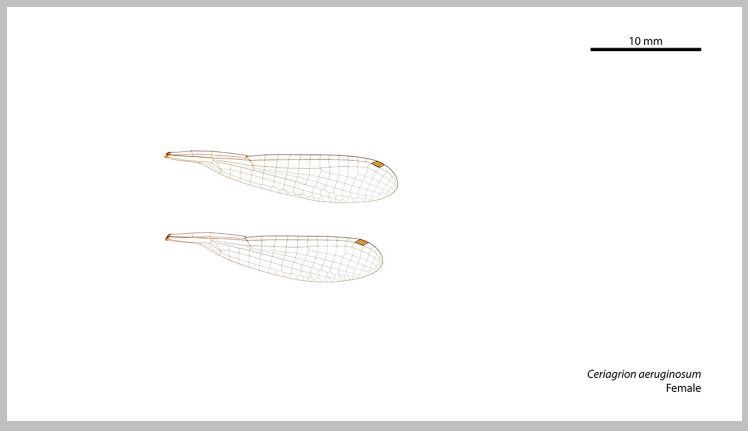
Austrosticta soror female



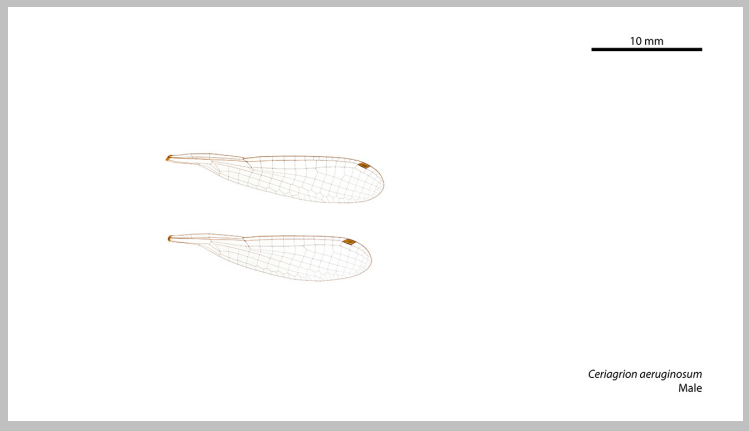
Austrosticta soror male

Caliagrion billinghursti female

Caliagrion billinghursti male

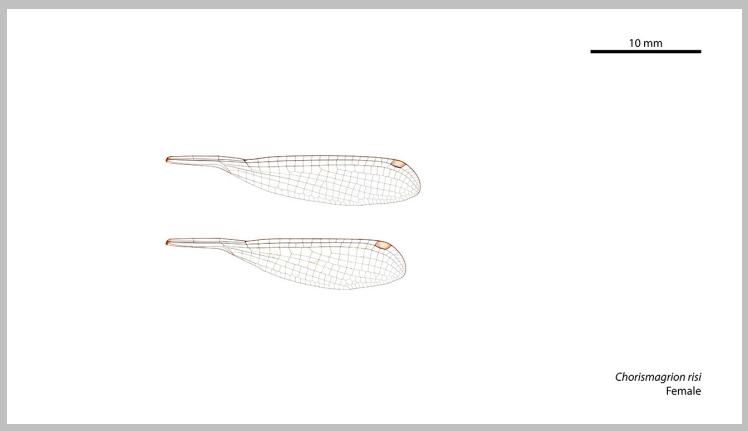


Ceriagrion aeruginosum female

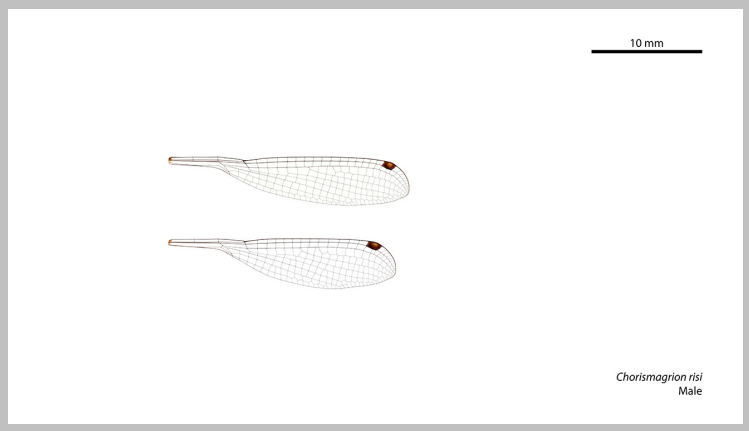


Ceriagrion aeruginosum male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



Chorismagrion risi female



Chorismagrion risi male

Coenagrion lyelli female

Coenagrion lyelli male

Diphlebia coerulescens female

Diphlebia coerulescens male

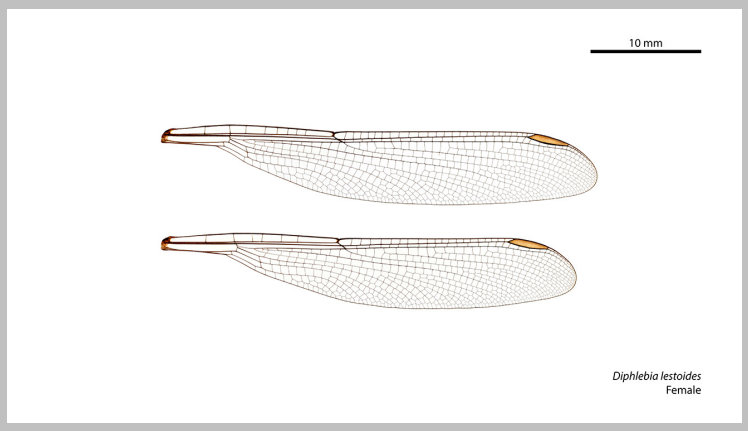
Diphlebia euphoeoides female

Diphlebia euphoeoides male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Diphlebia hybridoides female

Diphlebia hybridoides male

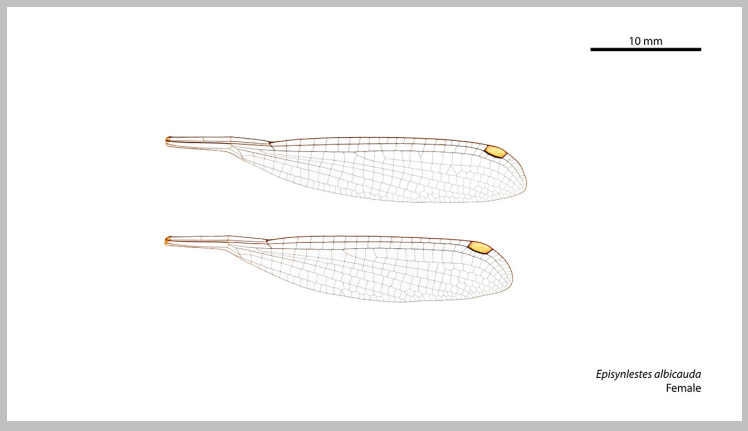


Diphlebia lestoides female

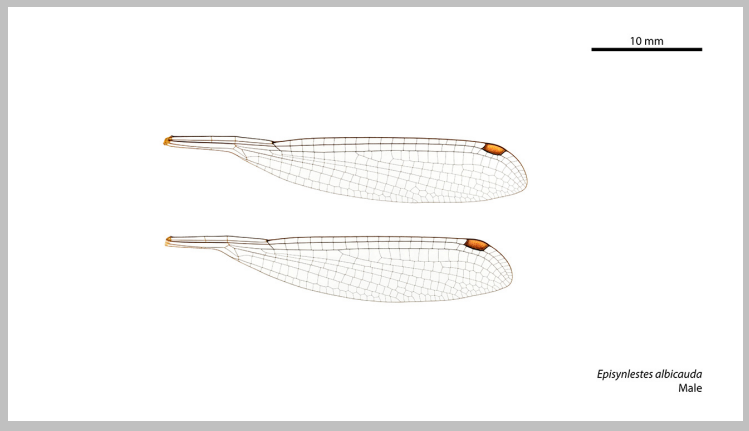
Diphlebia lestoides male

Diphlebia nymphoides female

Diphlebia nymphoides male

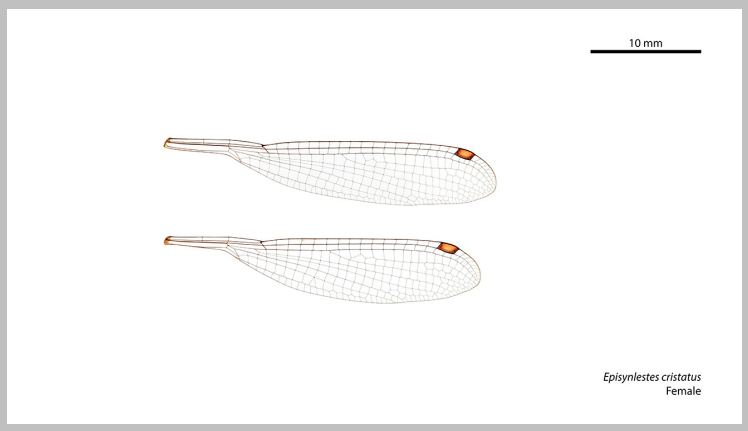


Episynlestes albicauda female

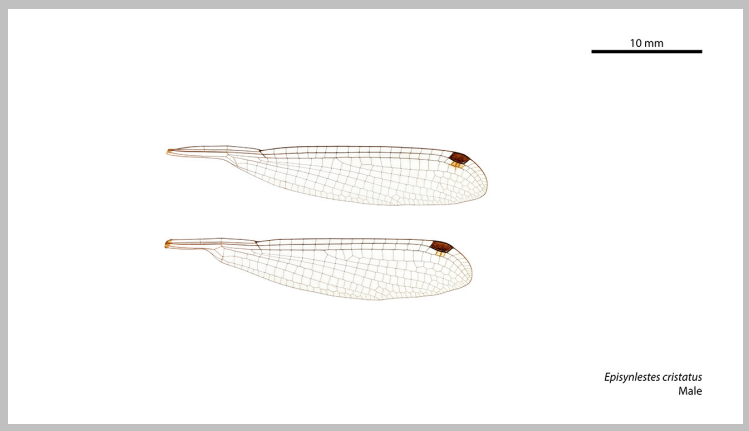


Episynlestes albicauda male

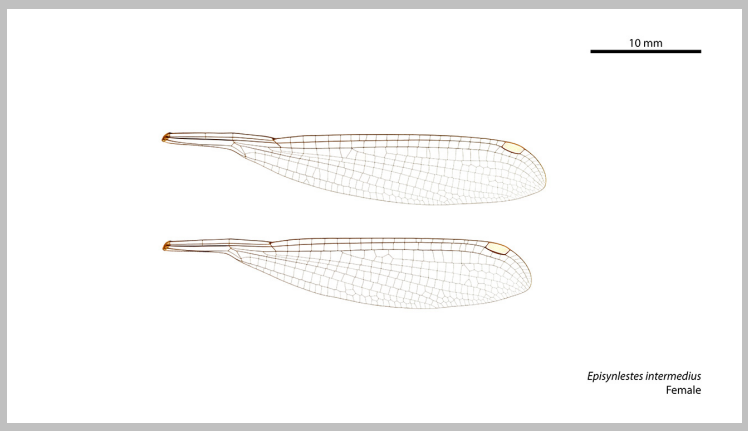
https://doi.org/10.3853/j.1835-4211.33.2021.1767



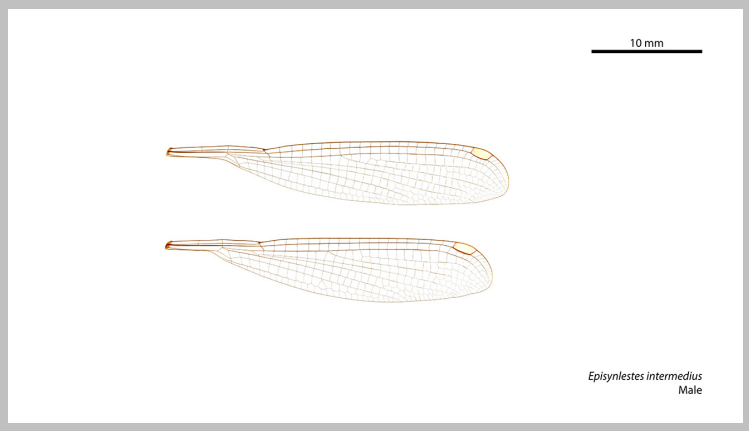
Episynlestes cristatus female



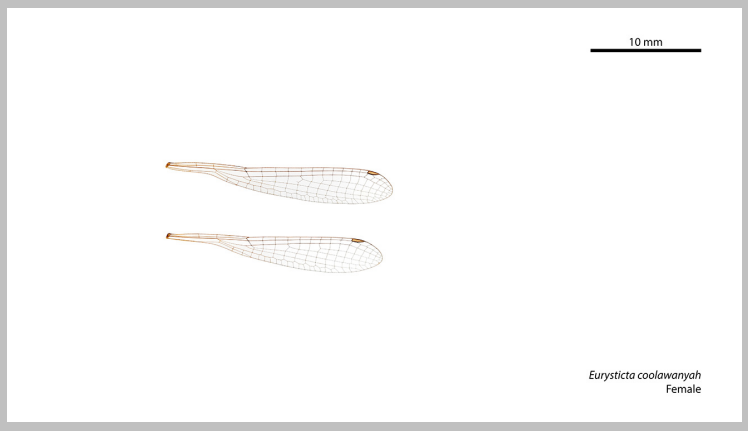
Episynlestes cristatus male



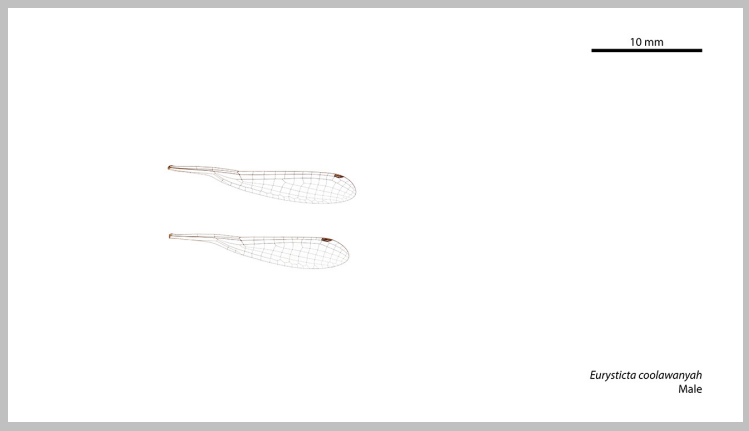
Episynlestes intermedius female



Episynlestes intermedius male



Eurysticta coolawanyah female

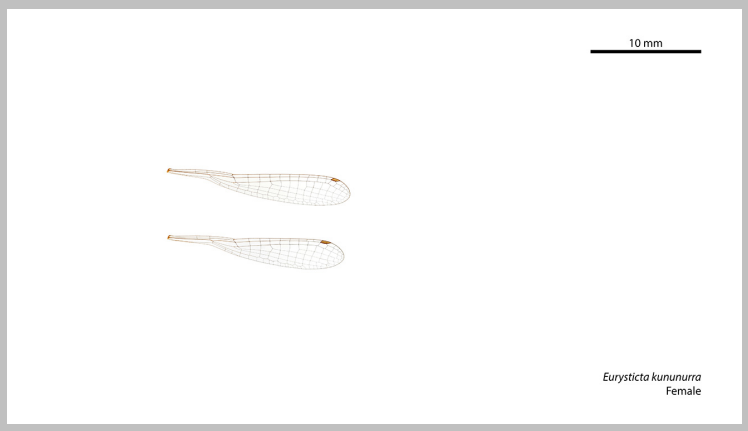


Eurysticta coolawanyah male

Eurysticta coomalie female

Eurysticta coomalie male

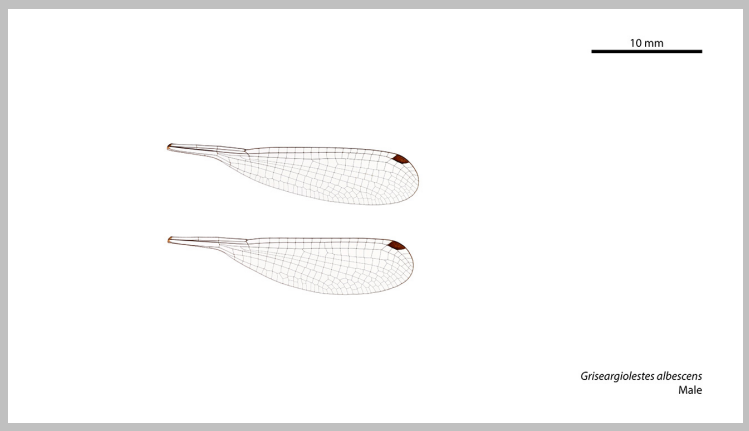
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



