



Family Austrocordulidae

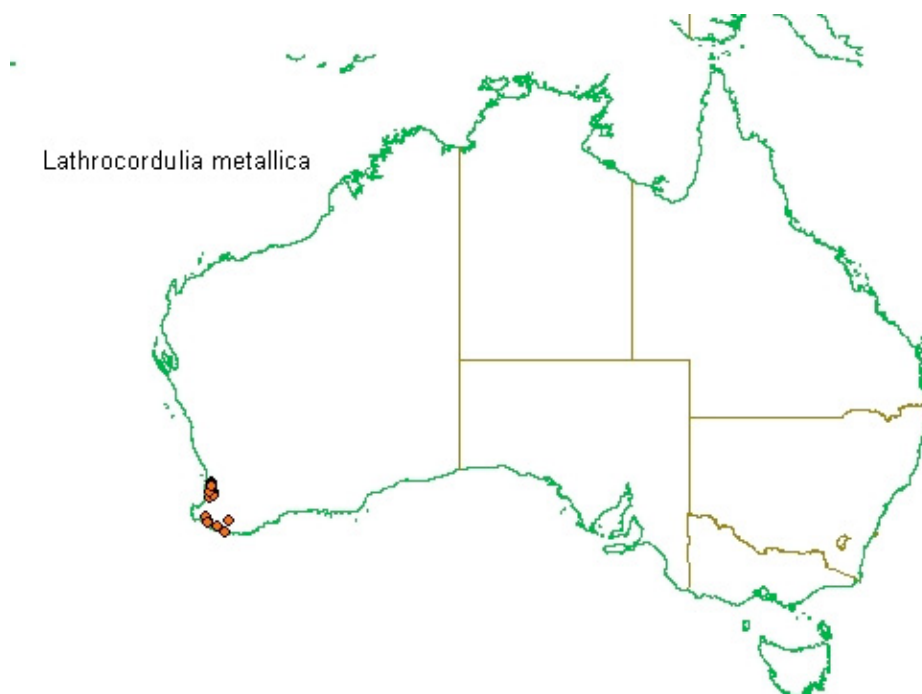
Habitat profile for *Lathrocordulia metallica* Tillyard

Lathrocordulia metallica Tillyard is a regionally endemic dragonfly from the south west Western Australia south of Perth (Houston and Watson 1988; Sutcliffe 2003; Theischinger 2001). Nymphs were recorded from 25 sites but were relatively restricted in their distribution.

L. metallica was found in channel, macrophyte, edge habitats in small slow flowing permanent streams that were at altitudes below 260m (Chart a), less than 16km from their source (Chart b) and the substrate was dominated by sand and gravel and detritus exceeded 25% cover (Chart c). The streams were less than 4m wide (Chart d), alkalinity was low (Chart e) and conductivity was moderate ranging from 164 to 679 $\mu\text{S}/\text{cm}$ (Chart f).

The following generalities can be made about the other parameters listed in the Table: relatively low temperature (11.1-24.4 °C), pH was circum-neutral in the range of 4.9-8.1 and very low turbidity (<6 NTU).

Mean, median and range for selected physical and chemical parameters and habitat categories are given in the Table.



Distribution of *Lathrocordulia metallica* in Australia.

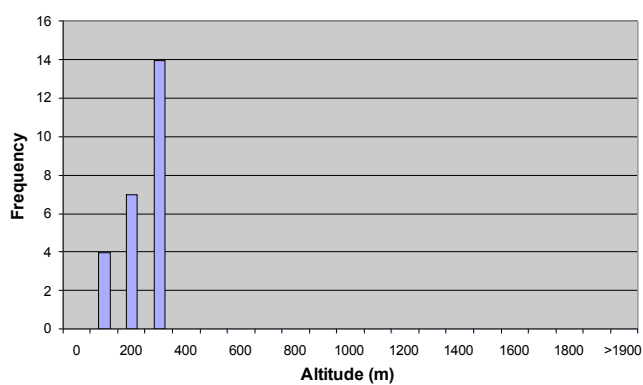


Lathrocordulia metallica nymph

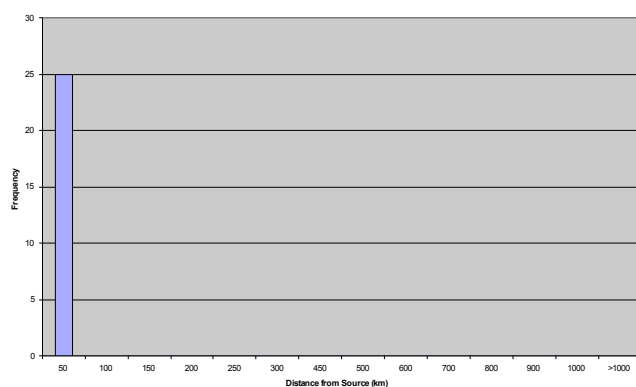


Charts for *Lathrocordulia metallica*

a) Altitude

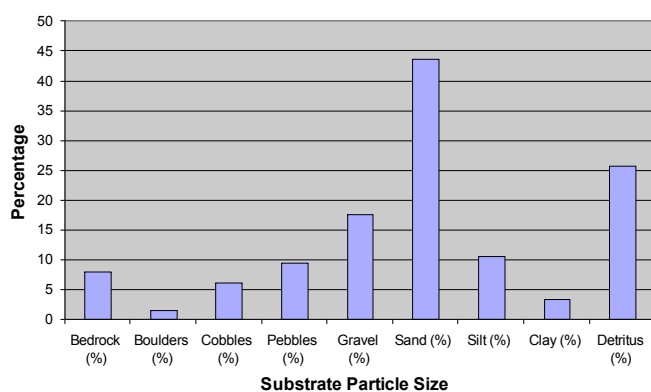


b) Distance from source

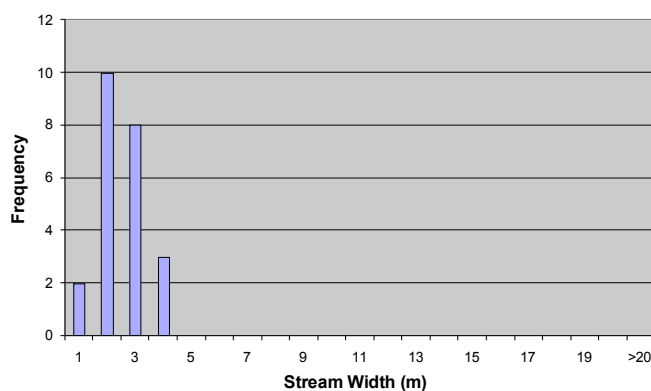




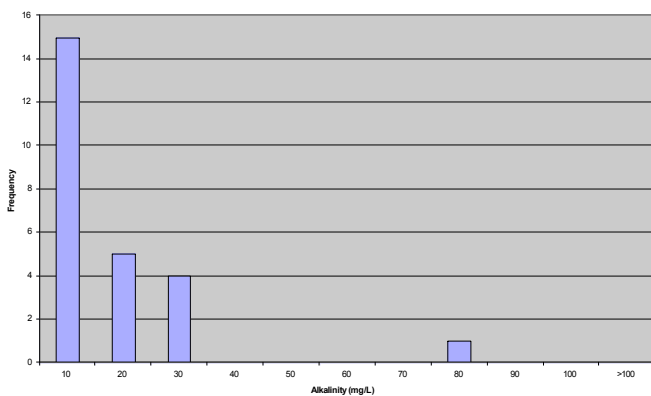
c) Substrate Particle Size



d) Stream Width



f) Alkalinity



g) Conductivity