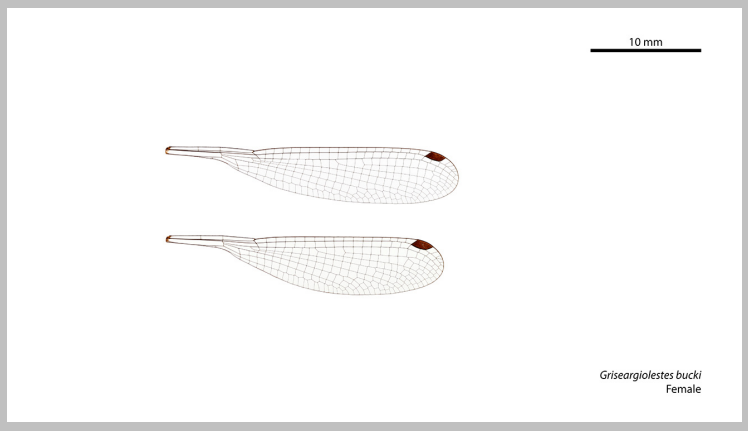
Eurysticta kununurra female

Eurysticta kununurra male

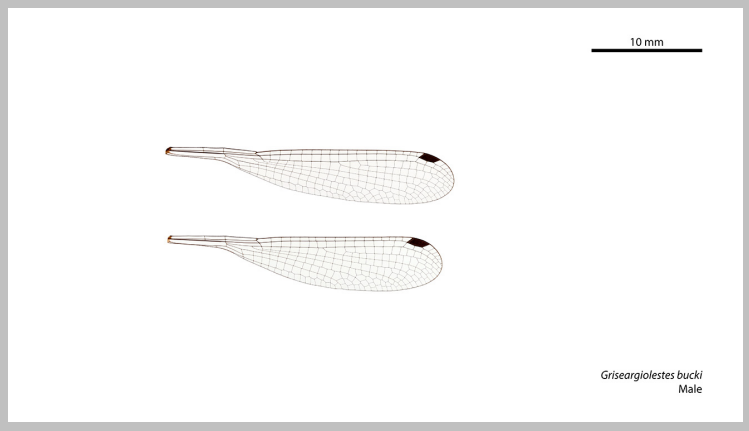
Griseargiolestes albescens female



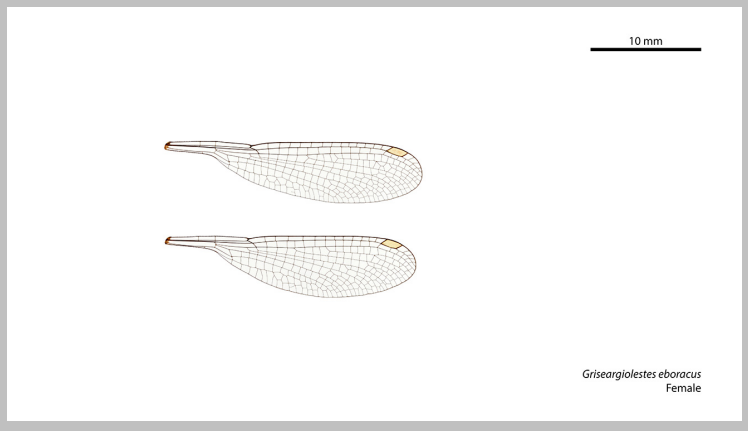
Griseargiolestes albescens male



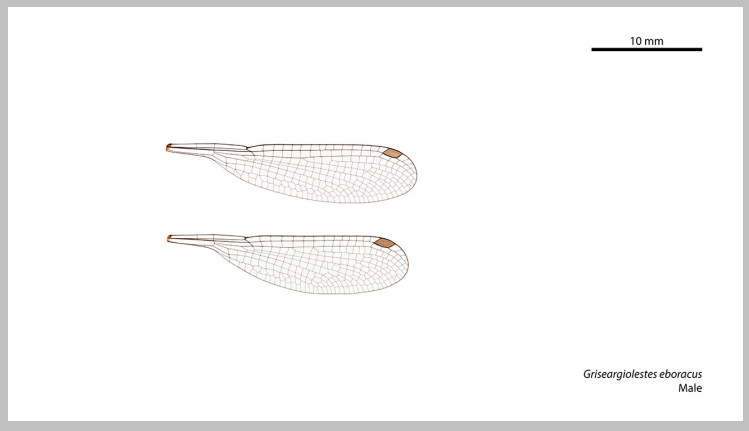
Griseargiolestes bucki female



Griseargiolestes bucki male

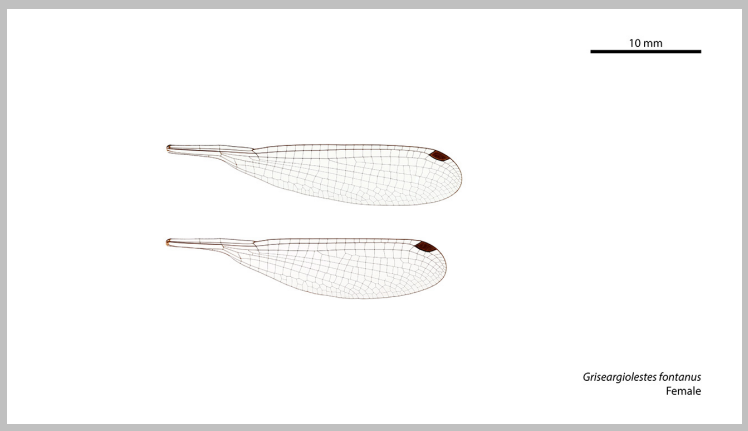


Griseargiolestes eboracus female

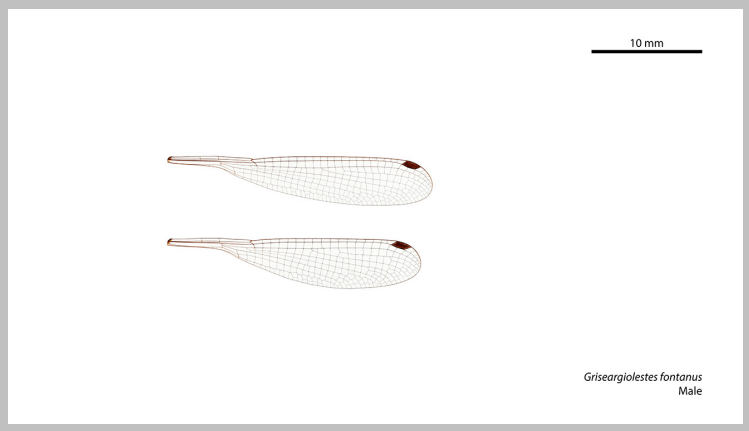


Griseargiolestes eboracus male

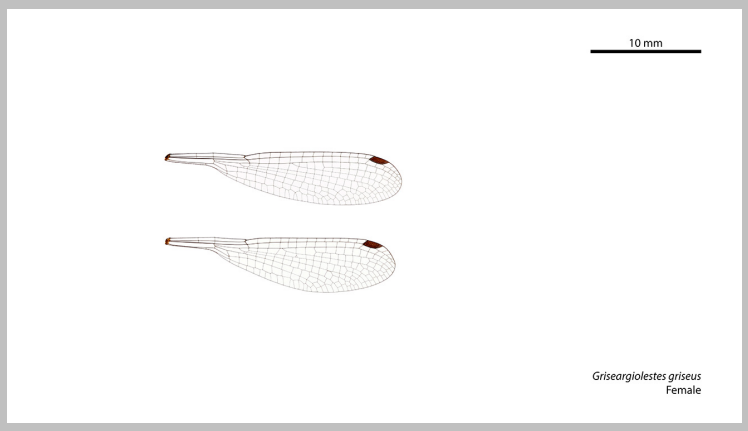
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



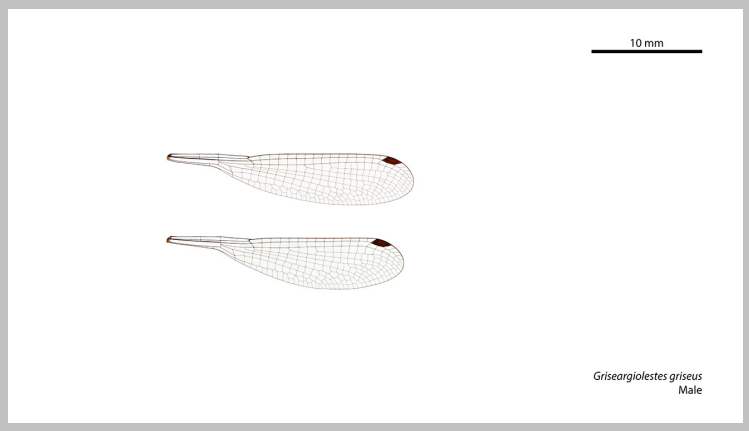
Griseargiolestes fontanus female



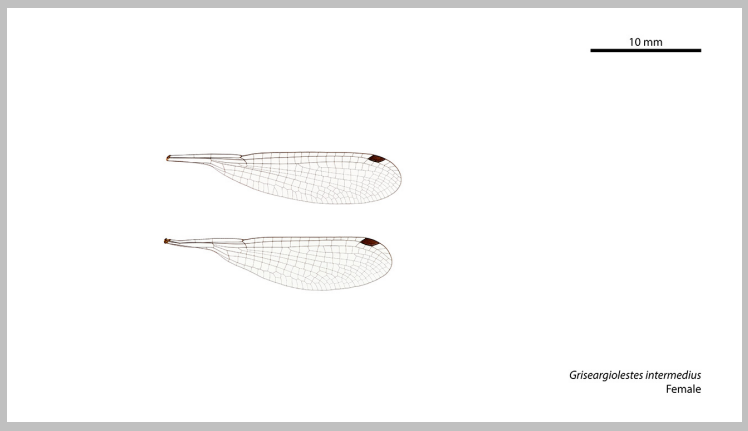
Griseargiolestes fontanus male



Griseargiolestes griseus female



Griseargiolestes griseus male



Griseargiolestes intermedius female

Griseargiolestes intermedius male

Griseargiolestes metallicus female

Griseargiolestes metallicus male

https://doi.org/10.3853/j.1835-4211.33.2021.1767

Hemiphlebia mirabilis female

Hemiphlebia mirabilis male

Indolestes alleni female

Indolestes alleni male

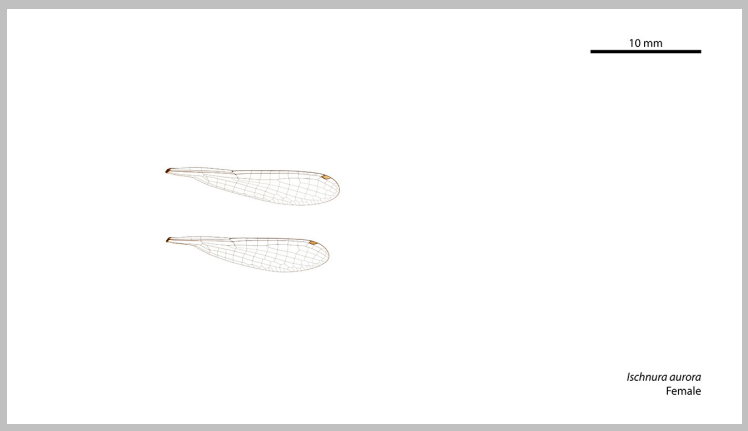
Indolestes obiri female

Indolestes obiri male

Indolestes tenuissimus female

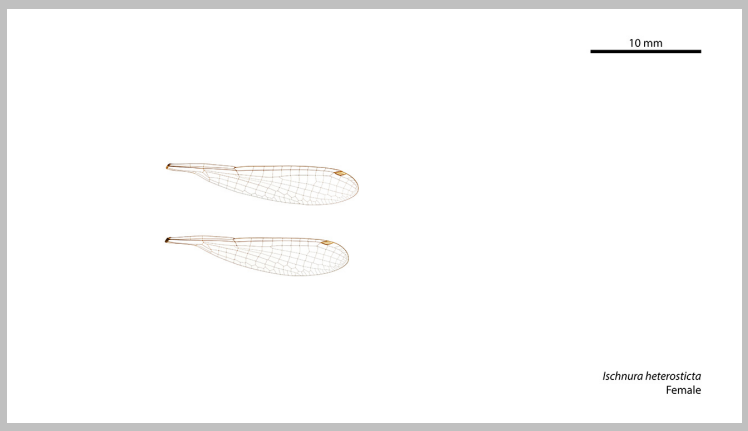
Indolestes tenuissimus male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

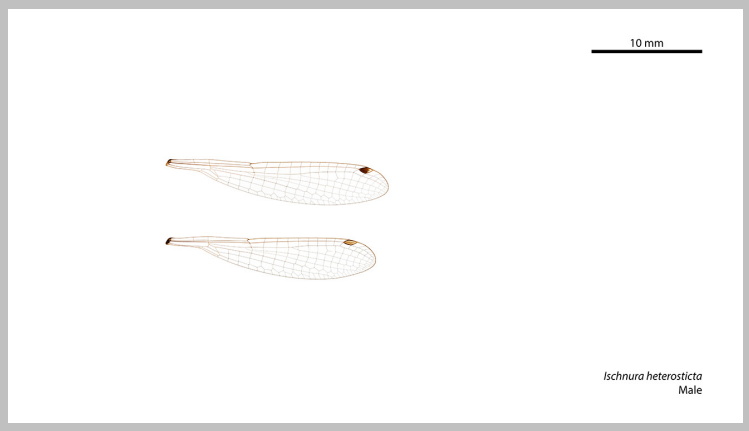


Ischnura aurora female

Ischnura aurora male



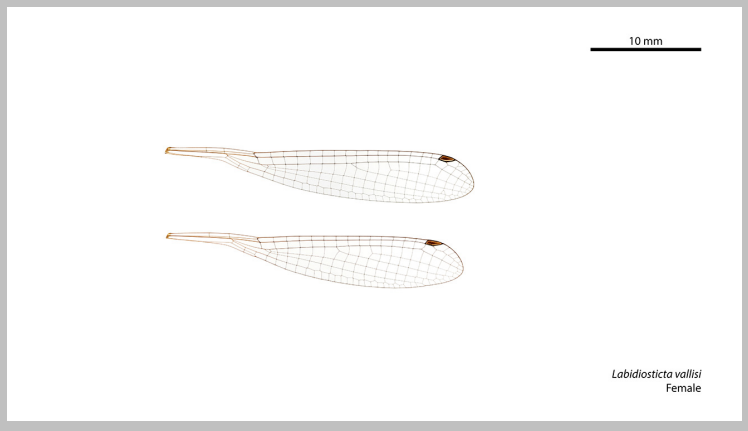
Ischnura heterosticta female



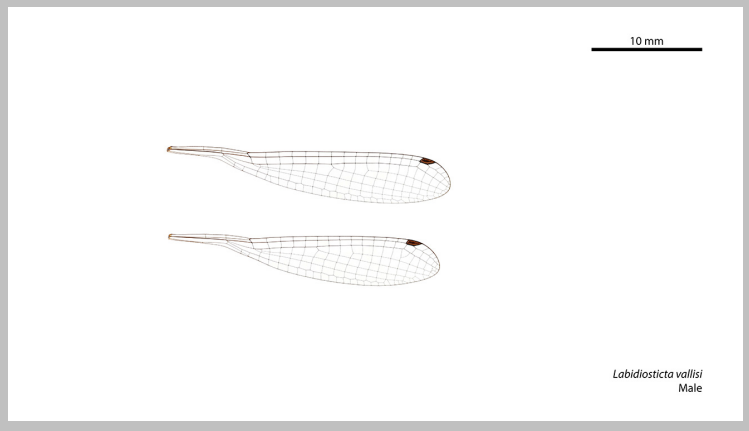
Ischnura heterosticta male

Ischnura pruinescens female

Ischnura pruinescens male



Labidiosticta vallisi female



Labidiosticta vallisi male

https://doi.org/10.3853/j.1835-4211.33.2021.1767

Lestes concinnus female

Lestes concinnus male

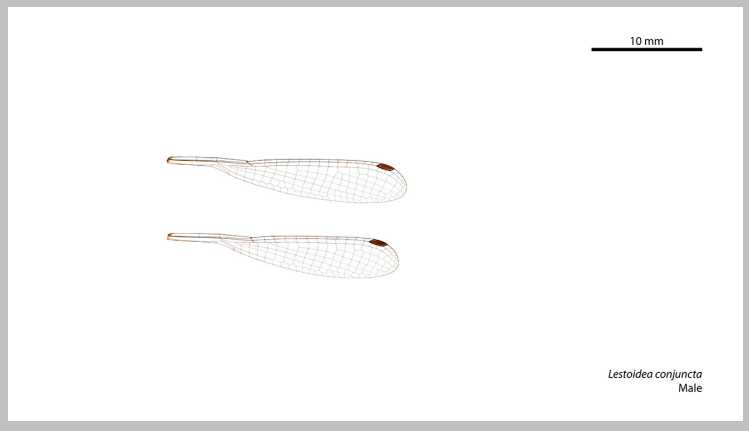
Lestoidea barbarae female

Lestoidea barbarae male

Lestoidea brevicauda female

Lestoidea brevicauda male

Lestoidea conjuncta female



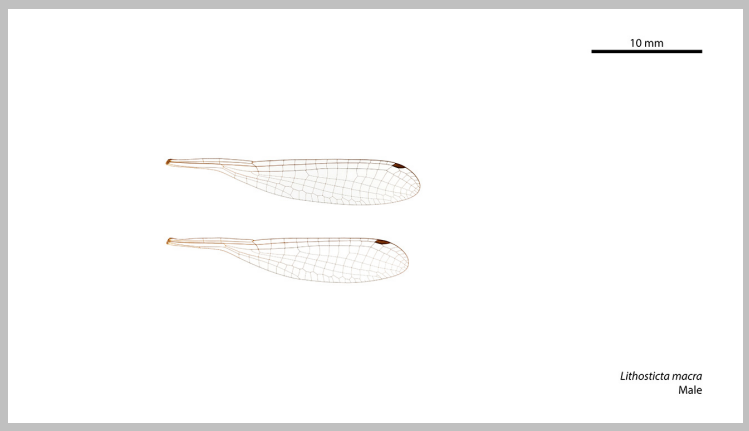
Lestoidea conjuncta male

https://doi.org/10.3853/j.1835-4211.33.2021.1767

Lestoidea lewisiana female

Lestoidea lewisiana male

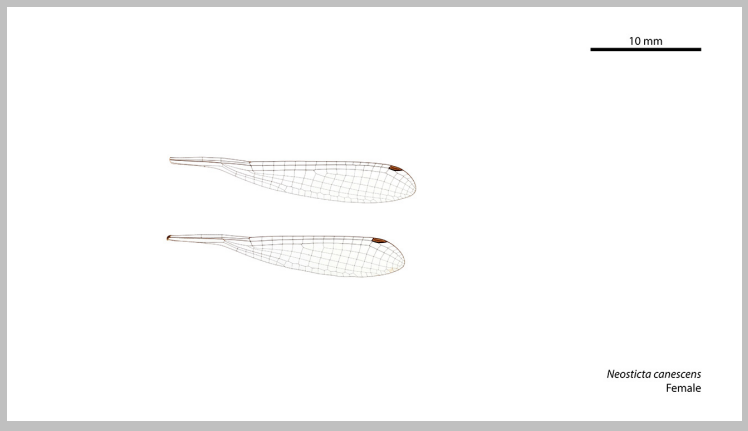
Lithosticta macra female



Lithosticta macra male

Miniargiolestes minimus female

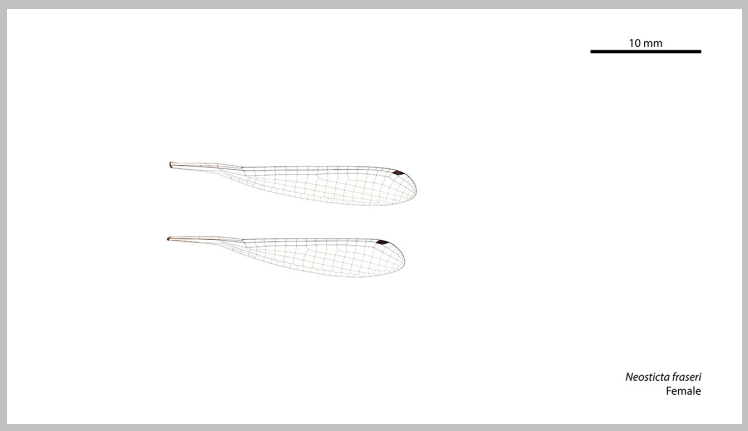
Miniargiolestes minimus male



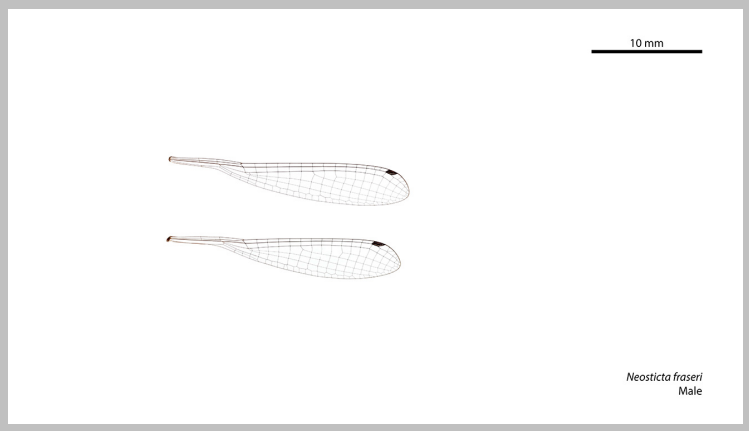
Neosticta canescens female

Neosticta canescens male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

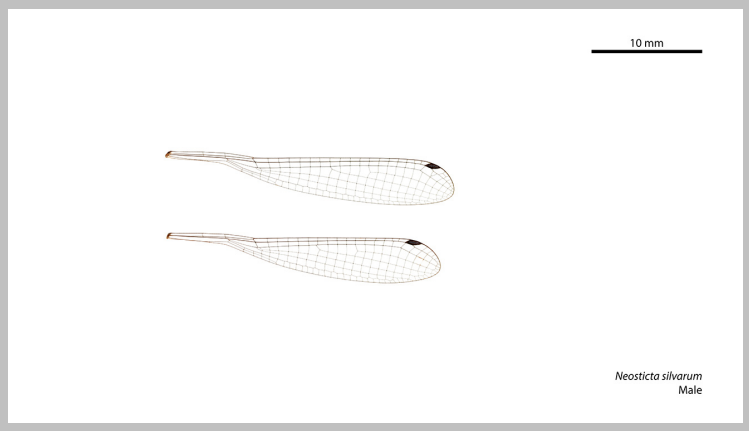


Neosticta fraseri female



Neosticta fraseri male

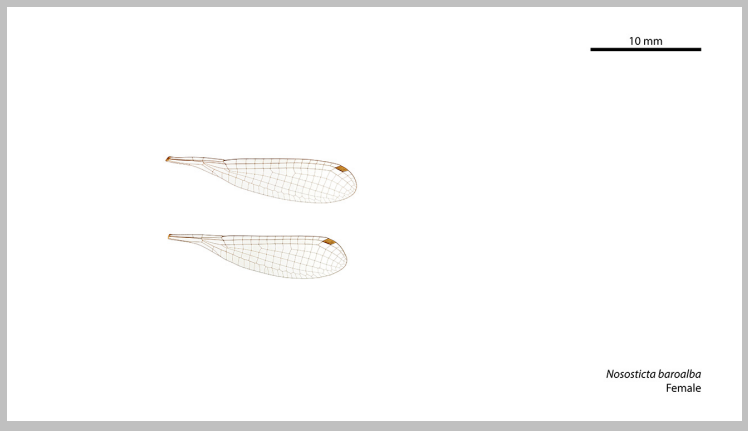
Neosticta silvarum female



Neosticta silvarum male

Neurobasis australis female

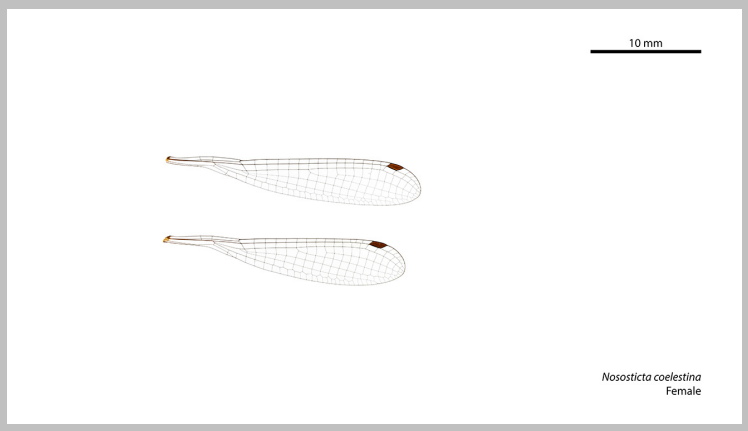
Neurobasis australis male



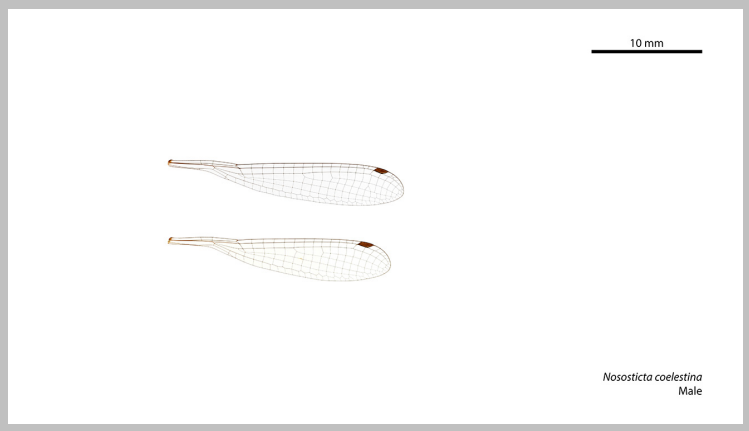
Nososticta baroalba female

Nososticta baroalba male

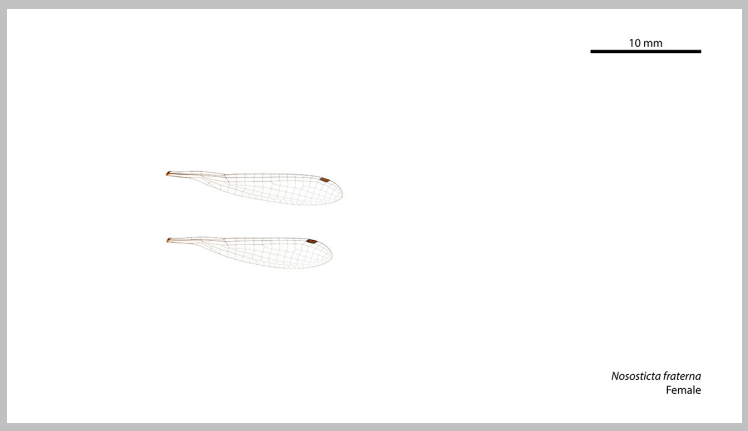
https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)



Nososticta coelestina female

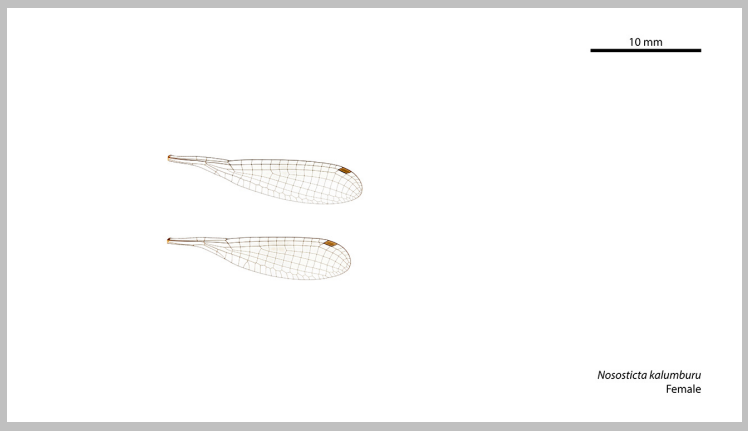


Nososticta coelestina male



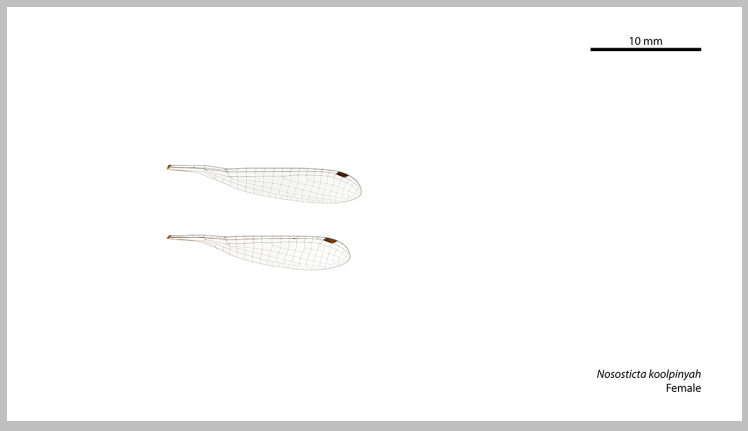
Nososticta fraterna female

Nososticta fraterna male



Nososticta kalumburu female

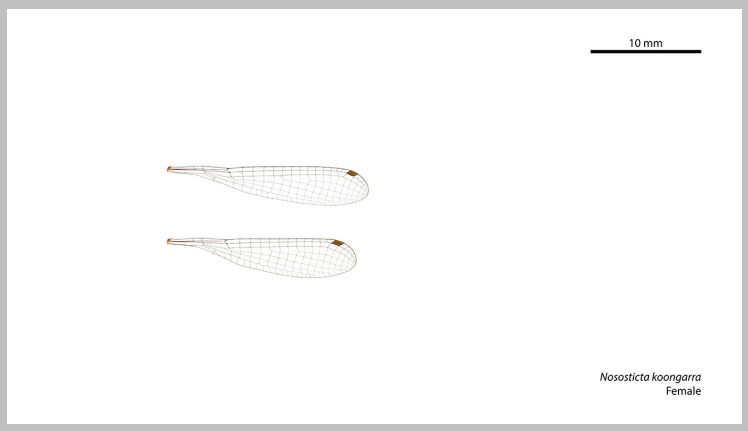
Nososticta kalumburu male



Nososticta koolpinyah female

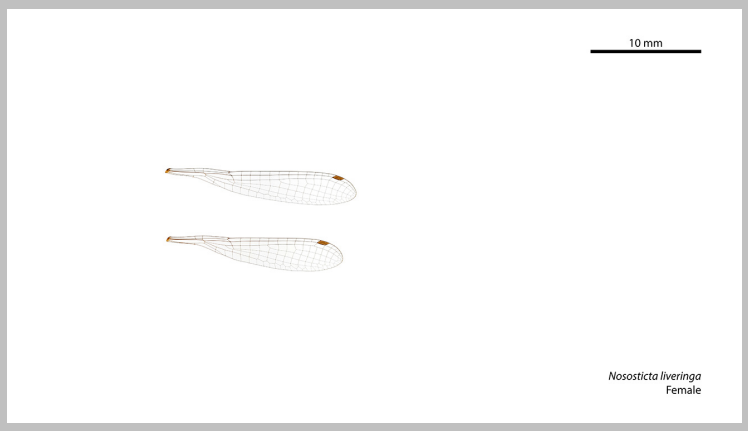
Nososticta koolpinyah male

https://doi.org/10.3853/j.1835-4211.33.2021.1767



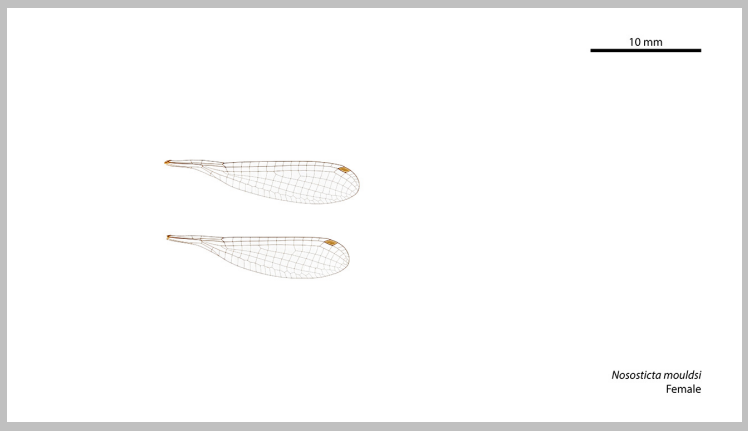
Nososticta koongarra female

Nososticta koongarra male



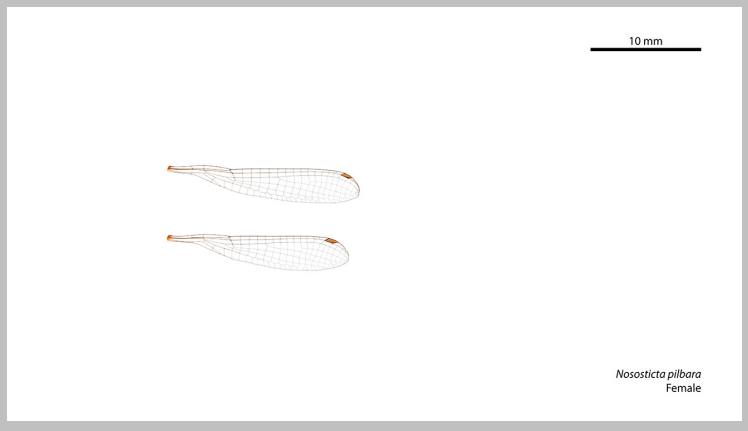
Nososticta liveringa female

Nososticta liveringa male



Nososticta mouldsi female

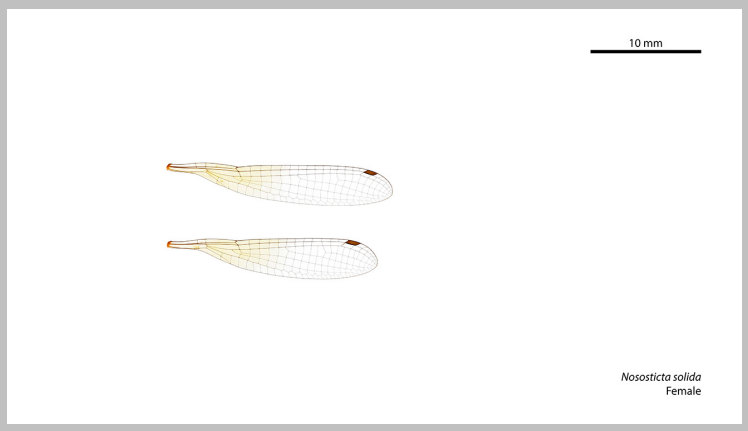
Nososticta mouldsi male



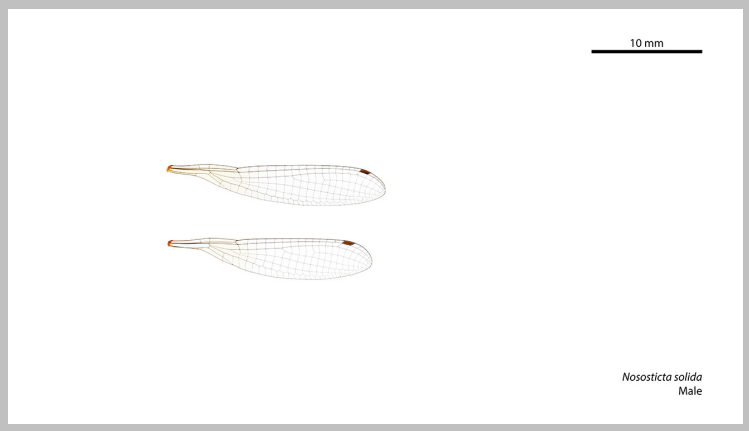
Nososticta pilbara female

Nososticta pilbara male

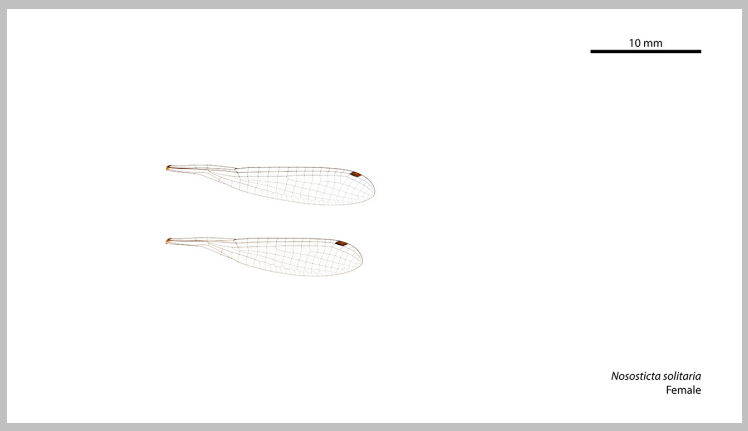
https://doi.org/10.3853/j.1835-4211.33.2021.1767



Nososticta solida female

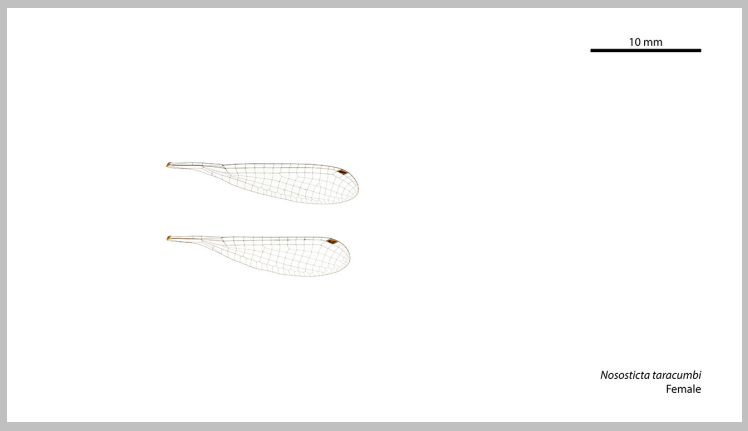


Nososticta solida male



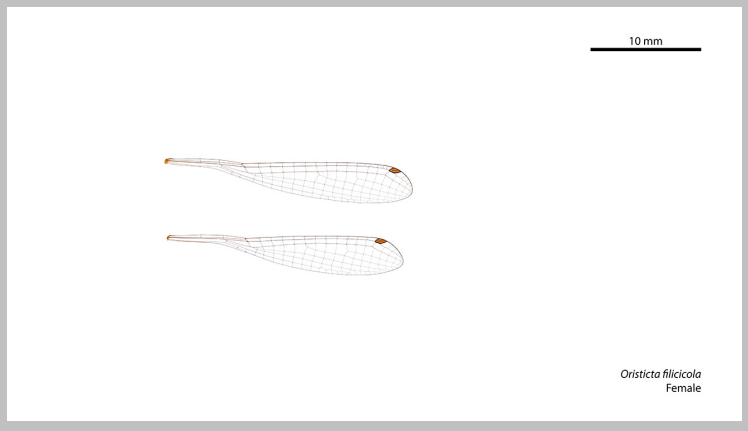
Nososticta solitaria female

Nososticta solitaria male

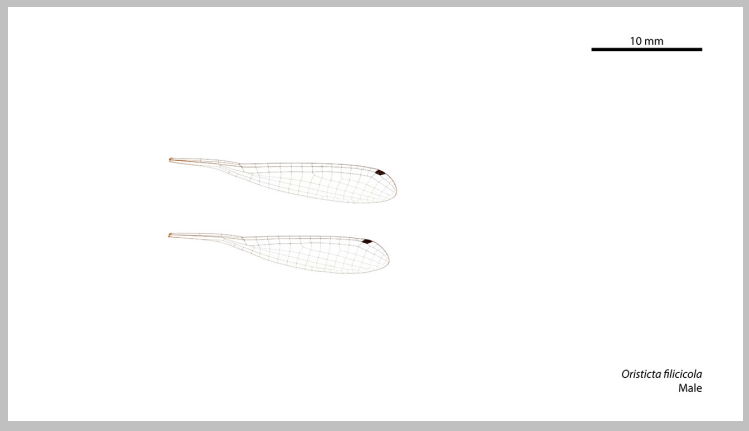


Nososticta taracumbi female

Nososticta taracumbi male

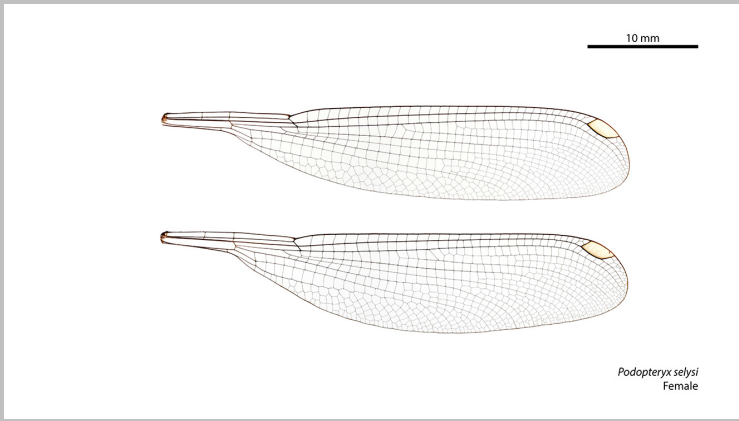


Oristicta filicicola female

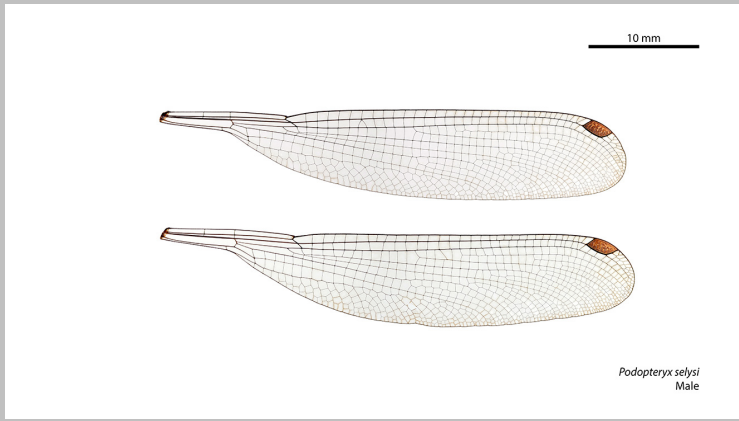


Oristicta filicicola male

https://doi.org/10.3853/j.1835-4211.33.2021.1767



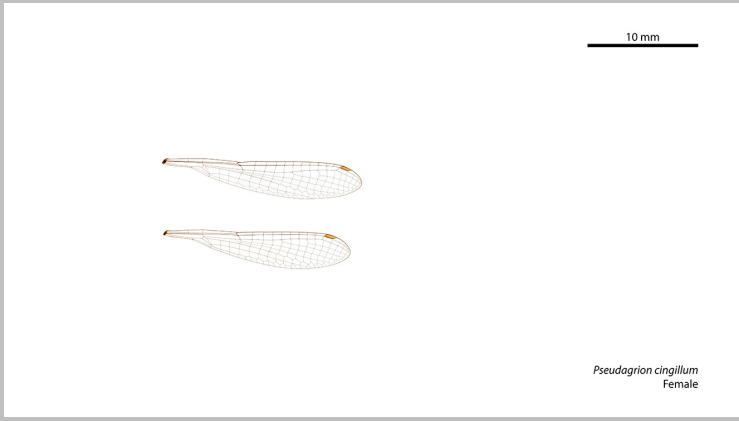
Podopteryx selysi female



Podopteryx selysi male

Pseudagrion aureofrons female

Pseudagrion aureofrons male



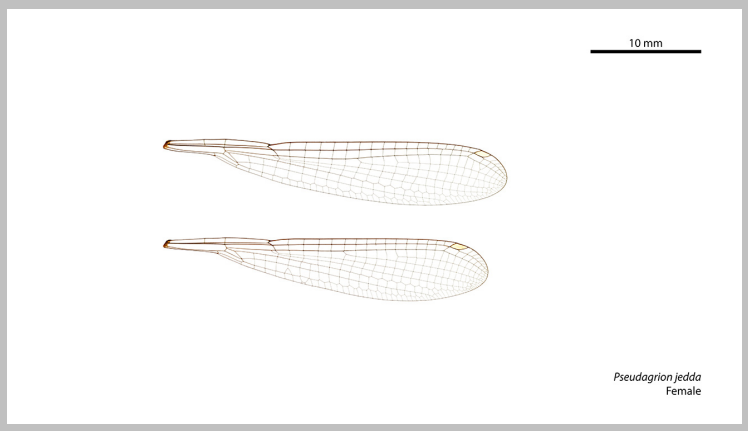
Pseudagrion cingillum female

Pseudagrion cingillum male

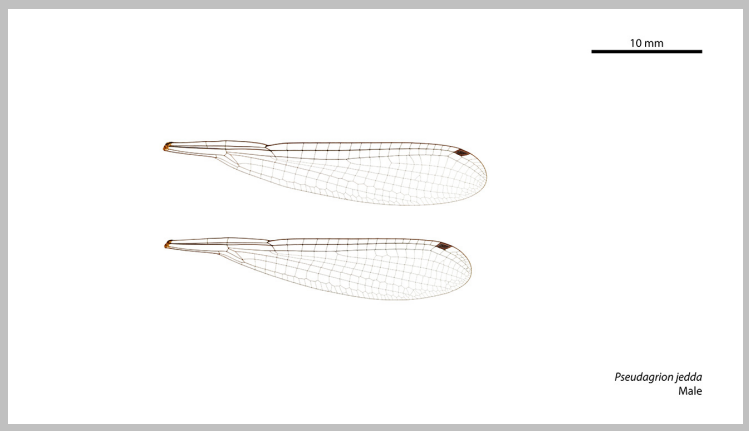
Pseudagrion ignifer female

Pseudagrion ignifer male

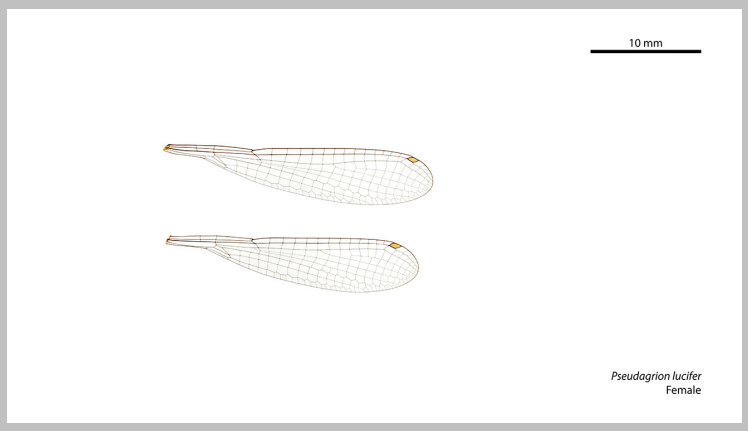
https://doi.org/10.3853/j.1835-4211.33.2021.1767



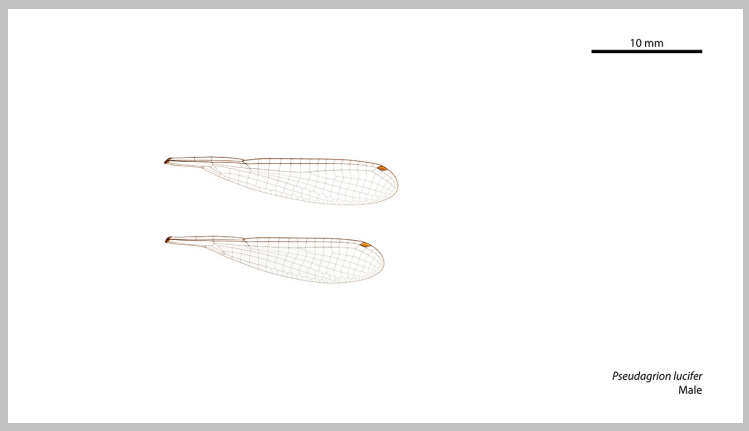
Pseudagrion jedda female



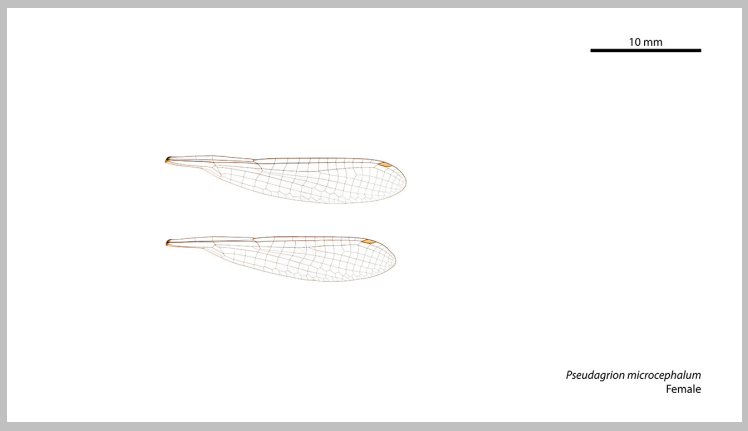
Pseudagrion jedda male



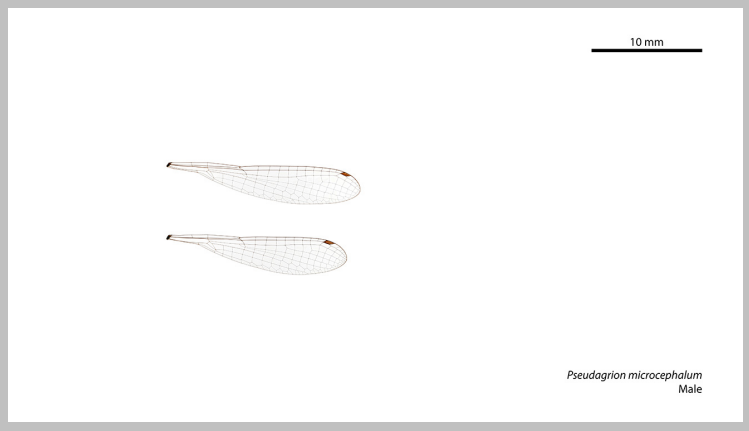
Pseudagrion lucifer female



Pseudagrion lucifer male

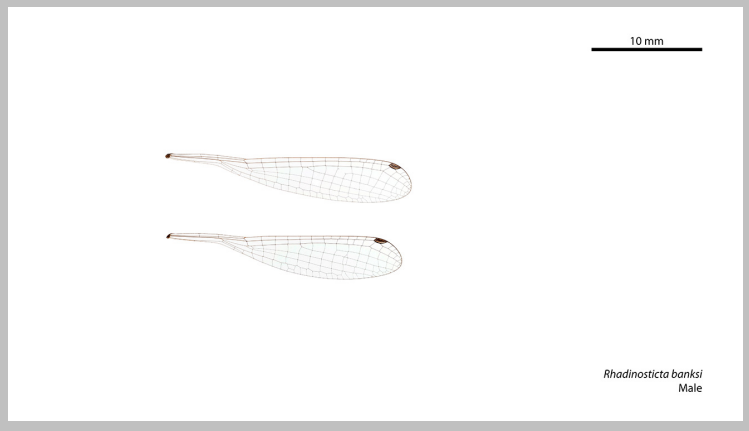


Pseudagrion microcephalum female



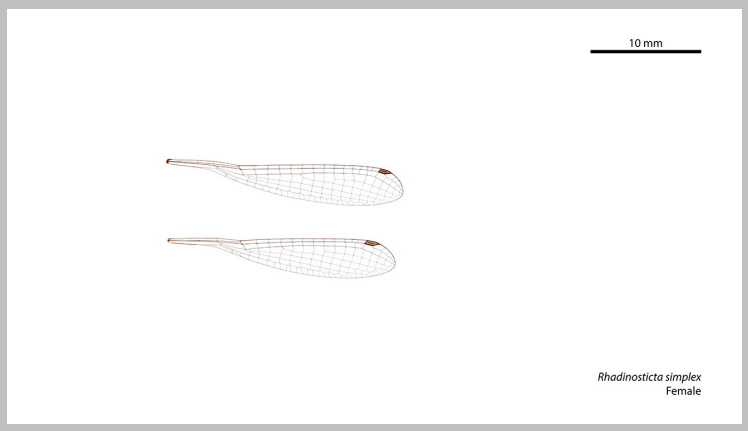
Pseudagrion microcephalum male

Rhadinosticta banksi female

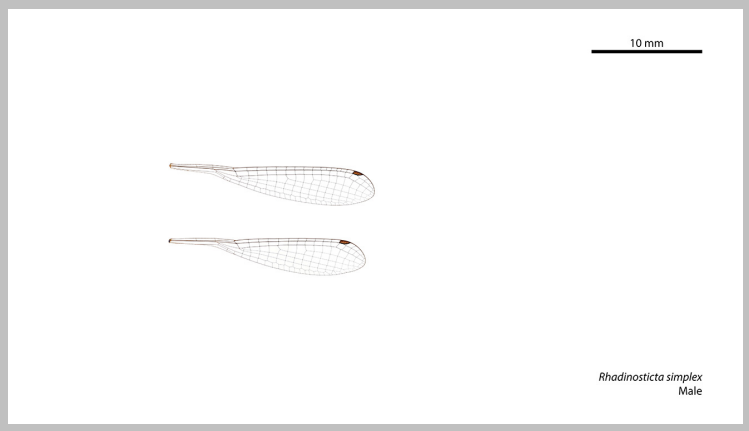


Rhadinosticta banksi male

https://doi.org/10.3853/j.1835-4211.33.2021.1767



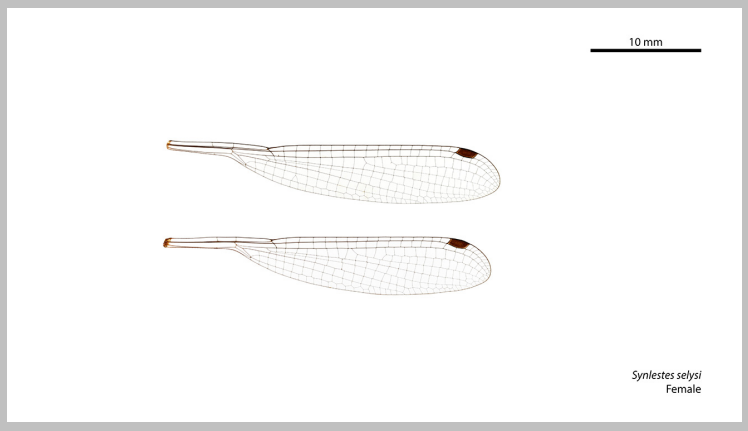
Rhadinosticta simplex female



Rhadinosticta simplex male

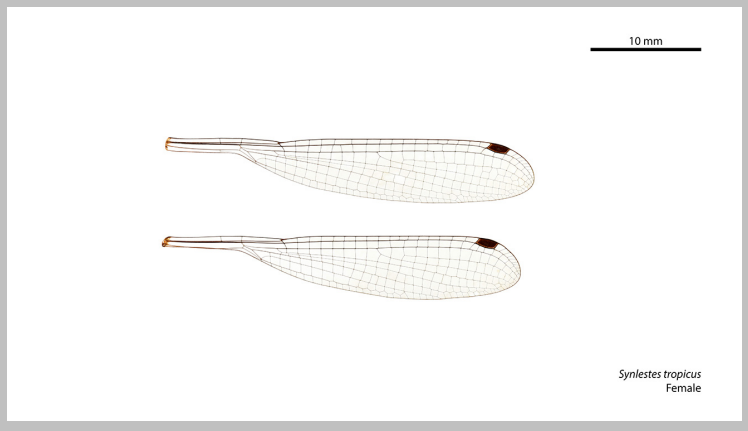
Rhinocypha tincta female

Rhinocypha tincta male

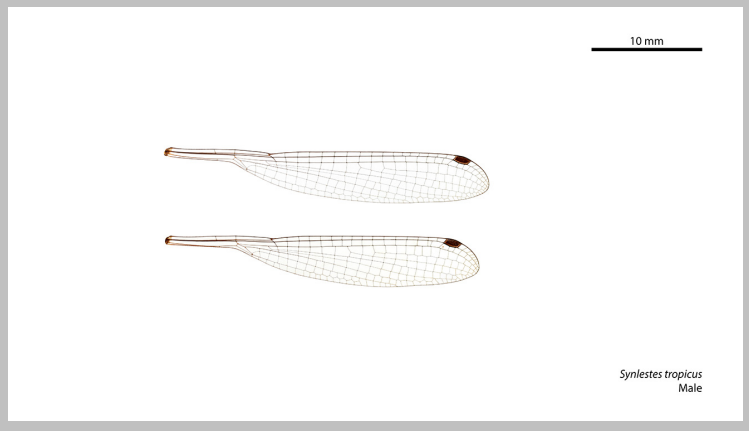


Synlestes selysi female

Synlestes selysi male



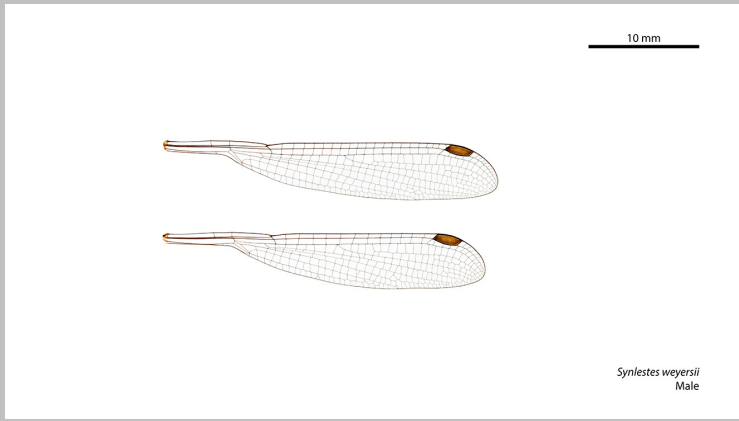
Synlestes tropicus female



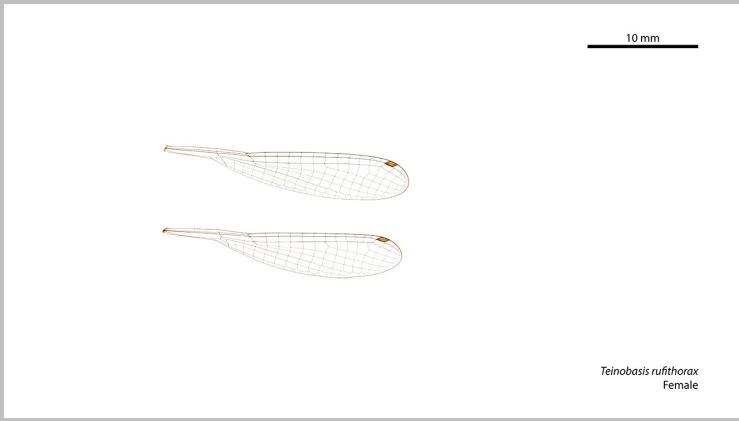
Synlestes tropicus male

https://doi.org/10.3853/j.1835-4211.33.2021.1767

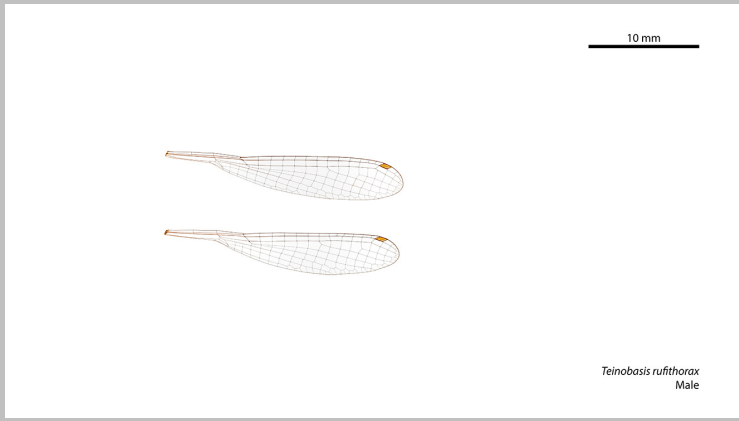
Synlestes weyersii female



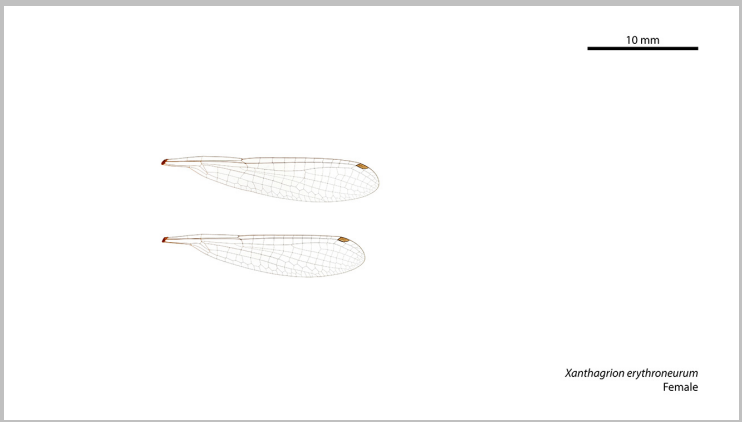
Synlestes weyersii male



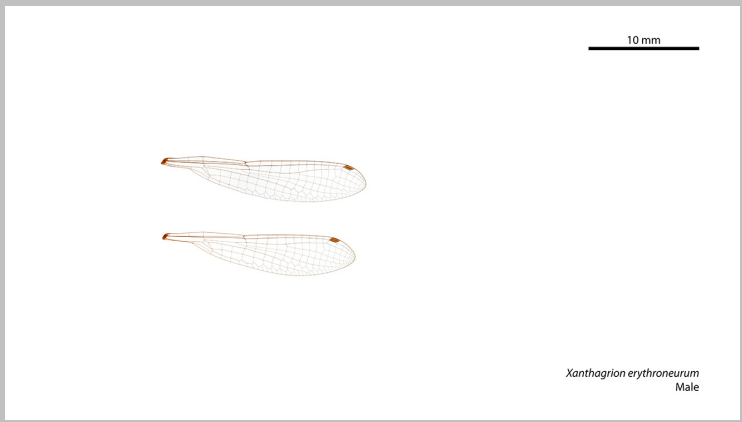
Teinobasis rufithorax female



Teinobasis rufithorax male



Xanthagrion erythroneurum female



Xanthagrion erythroneurum male

https://doi.org/10.3853/j.1835-4211.33.2021.1767 (2021 John Tann)

Appendix 3—Index to images

Index to full-size images. This table is an abridged version of the full *Index* published at *figshare* (Tann, 2020e). Species are arranged alphabetically. For common names, hyperlinks to the *Atlas of Living Australia* (*ALA*) specimens records, additional metadata, and specimen images, see Tann (2020e). Abbreviations: *Coll.*, museum or institutional collection; *Coll.Reg.*, registration number; *AM,* Australian Museum, Sydney; *ANIC*, Australian National Insect Collection, Canberra; *MAGNT,* Museum and Art Gallery of the Northern Territory, Darwin; *QM,* Queensland Museum, Brisbane; and *WAM,* Western Australian Museum, Perth.

family	species	sex	Coll.	Coll.Reg.	*figshare* DOI for wing images
Telephlebiidae	*Acanthaeschna victoria*	F	ANIC	7-009684	https://doi.org/10.6084/m9.figshare.12605939
Telephlebiidae	*Acanthaeschna victoria*	M	AM	K300814	https://doi.org/10.6084/m9.figshare.12605939
Coenagrionidae	*Aciagrion fragilis*	F	AM	K301206	https://doi.org/10.6084/m9.figshare.12597695
Coenagrionidae	*Aciagrion fragilis*	M	AM	K301207	https://doi.org/10.6084/m9.figshare.12597695
Aeshnidae	*Adversaeschna brevistyla*	F	AM	K305467	https://doi.org/10.6084/m9.figshare.12605936
Aeshnidae	*Adversaeschna brevistyla*	M	AM	K305480	https://doi.org/10.6084/m9.figshare.12605936
Libellulidae	*Aethriamanta circumsignata*	F	ANIC	7-011025	https://doi.org/10.6084/m9.figshare.12605933
Libellulidae	*Aethriamanta circumsignata*	M	AM	K305539	https://doi.org/10.6084/m9.figshare.12605933
Libellulidae	*Aethriamanta nymphaeae*	F	ANIC	7-011030	https://doi.org/10.6084/m9.figshare.12605930
Libellulidae	*Aethriamanta nymphaeae*	M	ANIC	7-011033	https://doi.org/10.6084/m9.figshare.12605930
Coenagrionidae	*Agriocnemis argentea*	F	AM	K305648	https://doi.org/10.6084/m9.figshare.12597692
Coenagrionidae	*Agriocnemis argentea*	M	AM	K301205	https://doi.org/10.6084/m9.figshare.12597692
Coenagrionidae	*Agriocnemis dobsoni*	F	ANIC	7-001968	https://doi.org/10.6084/m9.figshare.12597683
Coenagrionidae	*Agriocnemis dobsoni*	M	ANIC	7-001969	https://doi.org/10.6084/m9.figshare.12597683
Coenagrionidae	*Agriocnemis femina*	F	ANIC	7-001971	https://doi.org/10.6084/m9.figshare.12597677
Coenagrionidae	*Agriocnemis femina*	M	ANIC	7-001971	https://doi.org/10.6084/m9.figshare.12597677
Coenagrionidae	*Agriocnemis kunjina*	F	AM	K280879	https://doi.org/10.6084/m9.figshare.12597671
Coenagrionidae	*Agriocnemis kunjina*	M	AM	K305666	https://doi.org/10.6084/m9.figshare.12597671
Coenagrionidae	*Agriocnemis pygmaea*	F	AM	K301197	https://doi.org/10.6084/m9.figshare.12597668
Coenagrionidae	*Agriocnemis pygmaea*	M	AM	K337755	https://doi.org/10.6084/m9.figshare.12597668
Coenagrionidae	*Agriocnemis rubricauda*	F	AM	K305665	https://doi.org/10.6084/m9.figshare.12597662
Coenagrionidae	*Agriocnemis rubricauda*	M	AM	K301187	https://doi.org/10.6084/m9.figshare.12597662
Libellulidae	*Agrionoptera insignis*	F	AM	K305525	https://doi.org/10.6084/m9.figshare.12605921
Libellulidae	*Agrionoptera insignis*	M	AM	K337650	https://doi.org/10.6084/m9.figshare.12605921
Libellulidae	*Agrionoptera longitudinalis*	F	AM	K403332	https://doi.org/10.6084/m9.figshare.12605915
Libellulidae	*Agrionoptera longitudinalis*	M	AM	K299513	https://doi.org/10.6084/m9.figshare.12605915
Aeshnidae	*Agyrtacantha dirupta*	F	QM	T172175	https://doi.org/10.6084/m9.figshare.12605912
Aeshnidae	*Anaciaeschna jaspidea*	F	AM	K281261	https://doi.org/10.6084/m9.figshare.12605906
Aeshnidae	*Anaciaeschna jaspidea*	M	AM	K305456	https://doi.org/10.6084/m9.figshare.12605906
Aeshnidae	*Anax georgius*	M	ANIC	7-010006	https://doi.org/10.6084/m9.figshare.12605897
Aeshnidae	*Anax gibbosulus*	F	AM	K305449	https://doi.org/10.6084/m9.figshare.12605894
Aeshnidae	*Anax gibbosulus*	M	AM	K305708	https://doi.org/10.6084/m9.figshare.12605894
Aeshnidae	*Anax guttatus*	F	AM	K289989	https://doi.org/10.6084/m9.figshare.12605888
Aeshnidae	*Anax guttatus*	M	AM	K305455	https://doi.org/10.6084/m9.figshare.12605888
Aeshnidae	*Anax papuensis*	F	AM	K337585	https://doi.org/10.6084/m9.figshare.12605882
Aeshnidae	*Anax papuensis*	M	AM	K305671	https://doi.org/10.6084/m9.figshare.12605882
Gomphidae	*Antipodogomphus acolythus*	F	AM	K305687	https://doi.org/10.6084/m9.figshare.12605873
Gomphidae	*Antipodogomphus acolythus*	M	AM	K456201	https://doi.org/10.6084/m9.figshare.12605873
Gomphidae	*Antipodogomphus dentosus*	F	ANIC	7-005863	https://doi.org/10.6084/m9.figshare.12605864
Gomphidae	*Antipodogomphus dentosus*	M	ANIC	7-005862	https://doi.org/10.6084/m9.figshare.12605864
Gomphidae	*Antipodogomphus edentulus*	F	ANIC	7-005864	https://doi.org/10.6084/m9.figshare.12605858
Gomphidae	*Antipodogomphus hodgkini*	F	ANIC	7-005851	https://doi.org/10.6084/m9.figshare.12605852
Gomphidae	*Antipodogomphus hodgkini*	M	ANIC	7-005850	https://doi.org/10.6084/m9.figshare.12605852
Gomphidae	*Antipodogomphus neophytus*	F	ANIC	unregistered	https://doi.org/10.6084/m9.figshare.12605849
Gomphidae	*Antipodogomphus neophytus*	M	ANIC	7-005846	https://doi.org/10.6084/m9.figshare.12605849
Gomphidae	*Antipodogomphus proselythus*	F	AM	K403324	https://doi.org/10.6084/m9.figshare.12605810
Gomphidae	*Antipodogomphus proselythus*	M	AM	K403325	https://doi.org/10.6084/m9.figshare.12605810
Telephlebiidae	*Antipodophlebia asthenes*	F	AM	K300809	https://doi.org/10.6084/m9.figshare.12605807
Telephlebiidae	*Antipodophlebia asthenes*	M	AM	K300810	https://doi.org/10.6084/m9.figshare.12605807
Austrocorduliidae	*Apocordulia macrops*	F	ANIC	unregistered	https://doi.org/10.6084/m9.figshare.12605801
Austrocorduliidae	*Apocordulia macrops*	M	ANIC	7-010455	https://doi.org/10.6084/m9.figshare.12605801
Gomphomacromiidae	*Archaeophya adamsi*	F	ANIC	7-010270	https://doi.org/10.6084/m9.figshare.12605798
Gomphomacromiidae	*Archaeophya adamsi*	M	AM	K259786	https://doi.org/10.6084/m9.figshare.12605798
Gomphomacromiidae	*Archaeophya magnifica*	F	ANIC	7-010273	https://doi.org/10.6084/m9.figshare.12605792
Gomphomacromiidae	*Archaeophya magnifica*	M	AM	K281178	https://doi.org/10.6084/m9.figshare.12605792
Synthemistidae	*Archaeosynthemis leachii*	F	AM	K299902	https://doi.org/10.6084/m9.figshare.12605789
Synthemistidae	*Archaeosynthemis leachii*	M	AM	K337673	https://doi.org/10.6084/m9.figshare.12605789
Synthemistidae	*Archaeosynthemis occidentalis*	F	ANIC	7-010976	https://doi.org/10.6084/m9.figshare.12605783
Synthemistidae	*Archaeosynthemis occidentalis*	M	AM	K337680	https://doi.org/10.6084/m9.figshare.12605783
Synthemistidae	*Archaeosynthemis orientalis*	F	AM	K299886	https://doi.org/10.6084/m9.figshare.12605777
Synthemistidae	*Archaeosynthemis orientalis*	M	AM	K299892	https://doi.org/10.6084/m9.figshare.12605777
Synthemistidae	*Archaeosynthemis spiniger*	F	ANIC	7-011011	https://doi.org/10.6084/m9.figshare.12605756
Synthemistidae	*Archaeosynthemis spiniger*	M	WAM	WAM44318	https://doi.org/10.6084/m9.figshare.12605756
Megapodagrionidae	*Archiargiolestes parvulus*	F	ANIC	7-004674	https://doi.org/10.6084/m9.figshare.12597659
Megapodagrionidae	*Archiargiolestes parvulus*	M	ANIC	7-004658	https://doi.org/10.6084/m9.figshare.12597659
Megapodagrionidae	*Archiargiolestes pusillissimus*	F	ANIC	7-004609	https://doi.org/10.6084/m9.figshare.12597656
Megapodagrionidae	*Archiargiolestes pusillissimus*	M	ANIC	7-004614	https://doi.org/10.6084/m9.figshare.12597656
Megapodagrionidae	*Archiargiolestes pusillus*	F	ANIC	7-004465	https://doi.org/10.6084/m9.figshare.12597653
Megapodagrionidae	*Archiargiolestes pusillus*	M	AM	K301434	https://doi.org/10.6084/m9.figshare.12597653

family	species	sex	Coll.	Coll.Reg.	*figshare* DOI for wing images
Coenagrionidae	*Archibasis mimetes*	F	ANIC	7-000014	https://doi.org/10.6084/m9.figshare.12597650
Coenagrionidae	*Archibasis mimetes*	M	AM	K301186	https://doi.org/10.6084/m9.figshare.12597650
Austropetaliidae	*Archipetalia auriculata*	F	AM	K305485	https://doi.org/10.6084/m9.figshare.12605750
Austropetaliidae	*Archipetalia auriculata*	M	AM	K305667	https://doi.org/10.6084/m9.figshare.12605750
Coenagrionidae	*Argiocnemis rubescens*	F	AM	K301177	https://doi.org/10.6084/m9.figshare.12597647
Coenagrionidae	*Argiocnemis rubescens*	M	AM	K301173	https://doi.org/10.6084/m9.figshare.12597647
Gomphidae	*Armagomphus armiger*	F	ANIC	7-006033	https://doi.org/10.6084/m9.figshare.12605747
Gomphidae	*Armagomphus armiger*	M	ANIC	7-006032	https://doi.org/10.6084/m9.figshare.12605747
Telephlebiidae	*Austroaeschna anacantha*	F	AM	K300806	https://doi.org/10.6084/m9.figshare.12605741
Telephlebiidae	*Austroaeschna anacantha*	M	AM	K337714	https://doi.org/10.6084/m9.figshare.12605741
Telephlebiidae	*Austroaeschna atrata*	F	AM	K289915	https://doi.org/10.6084/m9.figshare.12605732
Telephlebiidae	*Austroaeschna atrata*	M	AM	K300795	https://doi.org/10.6084/m9.figshare.12605732
Telephlebiidae	*Austroaeschna christine*	M	ANIC	7-007569	https://doi.org/10.6084/m9.figshare.12605666
Telephlebiidae	*Austroaeschna cooloola*	F	AM	K403340	https://doi.org/10.6084/m9.figshare.12605657
Telephlebiidae	*Austroaeschna cooloola*	M	AM	K300794	https://doi.org/10.6084/m9.figshare.12605657
Telephlebiidae	*Austroaeschna eungella*	F	ANIC	7-009489	https://doi.org/10.6084/m9.figshare.12605648
Telephlebiidae	*Austroaeschna eungella*	M	QM	T175882	https://doi.org/10.6084/m9.figshare.12605648
Telephlebiidae	*Austroaeschna flavomaculata*	F	AM	K300791	https://doi.org/10.6084/m9.figshare.12605633
Telephlebiidae	*Austroaeschna flavomaculata*	M	AM	K300782	https://doi.org/10.6084/m9.figshare.12605633
Telephlebiidae	*Austroaeschna hardyi*	F	AM	K300750	https://doi.org/10.6084/m9.figshare.12605609
Telephlebiidae	*Austroaeschna hardyi*	M	AM	K300752	https://doi.org/10.6084/m9.figshare.12605609
Telephlebiidae	*Austroaeschna inermis*	F	AM	K300256	https://doi.org/10.6084/m9.figshare.12605600
Telephlebiidae	*Austroaeschna inermis*	M	AM	K300253	https://doi.org/10.6084/m9.figshare.12605600
Telephlebiidae	*Austroaeschna ingrid*	F	AM	K300737	https://doi.org/10.6084/m9.figshare.12605588
Telephlebiidae	*Austroaeschna ingrid*	M	AM	K300740	https://doi.org/10.6084/m9.figshare.12605588
Telephlebiidae	*Austroaeschna muelleri*	F	AM	K300907	https://doi.org/10.6084/m9.figshare.12605516
Telephlebiidae	*Austroaeschna muelleri*	M	AM	K300906	https://doi.org/10.6084/m9.figshare.12605516
Telephlebiidae	*Austroaeschna multipunctata*	F	AM	K300886	https://doi.org/10.6084/m9.figshare.12605507
Telephlebiidae	*Austroaeschna multipunctata*	M	AM	K300861	https://doi.org/10.6084/m9.figshare.12605507
Telephlebiidae	*Austroaeschna obscura*	F	AM	K300829	https://doi.org/10.6084/m9.figshare.12601517
Telephlebiidae	*Austroaeschna obscura*	M	AM	K300826	https://doi.org/10.6084/m9.figshare.12601517
Telephlebiidae	*Austroaeschna parvistigma*	F	AM	K300817	https://doi.org/10.6084/m9.figshare.12601508
Telephlebiidae	*Austroaeschna parvistigma*	M	AM	K300823	https://doi.org/10.6084/m9.figshare.12601508
Telephlebiidae	*Austroaeschna pinheyi*	F	AM	K305676	https://doi.org/10.6084/m9.figshare.12601505
Telephlebiidae	*Austroaeschna pinheyi*	M	AM	K305675	https://doi.org/10.6084/m9.figshare.12601505
Telephlebiidae	*Austroaeschna pulchra*	F	AM	K301002	https://doi.org/10.6084/m9.figshare.12601499
Telephlebiidae	*Austroaeschna pulchra*	M	AM	K337715	https://doi.org/10.6084/m9.figshare.12601499
Telephlebiidae	*Austroaeschna sigma*	F	AM	K300979	https://doi.org/10.6084/m9.figshare.12601496
Telephlebiidae	*Austroaeschna sigma*	M	AM	K300966	https://doi.org/10.6084/m9.figshare.12601496
Telephlebiidae	*Austroaeschna speciosa*	F	AM	K289859	https://doi.org/10.6084/m9.figshare.12601493
Telephlebiidae	*Austroaeschna speciosa*	M	ANIC	7-006781	https://doi.org/10.6084/m9.figshare.12601493
Telephlebiidae	*Austroaeschna subapicalis*	F	AM	K300934	https://doi.org/10.6084/m9.figshare.12601478
Telephlebiidae	*Austroaeschna subapicalis*	M	AM	K300960	https://doi.org/10.6084/m9.figshare.12601478
Telephlebiidae	*Austroaeschna tasmanica*	F	QM	T172855	https://doi.org/10.6084/m9.figshare.12601475
Telephlebiidae	*Austroaeschna tasmanica*	M	AM	K299384	https://doi.org/10.6084/m9.figshare.12601475
Telephlebiidae	*Austroaeschna unicornis*	F	AM	K299376	https://doi.org/10.6084/m9.figshare.12601472
Telephlebiidae	*Austroaeschna unicornis*	M	AM	K299370	https://doi.org/10.6084/m9.figshare.12601472
Coenagrionidae	*Austroagrion cyane*	F	ANIC	7-001537	https://doi.org/10.6084/m9.figshare.12597644
Coenagrionidae	*Austroagrion cyane*	M	ANIC	7-001526	https://doi.org/10.6084/m9.figshare.12597644
Coenagrionidae	*Austroagrion exclamationis*	F	AM	K301162	https://doi.org/10.6084/m9.figshare.12597641
Coenagrionidae	*Austroagrion exclamationis*	M	AM	K301160	https://doi.org/10.6084/m9.figshare.12597641
Coenagrionidae	*Austroagrion pindrina*	F	ANIC	7-001109	https://doi.org/10.6084/m9.figshare.12597638
Coenagrionidae	*Austroagrion pindrina*	M	AM	K301157	https://doi.org/10.6084/m9.figshare.12597638
Coenagrionidae	*Austroagrion watsoni*	F	AM	K301149	https://doi.org/10.6084/m9.figshare.12597635
Coenagrionidae	*Austroagrion watsoni*	M	AM	K337764	https://doi.org/10.6084/m9.figshare.12597635
Megapodagrionidae	*Austroargiolestes alpinus*	F	ANIC	7-009196	https://doi.org/10.6084/m9.figshare.12597632
Megapodagrionidae	*Austroargiolestes alpinus*	M	ANIC	7-009190	https://doi.org/10.6084/m9.figshare.12597632
Megapodagrionidae	*Austroargiolestes amabilis*	F	AM	K302004	https://doi.org/10.6084/m9.figshare.12597626
Megapodagrionidae	*Austroargiolestes amabilis*	M	AM	K302014	https://doi.org/10.6084/m9.figshare.12597626
Megapodagrionidae	*Austroargiolestes aureus*	F	AM	K302001	https://doi.org/10.6084/m9.figshare.12597623
Megapodagrionidae	*Austroargiolestes aureus*	M	AM	K301989	https://doi.org/10.6084/m9.figshare.12597623
Megapodagrionidae	*Austroargiolestes brookhousei*	F	AM	K301983	https://doi.org/10.6084/m9.figshare.12597620
Megapodagrionidae	*Austroargiolestes brookhousei*	M	AM	K301985	https://doi.org/10.6084/m9.figshare.12597620
Megapodagrionidae	*Austroargiolestes calcaris*	F	AM	K301976	https://doi.org/10.6084/m9.figshare.12597614
Megapodagrionidae	*Austroargiolestes calcaris*	M	AM	K301971	https://doi.org/10.6084/m9.figshare.12597614
Megapodagrionidae	*Austroargiolestes christine*	F	AM	K301955	https://doi.org/10.6084/m9.figshare.12597605
Megapodagrionidae	*Austroargiolestes christine*	M	AM	K301950	https://doi.org/10.6084/m9.figshare.12597605
Megapodagrionidae	*Austroargiolestes chrysoides*	F	ANIC	7-004958	https://doi.org/10.6084/m9.figshare.12597602
Megapodagrionidae	*Austroargiolestes chrysoides*	M	ANIC	7-009114	https://doi.org/10.6084/m9.figshare.12597602
Megapodagrionidae	*Austroargiolestes elke*	F	ANIC	7-005017	https://doi.org/10.6084/m9.figshare.12597593
Megapodagrionidae	*Austroargiolestes elke*	M	QM	T192479	https://doi.org/10.6084/m9.figshare.12597593
Megapodagrionidae	*Austroargiolestes icteromelas*	F	AM	K301926	https://doi.org/10.6084/m9.figshare.12597587
Megapodagrionidae	*Austroargiolestes icteromelas*	M	AM	K337843	https://doi.org/10.6084/m9.figshare.12597587
Megapodagrionidae	*Austroargiolestes isabellae*	F	AM	K301847	https://doi.org/10.6084/m9.figshare.12597578
Megapodagrionidae	*Austroargiolestes isabellae*	M	AM	K337851	https://doi.org/10.6084/m9.figshare.12597578
Coenagrionidae	*Austrocnemis maccullochi*	F	AM	K301143	https://doi.org/10.6084/m9.figshare.12597569
Coenagrionidae	*Austrocnemis maccullochi*	M	AM	K301134	https://doi.org/10.6084/m9.figshare.12597569
Coenagrionidae	*Austrocnemis obscura*	F	ANIC	unregistered	https://doi.org/10.6084/m9.figshare.12597563
Coenagrionidae	*Austrocnemis splendida*	F	AM	K301127	https://doi.org/10.6084/m9.figshare.12597551
Coenagrionidae	*Austrocnemis splendida*	M	AM	K301116	https://doi.org/10.6084/m9.figshare.12597551

family	species	sex	Coll.	Coll.Reg.	*figshare* DOI for wing images
Austrocorduliidae	*Austrocordulia leonardi*	F	AM	K259788	https://doi.org/10.6084/m9.figshare.12601433
Austrocorduliidae	*Austrocordulia leonardi*	M	AM	K300186	https://doi.org/10.6084/m9.figshare.12601433
Austrocorduliidae	*Austrocordulia refracta*	F	AM	K300178	https://doi.org/10.6084/m9.figshare.12601427
Austrocorduliidae	*Austrocordulia refracta*	M	AM	K300177	https://doi.org/10.6084/m9.figshare.12601427
Austrocorduliidae	*Austrocordulia territoria*	F	ANIC	7-010447	https://doi.org/10.6084/m9.figshare.12601421
Austrocorduliidae	*Austrocordulia territoria*	M	ANIC	7-010454	https://doi.org/10.6084/m9.figshare.12601421
Gomphidae	*Austrogomphus amphiclitus*	F	AM	K302105	https://doi.org/10.6084/m9.figshare.12601418
Gomphidae	*Austrogomphus amphiclitus*	M	AM	K302086	https://doi.org/10.6084/m9.figshare.12601418
Gomphidae	*Austrogomphus angelorum*	F	AM	K456021	https://doi.org/10.6084/m9.figshare.12601403
Gomphidae	*Austrogomphus angelorum*	M	ANIC	7-005239	https://doi.org/10.6084/m9.figshare.12601403
Gomphidae	*Austrogomphus arbustorum*	F	AM	K403328	https://doi.org/10.6084/m9.figshare.12601388
Gomphidae	*Austrogomphus arbustorum*	M	AM	K403364	https://doi.org/10.6084/m9.figshare.12601388
Gomphidae	*Austrogomphus australis*	F	AM	K305033	https://doi.org/10.6084/m9.figshare.12601355
Gomphidae	*Austrogomphus australis*	M	AM	K305035	https://doi.org/10.6084/m9.figshare.12601355
Gomphidae	*Austrogomphus bifurcatus*	F	AM	K305684	https://doi.org/10.6084/m9.figshare.12601340
Gomphidae	*Austrogomphus bifurcatus*	M	AM	K305682	https://doi.org/10.6084/m9.figshare.12601340
Gomphidae	*Austrogomphus collaris*	F	AM	K337605	https://doi.org/10.6084/m9.figshare.12601328
Gomphidae	*Austrogomphus collaris*	M	AM	K403327	https://doi.org/10.6084/m9.figshare.12601328
Gomphidae	*Austrogomphus cornutus*	F	AM	K302079	https://doi.org/10.6084/m9.figshare.12601304
Gomphidae	*Austrogomphus cornutus*	M	AM	K302074	https://doi.org/10.6084/m9.figshare.12601304
Gomphidae	*Austrogomphus divaricatus*	F	AM	K304995	https://doi.org/10.6084/m9.figshare.12601277
Gomphidae	*Austrogomphus divaricatus*	M	AM	K305689	https://doi.org/10.6084/m9.figshare.12601277
Gomphidae	*Austrogomphus doddi*	F	AM	K302071	https://doi.org/10.6084/m9.figshare.12601247
Gomphidae	*Austrogomphus doddi*	M	AM	K403329	https://doi.org/10.6084/m9.figshare.12601247
Gomphidae	*Austrogomphus gordoni*	F	ANIC	7-005644	https://doi.org/10.6084/m9.figshare.12601214
Gomphidae	*Austrogomphus gordoni*	M	AM	K403326	https://doi.org/10.6084/m9.figshare.12601214
Gomphidae	*Austrogomphus guerini*	F	AM	K304978	https://doi.org/10.6084/m9.figshare.12601208
Gomphidae	*Austrogomphus guerini*	M	AM	K304967	https://doi.org/10.6084/m9.figshare.12601208
Gomphidae	*Austrogomphus mjobergi*	F	AM	K304964	https://doi.org/10.6084/m9.figshare.12601187
Gomphidae	*Austrogomphus mjobergi*	M	AM	K403330	https://doi.org/10.6084/m9.figshare.12601187
Gomphidae	*Austrogomphus mouldsorum*	F	AM	K292022	https://doi.org/10.6084/m9.figshare.12601115
Gomphidae	*Austrogomphus ochraceus*	F	AM	K337616	https://doi.org/10.6084/m9.figshare.12601079
Gomphidae	*Austrogomphus ochraceus*	M	AM	K302139	https://doi.org/10.6084/m9.figshare.12601079
Gomphidae	*Austrogomphus praeruptus*	F	AM	K304966	https://doi.org/10.6084/m9.figshare.12601043
Gomphidae	*Austrogomphus praeruptus*	M	AM	K304965	https://doi.org/10.6084/m9.figshare.12601043
Gomphidae	*Austrogomphus prasinus*	F	AM	K305012	https://doi.org/10.6084/m9.figshare.12601037
Gomphidae	*Austrogomphus prasinus*	M	AM	K305016	https://doi.org/10.6084/m9.figshare.12601037
Gomphidae	*Austrogomphus turneri*	F	AM	K302116	https://doi.org/10.6084/m9.figshare.12601034
Gomphidae	*Austrogomphus turneri*	M	AM	K302115	https://doi.org/10.6084/m9.figshare.12601034
Aeshnidae	*Austrogynacantha heterogena*	F	AM	K305438	https://doi.org/10.6084/m9.figshare.12601031
Aeshnidae	*Austrogynacantha heterogena*	M	AM	K305443	https://doi.org/10.6084/m9.figshare.12601031
Lestidae	*Austrolestes aleison*	F	AM	K403349	https://doi.org/10.6084/m9.figshare.12597548
Lestidae	*Austrolestes aleison*	M	AM	K403348	https://doi.org/10.6084/m9.figshare.12597548
Lestidae	*Austrolestes analis*	F	AM	K301547	https://doi.org/10.6084/m9.figshare.12597545
Lestidae	*Austrolestes analis*	M	AM	K337808	https://doi.org/10.6084/m9.figshare.12597545
Lestidae	*Austrolestes annulosus*	F	AM	K301536	https://doi.org/10.6084/m9.figshare.12597539
Lestidae	*Austrolestes annulosus*	M	AM	K337813	https://doi.org/10.6084/m9.figshare.12597539
Lestidae	*Austrolestes aridus*	F	AM	K301530	https://doi.org/10.6084/m9.figshare.12597530
Lestidae	*Austrolestes aridus*	M	AM	K301529	https://doi.org/10.6084/m9.figshare.12597530
Lestidae	*Austrolestes cingulatus*	F	AM	K301524	https://doi.org/10.6084/m9.figshare.12597527
Lestidae	*Austrolestes cingulatus*	M	AM	K337814	https://doi.org/10.6084/m9.figshare.12597527
Lestidae	*Austrolestes insularis*	F	AM	K301514	https://doi.org/10.6084/m9.figshare.12597524
Lestidae	*Austrolestes insularis*	M	AM	K301512	https://doi.org/10.6084/m9.figshare.12597524
Lestidae	*Austrolestes io*	F	AM	K403351	https://doi.org/10.6084/m9.figshare.12597518
Lestidae	*Austrolestes io*	M	AM	K403350	https://doi.org/10.6084/m9.figshare.12597518
Lestidae	*Austrolestes leda*	F	AM	K301498	https://doi.org/10.6084/m9.figshare.12597515
Lestidae	*Austrolestes leda*	M	AM	K301497	https://doi.org/10.6084/m9.figshare.12597515
Lestidae	*Austrolestes minjerriba*	F	AM	K302063	https://doi.org/10.6084/m9.figshare.12597509
Lestidae	*Austrolestes minjerriba*	M	AM	K305602	https://doi.org/10.6084/m9.figshare.12597509
Lestidae	*Austrolestes psyche*	F	AM	K302046	https://doi.org/10.6084/m9.figshare.12597506
Lestidae	*Austrolestes psyche*	M	AM	K302068	https://doi.org/10.6084/m9.figshare.12597506
Austropetaliidae	*Austropetalia patricia*	F	AM	K403343	https://doi.org/10.6084/m9.figshare.12601019
Austropetaliidae	*Austropetalia patricia*	M	AM	K305484	https://doi.org/10.6084/m9.figshare.12601019
Austropetaliidae	*Austropetalia tonyana*	F	ANIC	7-006152	https://doi.org/10.6084/m9.figshare.12601013
Austropetaliidae	*Austropetalia tonyana*	M	AM	K305483	https://doi.org/10.6084/m9.figshare.12601013
Telephlebiidae	*Austrophlebia costalis*	F	AM	K299346	https://doi.org/10.6084/m9.figshare.12601004
Telephlebiidae	*Austrophlebia costalis*	M	AM	K299351	https://doi.org/10.6084/m9.figshare.12601004
Telephlebiidae	*Austrophlebia subcostalis*	F	ANIC	7-006318	https://doi.org/10.6084/m9.figshare.12601001
Telephlebiidae	*Austrophlebia subcostalis*	M	ANIC	7-009666	https://doi.org/10.6084/m9.figshare.12601001
Austrocorduliidae	*Austrophya mystica*	F	AM	K300168	https://doi.org/10.6084/m9.figshare.12600998
Austrocorduliidae	*Austrophya mystica*	M	AM	K300167	https://doi.org/10.6084/m9.figshare.12600998
Isostictidae	*Austrosticta fieldi*	F	ANIC	7-002795	https://doi.org/10.6084/m9.figshare.12597500
Isostictidae	*Austrosticta fieldi*	M	ANIC	7-002791	https://doi.org/10.6084/m9.figshare.12597500
Isostictidae	*Austrosticta frater*	F	AM	K301419	https://doi.org/10.6084/m9.figshare.12597494
Isostictidae	*Austrosticta frater*	M	AM	K301417	https://doi.org/10.6084/m9.figshare.12597494
Isostictidae	*Austrosticta soror*	F	ANIC	7-002805	https://doi.org/10.6084/m9.figshare.12597491
Isostictidae	*Austrosticta soror*	M	ANIC	7-002800	https://doi.org/10.6084/m9.figshare.12597491
Synthemistidae	*Austrosynthemis cyanitincta*	F	AM	K403345	https://doi.org/10.6084/m9.figshare.12600995
Synthemistidae	*Austrosynthemis cyanitincta*	M	AM	K337685	https://doi.org/10.6084/m9.figshare.12600995
Libellulidae	*Austrothemis nigrescens*	F	AM	K299495	https://doi.org/10.6084/m9.figshare.12600992

family	species	sex	Coll.	Coll.Reg.	*figshare* DOI for wing images
Libellulidae	*Austrothemis nigrescens*	M	AM	K299491	https://doi.org/10.6084/m9.figshare.12600992
Libellulidae	*Brachydiplax denticauda*	F	AM	K299485	https://doi.org/10.6084/m9.figshare.12600965
Libellulidae	*Brachydiplax denticauda*	M	AM	K299489	https://doi.org/10.6084/m9.figshare.12600965
Libellulidae	*Brachydiplax duivenbodei*	M	AM	K403372	https://doi.org/10.6084/m9.figshare.12600854
Coenagrionidae	*Caliagrion billinghursti*	F	AM	K301097	https://doi.org/10.6084/m9.figshare.12597467
Coenagrionidae	*Caliagrion billinghursti*	M	AM	K301098	https://doi.org/10.6084/m9.figshare.12597467
Libellulidae	*Camacinia othello*	F	AM	K403335	https://doi.org/10.6084/m9.figshare.12600845
Libellulidae	*Camacinia othello*	M	AM	K403334	https://doi.org/10.6084/m9.figshare.12600845
Coenagrionidae	*Ceriagrion aeruginosum*	F	AM	K301085	https://doi.org/10.6084/m9.figshare.12597443
Coenagrionidae	*Ceriagrion aeruginosum*	M	AM	K301087	https://doi.org/10.6084/m9.figshare.12597443
Synlestidae	*Chorismagrion risi*	F	AM	K301633	https://doi.org/10.6084/m9.figshare.12597413
Synlestidae	*Chorismagrion risi*	M	AM	K301630	https://doi.org/10.6084/m9.figshare.12597413
Synthemistidae	*Choristhemis flavoterminata*	F	AM	K299909	https://doi.org/10.6084/m9.figshare.12600839
Synthemistidae	*Choristhemis flavoterminata*	M	AM	K299913	https://doi.org/10.6084/m9.figshare.12600839
Coenagrionidae	*Coenagrion lyelli*	F	AM	K301103	https://doi.org/10.6084/m9.figshare.12592064
Coenagrionidae	*Coenagrion lyelli*	M	AM	K301111	https://doi.org/10.6084/m9.figshare.12592064
Cordulephyidae	*Cordulephya bidens*	F	ANIC	7-010421	https://doi.org/10.6084/m9.figshare.12600836
Cordulephyidae	*Cordulephya bidens*	M	ANIC	7-010420	https://doi.org/10.6084/m9.figshare.12600836
Cordulephyidae	*Cordulephya divergens*	F	AM	K259718	https://doi.org/10.6084/m9.figshare.12600830
Cordulephyidae	*Cordulephya divergens*	M	AM	K259816	https://doi.org/10.6084/m9.figshare.12600830
Cordulephyidae	*Cordulephya montana*	F	ANIC	7-010414	https://doi.org/10.6084/m9.figshare.12600827
Cordulephyidae	*Cordulephya montana*	M	AM	K305491	https://doi.org/10.6084/m9.figshare.12600827
Cordulephyidae	*Cordulephya pygmaea*	F	AM	K403342	https://doi.org/10.6084/m9.figshare.12600818
Cordulephyidae	*Cordulephya pygmaea*	M	AM	K259814	https://doi.org/10.6084/m9.figshare.12600818
Libellulidae	*Crocothemis nigrifrons*	F	AM	K299482	https://doi.org/10.6084/m9.figshare.12600812
Libellulidae	*Crocothemis nigrifrons*	M	AM	K299480	https://doi.org/10.6084/m9.figshare.12600812
Brachytronidae	*Dendroaeschna conspersa*	F	AM	K299431	https://doi.org/10.6084/m9.figshare.12600809
Brachytronidae	*Dendroaeschna conspersa*	M	AM	K299433	https://doi.org/10.6084/m9.figshare.12600809
Lestoideidae	*Diphlebia coerulescens*	F	AM	K301750	https://doi.org/10.6084/m9.figshare.12592055
Lestoideidae	*Diphlebia coerulescens*	M	AM	K301757	https://doi.org/10.6084/m9.figshare.12592055
Lestoideidae	*Diphlebia euphoeoides*	F	AM	K301716	https://doi.org/10.6084/m9.figshare.12592052
Lestoideidae	*Diphlebia euphoeoides*	M	AM	K301723	https://doi.org/10.6084/m9.figshare.12592052
Lestoideidae	*Diphlebia hybridoides*	F	AM	K301691	https://doi.org/10.6084/m9.figshare.12592043
Lestoideidae	*Diphlebia hybridoides*	M	AM	K301690	https://doi.org/10.6084/m9.figshare.12592043
Lestoideidae	*Diphlebia lestoides*	F	AM	K301684	https://doi.org/10.6084/m9.figshare.12592028
Lestoideidae	*Diphlebia lestoides*	M	AM	K301685	https://doi.org/10.6084/m9.figshare.12592028
Lestoideidae	*Diphlebia nymphoides*	F	AM	K301672	https://doi.org/10.6084/m9.figshare.12592019
Lestoideidae	*Diphlebia nymphoides*	M	AM	K301673	https://doi.org/10.6084/m9.figshare.12592019
Libellulidae	*Diplacodes bipunctata*	F	AM	K299465	https://doi.org/10.6084/m9.figshare.12600791
Libellulidae	*Diplacodes bipunctata*	M	AM	K305566	https://doi.org/10.6084/m9.figshare.12600791
Libellulidae	*Diplacodes haematodes*	F	AM	K337655	https://doi.org/10.6084/m9.figshare.12600788
Libellulidae	*Diplacodes haematodes*	M	AM	K305549	https://doi.org/10.6084/m9.figshare.12600788
Libellulidae	*Diplacodes melanopsis*	F	AM	K299523	https://doi.org/10.6084/m9.figshare.12600779
Libellulidae	*Diplacodes melanopsis*	M	AM	K299525	https://doi.org/10.6084/m9.figshare.12600779
Libellulidae	*Diplacodes nebulosa*	F	AM	K403333	https://doi.org/10.6084/m9.figshare.12600755
Libellulidae	*Diplacodes nebulosa*	M	AM	K299519	https://doi.org/10.6084/m9.figshare.12600755
Libellulidae	*Diplacodes trivialis*	F	AM	K299533	https://doi.org/10.6084/m9.figshare.12600743
Libellulidae	*Diplacodes trivialis*	M	AM	K299540	https://doi.org/10.6084/m9.figshare.12600743
Telephlebiidae	*Dromaeschna forcipata*	F	AM	K337753	https://doi.org/10.6084/m9.figshare.12600689
Telephlebiidae	*Dromaeschna forcipata*	M	AM	K300759	https://doi.org/10.6084/m9.figshare.12600689
Telephlebiidae	*Dromaeschna weiskei*	F	AM	K299368	https://doi.org/10.6084/m9.figshare.12600632
Telephlebiidae	*Dromaeschna weiskei*	M	AM	K301062	https://doi.org/10.6084/m9.figshare.12600632
Synlestidae	*Episynlestes albicauda*	F	AM	K301625	https://doi.org/10.6084/m9.figshare.12592016
Synlestidae	*Episynlestes albicauda*	M	AM	K301627	https://doi.org/10.6084/m9.figshare.12592016
Synlestidae	*Episynlestes cristatus*	F	AM	K301616	https://doi.org/10.6084/m9.figshare.12592007
Synlestidae	*Episynlestes cristatus*	M	AM	K301617	https://doi.org/10.6084/m9.figshare.12592007
Synlestidae	*Episynlestes intermedius*	F	QM	T192492	https://doi.org/10.6084/m9.figshare.12592001
Synlestidae	*Episynlestes intermedius*	M	ANIC	7-008995	https://doi.org/10.6084/m9.figshare.12592001
Isostictidae	*Eurysticta coolawanyah*	F	ANIC	7-002757	https://doi.org/10.6084/m9.figshare.12591989
Isostictidae	*Eurysticta coolawanyah*	M	AM	K301415	https://doi.org/10.6084/m9.figshare.12591989
Isostictidae	*Eurysticta coomalie*	F	ANIC	7-002727	https://doi.org/10.6084/m9.figshare.12591965
Isostictidae	*Eurysticta coomalie*	M	ANIC	7-002727	https://doi.org/10.6084/m9.figshare.12591965
Isostictidae	*Eurysticta kununurra*	F	ANIC	7-002723	https://doi.org/10.6084/m9.figshare.12591956
Isostictidae	*Eurysticta kununurra*	M	ANIC	7-002723	https://doi.org/10.6084/m9.figshare.12591956
Synthemistidae	*Eusynthemis aurolineata*	F	AM	K299879	https://doi.org/10.6084/m9.figshare.12600584
Synthemistidae	*Eusynthemis aurolineata*	M	AM	K299863	https://doi.org/10.6084/m9.figshare.12600584
Synthemistidae	*Eusynthemis barbarae*	F	AM	K259713	https://doi.org/10.6084/m9.figshare.12600554
Synthemistidae	*Eusynthemis barbarae*	M	AM	K292027	https://doi.org/10.6084/m9.figshare.12600554
Synthemistidae	*Eusynthemis brevistyla*	F	AM	K299767	https://doi.org/10.6084/m9.figshare.12600536
Synthemistidae	*Eusynthemis brevistyla*	M	AM	K299763	https://doi.org/10.6084/m9.figshare.12600536
Synthemistidae	*Eusynthemis deniseae*	F	AM	K299829	https://doi.org/10.6084/m9.figshare.12600404
Synthemistidae	*Eusynthemis deniseae*	M	AM	K299828	https://doi.org/10.6084/m9.figshare.12600404
Synthemistidae	*Eusynthemis guttata*	F	AM	K299822	https://doi.org/10.6084/m9.figshare.12600398
Synthemistidae	*Eusynthemis guttata*	M	AM	K299817	https://doi.org/10.6084/m9.figshare.12600398
Synthemistidae	*Eusynthemis nigra*	F	AM	K305698	https://doi.org/10.6084/m9.figshare.12600389
Synthemistidae	*Eusynthemis nigra*	M	AM	K300197	https://doi.org/10.6084/m9.figshare.12600389
Synthemistidae	*Eusynthemis rentziana*	F	AM	K299807	https://doi.org/10.6084/m9.figshare.12600386
Synthemistidae	*Eusynthemis rentziana*	M	ANIC	7-010123	https://doi.org/10.6084/m9.figshare.12600386
Synthemistidae	*Eusynthemis tenera*	F	ANIC	7-010114	https://doi.org/10.6084/m9.figshare.12600383
Synthemistidae	*Eusynthemis tillyardi*	F	AM	K299805	https://doi.org/10.6084/m9.figshare.12600380

family	species	sex	Coll.	Coll.Reg.	*figshare* DOI for wing images
Synthemistidae	*Eusynthemis tillyardi*	M	AM	K299806	https://doi.org/10.6084/m9.figshare.12600380
Synthemistidae	*Eusynthemis ursa*	M	ANIC	7-010021	https://doi.org/10.6084/m9.figshare.12600374
Synthemistidae	*Eusynthemis ursula*	M	AM	K259768	https://doi.org/10.6084/m9.figshare.12600371
Synthemistidae	*Eusynthemis virgula*	F	AM	K299792	https://doi.org/10.6084/m9.figshare.12600368
Synthemistidae	*Eusynthemis virgula*	M	AM	K299787	https://doi.org/10.6084/m9.figshare.12600368
Megapodagrionidae	*Griseargiolestes albescens*	F	AM	K301834	https://doi.org/10.6084/m9.figshare.12591950
Megapodagrionidae	*Griseargiolestes albescens*	M	AM	K301827	https://doi.org/10.6084/m9.figshare.12591950
Megapodagrionidae	*Griseargiolestes bucki*	F	AM	K301796	https://doi.org/10.6084/m9.figshare.12591944
Megapodagrionidae	*Griseargiolestes bucki*	M	AM	K301791	https://doi.org/10.6084/m9.figshare.12591944
Megapodagrionidae	*Griseargiolestes eboracus*	F	AM	K301492	https://doi.org/10.6084/m9.figshare.12591926
Megapodagrionidae	*Griseargiolestes eboracus*	M	AM	K301491	https://doi.org/10.6084/m9.figshare.12591926
Megapodagrionidae	*Griseargiolestes fontanus*	F	ANIC	7-009109	https://doi.org/10.6084/m9.figshare.12591914
Megapodagrionidae	*Griseargiolestes fontanus*	M	ANIC	7-009116	https://doi.org/10.6084/m9.figshare.12591914
Megapodagrionidae	*Griseargiolestes griseus*	F	AM	K301474	https://doi.org/10.6084/m9.figshare.12591905
Megapodagrionidae	*Griseargiolestes griseus*	M	AM	K301478	https://doi.org/10.6084/m9.figshare.12591905
Megapodagrionidae	*Griseargiolestes intermedius*	F	ANIC	7-009050	https://doi.org/10.6084/m9.figshare.12591902
Megapodagrionidae	*Griseargiolestes intermedius*	M	AM	K301447	https://doi.org/10.6084/m9.figshare.12591902
Megapodagrionidae	*Griseargiolestes metallicus*	F	ANIC	7-009063	https://doi.org/10.6084/m9.figshare.12591899
Megapodagrionidae	*Griseargiolestes metallicus*	M	ANIC	7-009060	https://doi.org/10.6084/m9.figshare.12591899
Aeshnidae	*Gynacantha dobsoni*	F	AM	K305429	https://doi.org/10.6084/m9.figshare.12600080
Aeshnidae	*Gynacantha dobsoni*	M	AM	K305430	https://doi.org/10.6084/m9.figshare.12600080
Aeshnidae	*Gynacantha kirbyi*	F	AM	K305422	https://doi.org/10.6084/m9.figshare.12600071
Aeshnidae	*Gynacantha kirbyi*	M	AM	K305424	https://doi.org/10.6084/m9.figshare.12600071
Aeshnidae	*Gynacantha mocsaryi*	F	AM	K305669	https://doi.org/10.6084/m9.figshare.12600065
Aeshnidae	*Gynacantha mocsaryi*	M	AM	K305421	https://doi.org/10.6084/m9.figshare.12600065
Aeshnidae	*Gynacantha nourlangie*	F	AM	K403321	https://doi.org/10.6084/m9.figshare.12600059
Aeshnidae	*Gynacantha nourlangie*	M	AM	K403320	https://doi.org/10.6084/m9.figshare.12600059
Aeshnidae	*Gynacantha rosenbergi*	F	AM	K305408	https://doi.org/10.6084/m9.figshare.12600053
Aeshnidae	*Gynacantha rosenbergi*	M	AM	K305407	https://doi.org/10.6084/m9.figshare.12600053
Corduliidae	*Hemicordulia australiae*	F	AM	K300247	https://doi.org/10.6084/m9.figshare.12600047
Corduliidae	*Hemicordulia australiae*	M	AM	K300250	https://doi.org/10.6084/m9.figshare.12600047
Corduliidae	*Hemicordulia continentalis*	F	AM	K300228	https://doi.org/10.6084/m9.figshare.12600044
Corduliidae	*Hemicordulia continentalis*	M	AM	K300227	https://doi.org/10.6084/m9.figshare.12600044
Corduliidae	*Hemicordulia flava*	F	ANIC	7-010564	https://doi.org/10.6084/m9.figshare.12600041
Corduliidae	*Hemicordulia flava*	M	AM	K300222	https://doi.org/10.6084/m9.figshare.12600041
Corduliidae	*Hemicordulia intermedia*	F	AM	K300217	https://doi.org/10.6084/m9.figshare.12600032
Corduliidae	*Hemicordulia intermedia*	M	AM	K300211	https://doi.org/10.6084/m9.figshare.12600032
Corduliidae	*Hemicordulia kalliste*	F	ANIC	7-010571	https://doi.org/10.6084/m9.figshare.12600029
Corduliidae	*Hemicordulia kalliste*	M	ANIC	7-010570	https://doi.org/10.6084/m9.figshare.12600029
Corduliidae	*Hemicordulia koomina*	F	ANIC	7-010568	https://doi.org/10.6084/m9.figshare.12600026
Corduliidae	*Hemicordulia koomina*	M	ANIC	7-010566	https://doi.org/10.6084/m9.figshare.12600026
Corduliidae	*Hemicordulia superba*	F	AM	K305501	https://doi.org/10.6084/m9.figshare.12600023
Corduliidae	*Hemicordulia superba*	M	QM	T181120	https://doi.org/10.6084/m9.figshare.12600023
Corduliidae	*Hemicordulia tau*	F	AM	K305494	https://doi.org/10.6084/m9.figshare.12600017
Corduliidae	*Hemicordulia tau*	M	AM	K337597	https://doi.org/10.6084/m9.figshare.12600017
Gomphidae	*Hemigomphus atratus*	M	ANIC	7-005966	https://doi.org/10.6084/m9.figshare.12600011
Gomphidae	*Hemigomphus comitatus*	F	AM	K305688	https://doi.org/10.6084/m9.figshare.12600005
Gomphidae	*Hemigomphus comitatus*	M	AM	K305117	https://doi.org/10.6084/m9.figshare.12600005
Gomphidae	*Hemigomphus cooloola*	F	ANIC	7-005971	https://doi.org/10.6084/m9.figshare.12600002
Gomphidae	*Hemigomphus cooloola*	M	ANIC	7-007445	https://doi.org/10.6084/m9.figshare.12600002
Gomphidae	*Hemigomphus gouldii*	F	AM	K305091	https://doi.org/10.6084/m9.figshare.12599996
Gomphidae	*Hemigomphus gouldii*	M	AM	K305087	https://doi.org/10.6084/m9.figshare.12599996
Gomphidae	*Hemigomphus heteroclytus*	F	AM	K305063	https://doi.org/10.6084/m9.figshare.12599990
Gomphidae	*Hemigomphus heteroclytus*	M	AM	K305068	https://doi.org/10.6084/m9.figshare.12599990
Gomphidae	*Hemigomphus magela*	F	ANIC	7-005995	https://doi.org/10.6084/m9.figshare.12599984
Gomphidae	*Hemigomphus magela*	M	ANIC	7-005993	https://doi.org/10.6084/m9.figshare.12599984
Gomphidae	*Hemigomphus theischingeri*	F	AM	K403344	https://doi.org/10.6084/m9.figshare.12599981
Gomphidae	*Hemigomphus theischingeri*	M	AM	K302112	https://doi.org/10.6084/m9.figshare.12599981
Hemiphlebiidae	*Hemiphlebia mirabilis*	F	AM	K280829	https://doi.org/10.6084/m9.figshare.12591890
Hemiphlebiidae	*Hemiphlebia mirabilis*	M	AM	K280832	https://doi.org/10.6084/m9.figshare.12591890
Austrocorduliidae	*Hesperocordulia berthoudi*	F	AM	K403363	https://doi.org/10.6084/m9.figshare.12599975
Austrocorduliidae	*Hesperocordulia berthoudi*	M	AM	K337587	https://doi.org/10.6084/m9.figshare.12599975
Libellulidae	*Huonia melvillensis*	M	AM	K299549	https://doi.org/10.6084/m9.figshare.12599969
Libellulidae	*Hydrobasileus brevistylus*	F	AM	K299558	https://doi.org/10.6084/m9.figshare.12599960
Libellulidae	*Hydrobasileus brevistylus*	M	AM	K299554	https://doi.org/10.6084/m9.figshare.12599960
Lindeniidae	*Ictinogomphus australis*	F	AM	K305045	https://doi.org/10.6084/m9.figshare.12599957
Lindeniidae	*Ictinogomphus australis*	M	AM	K305040	https://doi.org/10.6084/m9.figshare.12599957
Lindeniidae	*Ictinogomphus dobsoni*	F	AM	K456313	https://doi.org/10.6084/m9.figshare.12599954
Lindeniidae	*Ictinogomphus dobsoni*	M	AM	K305036	https://doi.org/10.6084/m9.figshare.12599954
Lindeniidae	*Ictinogomphus paulini*	M	AM	K403376	https://doi.org/10.6084/m9.figshare.12599948
Lestidae	*Indolestes alleni*	F	AM	K302036	https://doi.org/10.6084/m9.figshare.12591884
Lestidae	*Indolestes alleni*	M	AM	K403347	https://doi.org/10.6084/m9.figshare.12591884
Lestidae	*Indolestes obiri*	F	ANIC	7-003705	https://doi.org/10.6084/m9.figshare.12591881
Lestidae	*Indolestes obiri*	M	ANIC	7-003707	https://doi.org/10.6084/m9.figshare.12591881
Lestidae	*Indolestes tenuissimus*	F	AM	K302034	https://doi.org/10.6084/m9.figshare.12591878
Lestidae	*Indolestes tenuissimus*	M	AM	K302032	https://doi.org/10.6084/m9.figshare.12591878
Coenagrionidae	*Ischnura aurora*	F	AM	K301077	https://doi.org/10.6084/m9.figshare.12591869
Coenagrionidae	*Ischnura aurora*	M	AM	K301076	https://doi.org/10.6084/m9.figshare.12591869
Coenagrionidae	*Ischnura heterosticta*	F	AM	K305404	https://doi.org/10.6084/m9.figshare.12591863
Coenagrionidae	*Ischnura heterosticta*	M	AM	K305403	https://doi.org/10.6084/m9.figshare.12591863

family	species	sex	Coll.	Coll.Reg.	*figshare* DOI for wing images
Coenagrionidae	*Ischnura pruinescens*	F	AM	K305381	https://doi.org/10.6084/m9.figshare.12591860
Coenagrionidae	*Ischnura pruinescens*	M	AM	K305662	https://doi.org/10.6084/m9.figshare.12591860
Isostictidae	*Labidiosticta vallisi*	F	ANIC	7-012205	https://doi.org/10.6084/m9.figshare.12591842
Isostictidae	*Labidiosticta vallisi*	M	AM	K301412	https://doi.org/10.6084/m9.figshare.12591842
Libellulidae	*Lathrecista asiatica*	F	AM	K299562	https://doi.org/10.6084/m9.figshare.12599945
Libellulidae	*Lathrecista asiatica*	M	AM	K299560	https://doi.org/10.6084/m9.figshare.12599945
Austrocorduliidae	*Lathrocordulia garrisoni*	M	ANIC	7-010330	https://doi.org/10.6084/m9.figshare.12599942
Austrocorduliidae	*Lathrocordulia metallica*	F	ANIC	7-010343	https://doi.org/10.6084/m9.figshare.12599939
Austrocorduliidae	*Lathrocordulia metallica*	M	AM	K337589	https://doi.org/10.6084/m9.figshare.12599939
Lestidae	*Lestes concinnus*	F	AM	K305601	https://doi.org/10.6084/m9.figshare.12591833
Lestidae	*Lestes concinnus*	M	AM	K302019	https://doi.org/10.6084/m9.figshare.12591833
Lestoideidae	*Lestoidea barbarae*	M	ANIC	7-002864	https://doi.org/10.6084/m9.figshare.12591797
Lestoideidae	*Lestoidea brevicauda*	F	AM	K301659	https://doi.org/10.6084/m9.figshare.12591788
Lestoideidae	*Lestoidea brevicauda*	M	AM	K301661	https://doi.org/10.6084/m9.figshare.12591788
Lestoideidae	*Lestoidea conjuncta*	F	AM	K305608	https://doi.org/10.6084/m9.figshare.12591785
Lestoideidae	*Lestoidea conjuncta*	M	AM	K301646	https://doi.org/10.6084/m9.figshare.12591785
Lestoideidae	*Lestoidea lewisiana*	F	AM	K301645	https://doi.org/10.6084/m9.figshare.12591773
Lestoideidae	*Lestoidea lewisiana*	M	AM	K301645	https://doi.org/10.6084/m9.figshare.12591773
Isostictidae	*Lithosticta macra*	F	ANIC	7-002813	https://doi.org/10.6084/m9.figshare.12591761
Isostictidae	*Lithosticta macra*	M	ANIC	7-002814	https://doi.org/10.6084/m9.figshare.12591761
Libellulidae	*Macrodiplax cora*	F	AM	K299578	https://doi.org/10.6084/m9.figshare.12599933
Libellulidae	*Macrodiplax cora*	M	AM	K299575	https://doi.org/10.6084/m9.figshare.12599933
Macromiidae	*Macromia tillyardi*	F	AM	K403338	https://doi.org/10.6084/m9.figshare.12599930
Macromiidae	*Macromia tillyardi*	M	AM	K300147	https://doi.org/10.6084/m9.figshare.12599930
Macromiidae	*Macromia viridescens*	F	AM	K403339	https://doi.org/10.6084/m9.figshare.12599927
Macromiidae	*Macromia viridescens*	M	AM	K259738	https://doi.org/10.6084/m9.figshare.12599927
Corduliidae	*Metaphya tillyardi*	M	AM	K259746	https://doi.org/10.6084/m9.figshare.12599924
Austrocorduliidae	*Micromidia atrifrons*	F	AM	K300160	https://doi.org/10.6084/m9.figshare.12599921
Austrocorduliidae	*Micromidia atrifrons*	M	AM	K300159	https://doi.org/10.6084/m9.figshare.12599921
Austrocorduliidae	*Micromidia convergens*	F	AM	K300149	https://doi.org/10.6084/m9.figshare.12599918
Austrocorduliidae	*Micromidia convergens*	M	AM	K259797	https://doi.org/10.6084/m9.figshare.12599918
Austrocorduliidae	*Micromidia rodericki*	F	ANIC	7-010408	https://doi.org/10.6084/m9.figshare.12599912
Austrocorduliidae	*Micromidia rodericki*	M	ANIC	7-010408	https://doi.org/10.6084/m9.figshare.12599912
Megapodagrionidae	*Miniargiolestes minimus*	F	AM	K339021	https://doi.org/10.6084/m9.figshare.12591758
Megapodagrionidae	*Miniargiolestes minimus*	M	AM	K337859	https://doi.org/10.6084/m9.figshare.12591758
Libellulidae	*Nannodiplax rubra*	F	AM	K299580	https://doi.org/10.6084/m9.figshare.12599909
Libellulidae	*Nannodiplax rubra*	M	AM	K299593	https://doi.org/10.6084/m9.figshare.12599909
Libellulidae	*Nannophlebia eludens*	F	AM	K305515	https://doi.org/10.6084/m9.figshare.12599906
Libellulidae	*Nannophlebia eludens*	M	AM	K299655	https://doi.org/10.6084/m9.figshare.12599906
Libellulidae	*Nannophlebia injibandi*	F	MAGNT	I001819	https://doi.org/10.6084/m9.figshare.12599903
Libellulidae	*Nannophlebia injibandi*	M	MAGNT	I001818	https://doi.org/10.6084/m9.figshare.12599903
Libellulidae	*Nannophlebia mudginberri*	F	MAGNT	I001821	https://doi.org/10.6084/m9.figshare.12599897
Libellulidae	*Nannophlebia mudginberri*	M	MAGNT	I001822	https://doi.org/10.6084/m9.figshare.12599897
Libellulidae	*Nannophlebia risi*	F	AM	K299646	https://doi.org/10.6084/m9.figshare.12599894
Libellulidae	*Nannophlebia risi*	M	AM	K299639	https://doi.org/10.6084/m9.figshare.12599894
Libellulidae	*Nannophya australis*	F	AM	K299607	https://doi.org/10.6084/m9.figshare.12599891
Libellulidae	*Nannophya australis*	M	AM	K299625	https://doi.org/10.6084/m9.figshare.12599891
Libellulidae	*Nannophya dalei*	F	AM	K299604	https://doi.org/10.6084/m9.figshare.12599888
Libellulidae	*Nannophya dalei*	M	AM	K299601	https://doi.org/10.6084/m9.figshare.12599888
Libellulidae	*Nannophya occidentalis*	F	ANIC	7-014675	https://doi.org/10.6084/m9.figshare.12599885
Libellulidae	*Nannophya occidentalis*	M	ANIC	7-014670	https://doi.org/10.6084/m9.figshare.12599885
Libellulidae	*Nannophya paulsoni*	F	ANIC	7-014658	https://doi.org/10.6084/m9.figshare.12599882
Libellulidae	*Nannophya paulsoni*	M	ANIC	7-014658	https://doi.org/10.6084/m9.figshare.12599882
Isostictidae	*Neosticta canescens*	F	AM	K301390	https://doi.org/10.6084/m9.figshare.12591752
Isostictidae	*Neosticta canescens*	M	AM	K301409	https://doi.org/10.6084/m9.figshare.12591752
Isostictidae	*Neosticta fraseri*	F	AM	K305621	https://doi.org/10.6084/m9.figshare.12591749
Isostictidae	*Neosticta fraseri*	M	AM	K301374	https://doi.org/10.6084/m9.figshare.12591749
Isostictidae	*Neosticta silvarum*	M	ANIC	7-002874	https://doi.org/10.6084/m9.figshare.12591710
Calopterygidae	*Neurobasis australis*	F	ANIC	unregistered	https://doi.org/10.6084/m9.figshare.12591671
Calopterygidae	*Neurobasis australis*	M	AM	K403346	https://doi.org/10.6084/m9.figshare.12591671
Libellulidae	*Neurothemis oligoneura*	F	AM	K299595	https://doi.org/10.6084/m9.figshare.12599879
Libellulidae	*Neurothemis oligoneura*	M	AM	K299594	https://doi.org/10.6084/m9.figshare.12599879
Libellulidae	*Neurothemis stigmatizans*	F	AM	K299690	https://doi.org/10.6084/m9.figshare.12599876
Libellulidae	*Neurothemis stigmatizans*	M	AM	K299687	https://doi.org/10.6084/m9.figshare.12599876
Platycnemididae	*Nososticta baroalba*	F	AM	K403356	https://doi.org/10.6084/m9.figshare.12591617
Platycnemididae	*Nososticta baroalba*	M	AM	K403355	https://doi.org/10.6084/m9.figshare.12591617
Platycnemididae	*Nososticta coelestina*	F	AM	K301320	https://doi.org/10.6084/m9.figshare.12588146
Platycnemididae	*Nososticta coelestina*	M	AM	K301316	https://doi.org/10.6084/m9.figshare.12588146
Platycnemididae	*Nososticta fraterna*	F	ANIC	7-002456	https://doi.org/10.6084/m9.figshare.12588125
Platycnemididae	*Nososticta fraterna*	M	AM	K301312	https://doi.org/10.6084/m9.figshare.12588125
Platycnemididae	*Nososticta kalumburu*	F	AM	K301311	https://doi.org/10.6084/m9.figshare.12588110
Platycnemididae	*Nososticta kalumburu*	M	AM	K301310	https://doi.org/10.6084/m9.figshare.12588110
Platycnemididae	*Nososticta koolpinyah*	F	ANIC	7-002496	https://doi.org/10.6084/m9.figshare.12588101
Platycnemididae	*Nososticta koolpinyah*	M	ANIC	7-002508	https://doi.org/10.6084/m9.figshare.12588101
Platycnemididae	*Nososticta koongarra*	F	AM	K301305	https://doi.org/10.6084/m9.figshare.12582056
Platycnemididae	*Nososticta koongarra*	M	ANIC	7-002528	https://doi.org/10.6084/m9.figshare.12582056
Platycnemididae	*Nososticta liveringa*	F	ANIC	7-002536	https://doi.org/10.6084/m9.figshare.12582044
Platycnemididae	*Nososticta liveringa*	M	ANIC	7-011947	https://doi.org/10.6084/m9.figshare.12582044
Platycnemididae	*Nososticta mouldsi*	F	AM	K301303	https://doi.org/10.6084/m9.figshare.12582017
Platycnemididae	*Nososticta mouldsi*	M	AM	K301303	https://doi.org/10.6084/m9.figshare.12582017

family	species	sex	Coll.	Coll.Reg.	*figshare* DOI for wing images
Platycnemididae	*Nososticta pilbara*	F	AM	K403322	https://doi.org/10.6084/m9.figshare.12582005
Platycnemididae	*Nososticta pilbara*	M	AM	K301302	https://doi.org/10.6084/m9.figshare.12582005
Platycnemididae	*Nososticta solida*	F	AM	K301298	https://doi.org/10.6084/m9.figshare.12581978
Platycnemididae	*Nososticta solida*	M	AM	K301299	https://doi.org/10.6084/m9.figshare.12581978
Platycnemididae	*Nososticta solitaria*	F	AM	K301262	https://doi.org/10.6084/m9.figshare.12581972
Platycnemididae	*Nososticta solitaria*	M	AM	K301216	https://doi.org/10.6084/m9.figshare.12581972
Platycnemididae	*Nososticta taracumbi*	F	ANIC	7-002518	https://doi.org/10.6084/m9.figshare.12581951
Platycnemididae	*Nososticta taracumbi*	M	AM	K301212	https://doi.org/10.6084/m9.figshare.12581951
Telephlebiidae	*Notoaeschna geminata*	F	AM	K299343	https://doi.org/10.6084/m9.figshare.12599873
Telephlebiidae	*Notoaeschna geminata*	M	AM	K299342	https://doi.org/10.6084/m9.figshare.12599873
Telephlebiidae	*Notoaeschna sagittata*	F	AM	K299331	https://doi.org/10.6084/m9.figshare.12599870
Telephlebiidae	*Notoaeschna sagittata*	M	AM	K299337	https://doi.org/10.6084/m9.figshare.12599870
Libellulidae	*Notolibellula bicolor*	M	AM	K299709	https://doi.org/10.6084/m9.figshare.12599864
Gomphidae	*Odontogomphus donnellyi*	F	ANIC	7-006092	https://doi.org/10.6084/m9.figshare.12599861
Gomphidae	*Odontogomphus donnellyi*	M	ANIC	7-006094	https://doi.org/10.6084/m9.figshare.12599861
Isostictidae	*Oristicta filicicola*	F	AM	K301365	https://doi.org/10.6084/m9.figshare.12581906
Isostictidae	*Oristicta filicicola*	M	AM	K301366	https://doi.org/10.6084/m9.figshare.12581906
Libellulidae	*Orthetrum balteatum*	F	ANIC	7-013521	https://doi.org/10.6084/m9.figshare.12599858
Libellulidae	*Orthetrum balteatum*	M	AM	K403368	https://doi.org/10.6084/m9.figshare.12599858
Libellulidae	*Orthetrum boumiera*	F	AM	K299740	https://doi.org/10.6084/m9.figshare.12599855
Libellulidae	*Orthetrum boumiera*	M	AM	K299741	https://doi.org/10.6084/m9.figshare.12599855
Libellulidae	*Orthetrum caledonicum*	F	AM	K299734	https://doi.org/10.6084/m9.figshare.12599849
Libellulidae	*Orthetrum caledonicum*	M	AM	K305580	https://doi.org/10.6084/m9.figshare.12599849
Libellulidae	*Orthetrum migratum*	F	AM	K299720	https://doi.org/10.6084/m9.figshare.12599846
Libellulidae	*Orthetrum migratum*	M	AM	K299722	https://doi.org/10.6084/m9.figshare.12599846
Libellulidae	*Orthetrum sabina*	F	AM	K305165	https://doi.org/10.6084/m9.figshare.12599843
Libellulidae	*Orthetrum sabina*	M	AM	K305163	https://doi.org/10.6084/m9.figshare.12599843
Libellulidae	*Orthetrum serapia*	F	AM	K305148	https://doi.org/10.6084/m9.figshare.12599840
Libellulidae	*Orthetrum serapia*	M	AM	K305151	https://doi.org/10.6084/m9.figshare.12599840
Libellulidae	*Orthetrum villosovittatum*	F	AM	K305131	https://doi.org/10.6084/m9.figshare.12599831
Libellulidae	*Orthetrum villosovittatum*	M	AM	K305129	https://doi.org/10.6084/m9.figshare.12599831
Libellulidae	*Pantala flavescens*	F	AM	K305237	https://doi.org/10.6084/m9.figshare.12599825
Libellulidae	*Pantala flavescens*	M	AM	K305335	https://doi.org/10.6084/m9.figshare.12599825
Synthemistidae	*Parasynthemis regina*	F	AM	K299976	https://doi.org/10.6084/m9.figshare.12599822
Synthemistidae	*Parasynthemis regina*	M	AM	K299976	https://doi.org/10.6084/m9.figshare.12599822
Corduliidae	*Pentathemis membranulata*	F	AM	K300201	https://doi.org/10.6084/m9.figshare.12599819
Corduliidae	*Pentathemis membranulata*	M	AM	K300203	https://doi.org/10.6084/m9.figshare.12599819
Petaluridae	*Petalura gigantea*	F	AM	K403337	https://doi.org/10.6084/m9.figshare.12599813
Petaluridae	*Petalura gigantea*	M	AM	K305486	https://doi.org/10.6084/m9.figshare.12599813
Petaluridae	*Petalura hesperia*	F	ANIC	7-005055	https://doi.org/10.6084/m9.figshare.12599807
Petaluridae	*Petalura hesperia*	M	ANIC	7-005049	https://doi.org/10.6084/m9.figshare.12599807
Petaluridae	*Petalura ingentissima*	F	AM	K403367	https://doi.org/10.6084/m9.figshare.12599801
Petaluridae	*Petalura ingentissima*	M	ANIC	7-005063	https://doi.org/10.6084/m9.figshare.12599801
Petaluridae	*Petalura litorea*	F	AM	K456322	https://doi.org/10.6084/m9.figshare.12599780
Petaluridae	*Petalura litorea*	M	QM	T176058	https://doi.org/10.6084/m9.figshare.12599780
Megapodagrionidae	*Podopteryx selysi*	F	ANIC	7-009055	https://doi.org/10.6084/m9.figshare.12581894
Megapodagrionidae	*Podopteryx selysi*	M	AM	K301840	https://doi.org/10.6084/m9.figshare.12581894
Libellulidae	*Potamarcha congener*	F	AM	K305206	https://doi.org/10.6084/m9.figshare.12598652
Libellulidae	*Potamarcha congener*	M	AM	K305221	https://doi.org/10.6084/m9.figshare.12598652
Corduliidae	*Procordulia affinis*	F	ANIC	7-010490	https://doi.org/10.6084/m9.figshare.12598649
Corduliidae	*Procordulia affinis*	M	ANIC	7-010501	https://doi.org/10.6084/m9.figshare.12598649
Corduliidae	*Procordulia jacksoniensis*	F	AM	K403323	https://doi.org/10.6084/m9.figshare.12598646
Corduliidae	*Procordulia jacksoniensis*	M	AM	K300208	https://doi.org/10.6084/m9.figshare.12598646
Coenagrionidae	*Pseudagrion aureofrons*	F	AM	K305372	https://doi.org/10.6084/m9.figshare.12581882
Coenagrionidae	*Pseudagrion aureofrons*	M	AM	K305371	https://doi.org/10.6084/m9.figshare.12581882
Coenagrionidae	*Pseudagrion cingillum*	F	ANIC	7-000466	https://doi.org/10.6084/m9.figshare.12581861
Coenagrionidae	*Pseudagrion cingillum*	M	AM	K305369	https://doi.org/10.6084/m9.figshare.12581861
Coenagrionidae	*Pseudagrion ignifer*	F	AM	K305325	https://doi.org/10.6084/m9.figshare.12581843
Coenagrionidae	*Pseudagrion ignifer*	M	AM	K305332	https://doi.org/10.6084/m9.figshare.12581843
Coenagrionidae	*Pseudagrion jedda*	F	ANIC	7-000961	https://doi.org/10.6084/m9.figshare.12581840
Coenagrionidae	*Pseudagrion jedda*	M	ANIC	7-001043	https://doi.org/10.6084/m9.figshare.12581840
Coenagrionidae	*Pseudagrion lucifer*	F	ANIC	7-000426	https://doi.org/10.6084/m9.figshare.12581834
Coenagrionidae	*Pseudagrion lucifer*	M	AM	K305318	https://doi.org/10.6084/m9.figshare.12581834
Coenagrionidae	*Pseudagrion microcephalum*	F	AM	K305303	https://doi.org/10.6084/m9.figshare.12581765
Coenagrionidae	*Pseudagrion microcephalum*	M	AM	K305300	https://doi.org/10.6084/m9.figshare.12581765
Pseudocorduliidae	*Pseudocordulia circularis*	F	ANIC	7-010312	https://doi.org/10.6084/m9.figshare.12598643
Pseudocorduliidae	*Pseudocordulia circularis*	M	ANIC	7-010286	https://doi.org/10.6084/m9.figshare.12598643
Pseudocorduliidae	*Pseudocordulia elliptica*	F	AM	K305696	https://doi.org/10.6084/m9.figshare.12598640
Pseudocorduliidae	*Pseudocordulia elliptica*	M	AM	K305697	https://doi.org/10.6084/m9.figshare.12598640
Libellulidae	*Raphismia bispina*	M	ANIC	7-014714	https://doi.org/10.6084/m9.figshare.12598631
Isostictidae	*Rhadinosticta banksi*	F	AM	K301362	https://doi.org/10.6084/m9.figshare.12581762
Isostictidae	*Rhadinosticta banksi*	M	AM	K301361	https://doi.org/10.6084/m9.figshare.12581762
Isostictidae	*Rhadinosticta simplex*	F	AM	K301347	https://doi.org/10.6084/m9.figshare.12581756
Isostictidae	*Rhadinosticta simplex*	M	AM	K301352	https://doi.org/10.6084/m9.figshare.12581756
Chlorocyphidae	*Rhinocypha tincta*	F	AM	K403353	https://doi.org/10.6084/m9.figshare.12581747
Chlorocyphidae	*Rhinocypha tincta*	M	AM	K403352	https://doi.org/10.6084/m9.figshare.12581747
Libellulidae	*Rhodothemis lieftincki*	F	AM	K305199	https://doi.org/10.6084/m9.figshare.12598628
Libellulidae	*Rhodothemis lieftincki*	M	AM	K305200	https://doi.org/10.6084/m9.figshare.12598628
Libellulidae	*Rhyothemis braganza*	F	AM	K305192	https://doi.org/10.6084/m9.figshare.12598583
Libellulidae	*Rhyothemis braganza*	M	AM	K305191	https://doi.org/10.6084/m9.figshare.12598583

family	species	sex	Coll.	Coll.Reg.	*figshare* DOI for wing images
Libellulidae	*Rhyothemis graphiptera*	F	AM	K305535	https://doi.org/10.6084/m9.figshare.12598580
Libellulidae	*Rhyothemis graphiptera*	M	AM	K305183	https://doi.org/10.6084/m9.figshare.12598580
Libellulidae	*Rhyothemis phyllis*	F	AM	K305178	https://doi.org/10.6084/m9.figshare.12598577
Libellulidae	*Rhyothemis phyllis*	M	AM	K305171	https://doi.org/10.6084/m9.figshare.12598577
Libellulidae	*Rhyothemis princeps*	F	AM	K305288	https://doi.org/10.6084/m9.figshare.12598571
Libellulidae	*Rhyothemis princeps*	M	AM	K305597	https://doi.org/10.6084/m9.figshare.12598571
Libellulidae	*Rhyothemis resplendens*	F	AM	K403362	https://doi.org/10.6084/m9.figshare.12598565
Libellulidae	*Rhyothemis resplendens*	M	AM	K305278	https://doi.org/10.6084/m9.figshare.12598565
Telephlebiidae	*Spinaeschna tripunctata*	F	AM	K299327	https://doi.org/10.6084/m9.figshare.12598562
Telephlebiidae	*Spinaeschna tripunctata*	M	AM	K299322	https://doi.org/10.6084/m9.figshare.12598562
Telephlebiidae	*Spinaeschna watsoni*	F	ANIC	7-006800	https://doi.org/10.6084/m9.figshare.12598556
Telephlebiidae	*Spinaeschna watsoni*	M	ANIC	7-006799	https://doi.org/10.6084/m9.figshare.12598556
Synlestidae	*Synlestes selysi*	F	AM	K301602	https://doi.org/10.6084/m9.figshare.12581741
Synlestidae	*Synlestes selysi*	M	AM	K301601	https://doi.org/10.6084/m9.figshare.12581741
Synlestidae	*Synlestes tropicus*	F	AM	K301595	https://doi.org/10.6084/m9.figshare.12581729
Synlestidae	*Synlestes tropicus*	M	AM	K301598	https://doi.org/10.6084/m9.figshare.12581729
Synlestidae	*Synlestes weyersii*	F	AM	K301571	https://doi.org/10.6084/m9.figshare.12581702
Synlestidae	*Synlestes weyersii*	M	AM	K301561	https://doi.org/10.6084/m9.figshare.12581702
Synthemistidae	*Synthemiopsis gomphomacromioides*	F	AM	K403365	https://doi.org/10.6084/m9.figshare.12598550
Synthemistidae	*Synthemiopsis gomphomacromioides*	M	AM	K259782	https://doi.org/10.6084/m9.figshare.12598550
Synthemistidae	*Synthemis eustalacta*	F	AM	K299972	https://doi.org/10.6084/m9.figshare.12598541
Synthemistidae	*Synthemis eustalacta*	M	AM	K299962	https://doi.org/10.6084/m9.figshare.12598541
Synthemistidae	*Synthemis tasmanica*	F	AM	K299947	https://doi.org/10.6084/m9.figshare.12598538
Synthemistidae	*Synthemis tasmanica*	M	AM	K299945	https://doi.org/10.6084/m9.figshare.12598538
Coenagrionidae	*Teinobasis rufithorax*	F	AM	K286223	https://doi.org/10.6084/m9.figshare.12581684
Coenagrionidae	*Teinobasis rufithorax*	M	AM	K305297	https://doi.org/10.6084/m9.figshare.12581684
Telephlebiidae	*Telephlebia brevicauda*	F	AM	K299424	https://doi.org/10.6084/m9.figshare.12598532
Telephlebiidae	*Telephlebia brevicauda*	M	AM	K299421	https://doi.org/10.6084/m9.figshare.12598532
Telephlebiidae	*Telephlebia cyclops*	F	AM	K299417	https://doi.org/10.6084/m9.figshare.12598529
Telephlebiidae	*Telephlebia cyclops*	M	AM	K299416	https://doi.org/10.6084/m9.figshare.12598529
Telephlebiidae	*Telephlebia godeffroyi*	F	AM	K299409	https://doi.org/10.6084/m9.figshare.12598526
Telephlebiidae	*Telephlebia godeffroyi*	M	AM	K299407	https://doi.org/10.6084/m9.figshare.12598526
Telephlebiidae	*Telephlebia tillyardi*	F	AM	K299396	https://doi.org/10.6084/m9.figshare.12598520
Telephlebiidae	*Telephlebia tillyardi*	M	AM	K299401	https://doi.org/10.6084/m9.figshare.12598520
Telephlebiidae	*Telephlebia tryoni*	F	AM	K403341	https://doi.org/10.6084/m9.figshare.12598517
Telephlebiidae	*Telephlebia tryoni*	M	AM	K299386	https://doi.org/10.6084/m9.figshare.12598517
Telephlebiidae	*Telephlebia undia*	F	ANIC	7-007256	https://doi.org/10.6084/m9.figshare.12598514
Telephlebiidae	*Telephlebia undia*	M	ANIC	7-006287	https://doi.org/10.6084/m9.figshare.12598514
Libellulidae	*Tetrathemis irregularis*	F	AM	K305544	https://doi.org/10.6084/m9.figshare.12598511
Libellulidae	*Tetrathemis irregularis*	M	AM	K305275	https://doi.org/10.6084/m9.figshare.12598511
Libellulidae	*Tholymis tillarga*	F	AM	K305271	https://doi.org/10.6084/m9.figshare.12598505
Libellulidae	*Tholymis tillarga*	M	AM	K305260	https://doi.org/10.6084/m9.figshare.12598505
Synthemistidae	*Tonyosynthemis claviculata*	F	AM	K299944	https://doi.org/10.6084/m9.figshare.12598502
Synthemistidae	*Tonyosynthemis claviculata*	M	AM	K305705	https://doi.org/10.6084/m9.figshare.12598502
Synthemistidae	*Tonyosynthemis ofarrelli*	F	AM	K309683	https://doi.org/10.6084/m9.figshare.12598499
Synthemistidae	*Tonyosynthemis ofarrelli*	M	AM	K299935	https://doi.org/10.6084/m9.figshare.12598499
Libellulidae	*Tramea eurybia*	F	QM	T174436	https://doi.org/10.6084/m9.figshare.12598496
Libellulidae	*Tramea eurybia*	M	AM	K403336	https://doi.org/10.6084/m9.figshare.12598496
Libellulidae	*Tramea loewii*	F	AM	K305251	https://doi.org/10.6084/m9.figshare.12598493
Libellulidae	*Tramea loewii*	M	AM	K305254	https://doi.org/10.6084/m9.figshare.12598493
Libellulidae	*Tramea propinqua*	F	ANIC	7-013894	https://doi.org/10.6084/m9.figshare.12598490
Libellulidae	*Tramea propinqua*	M	AM	K403369	https://doi.org/10.6084/m9.figshare.12598490
Libellulidae	*Tramea stenoloba*	F	ANIC	7-013725	https://doi.org/10.6084/m9.figshare.12598484
Libellulidae	*Tramea stenoloba*	M	ANIC	7-013749	https://doi.org/10.6084/m9.figshare.12598484
Libellulidae	*Urothemis aliena*	M	AM	K305503	https://doi.org/10.6084/m9.figshare.12598481
Coenagrionidae	*Xanthagrion erythroneurum*	F	AM	K337784	https://doi.org/10.6084/m9.figshare.12581552
Coenagrionidae	*Xanthagrion erythroneurum*	M	AM	K305296	https://doi.org/10.6084/m9.figshare.12581552
Gomphidae	*Zephyrogomphus lateralis*	F	ANIC	7-005804	https://doi.org/10.6084/m9.figshare.12598478
Gomphidae	*Zephyrogomphus lateralis*	M	AM	K337646	https://doi.org/10.6084/m9.figshare.12598478
Gomphidae	*Zephyrogomphus longipositor*	F	ANIC	7-006095	https://doi.org/10.6084/m9.figshare.12598472
Libellulidae	*Zyxomma elgneri*	F	AM	K305240	https://doi.org/10.6084/m9.figshare.12598469
Libellulidae	*Zyxomma elgneri*	M	AM	K305241	https://doi.org/10.6084/m9.figshare.12598469
Libellulidae	*Zyxomma multinervorum*	F	AM	K403366	https://doi.org/10.6084/m9.figshare.12598460
Libellulidae	*Zyxomma petiolatum*	F	AM	K305238	https://doi.org/10.6084/m9.figshare.12598454
Libellulidae	*Zyxomma petiolatum*	M	AM	K305239	https://doi.org/10.6084/m9.figshare.12598454

Appendix 4—Library volumes

This project has created a library of five volumes: two volumes are of images of wings at a variable scale, two volumes are of images of wings at a fixed scale, and one volume is an index.

High resolution images from Volumes 3 and 4 have been downsampled and offered in the present work as an easy-to-view contact-sheet or thumbnail-series (see Appendix 1 for Anisoptera thumbnail-images, pp. 11–63; and Appendix 2 for Zygoptera thumbnail-images, pp. 64–92). Volumes 1–4 (Tann, 2020a–d) hold full sets of images which can be browsed and downloaded individually or as a complete set. The full *Index* (see Tann, 2020e, abridged in Appendix 3) is a downloadable spreadsheet with links to wing images of each individual species, a whole-of-body image of each reference specimen used, and its occurrence record on the *Atlas of Living Australia*.

Volume 1

Anisoptera wings—variable scale lengths, all wings presented at full width

Tann, John. 2020a. Wings of Australian Odonata—Volume 1. Anisoptera. *figshare*. https://doi.org/10.6084/m9.figshare.11845230

Volume 2

Zygoptera wings—variable scale lengths, all wings presented at full width

Tann, John. 2020b. Wings of Australian Odonata—Volume 1. Zygoptera. *figshare*. https://doi.org/10.6084/m9.figshare.12579959

Volume 3

Anisoptera wings—fixed scale length, all wings presented to scale

Tann, John. 2020c. Wings of Australian Odonata—Volume 3. Anisoptera fixed scale. *figshare*. https://doi.org/10.6084/m9.figshare.12612038

Volume 4

Zygoptera wings—fixed scale length, all wings presented to scale

Tann, John. 2020d. Wings of Australian Odonata—Volume 4. Zygoptera fixed scale. *figshare*. https://doi.org/10.6084/m9.figshare.12612041

Index

Tann, John. 2020e. Wings of Australian Odonata—Index. *figshare* https://doi.org/10.6084/m9.figshare.11840013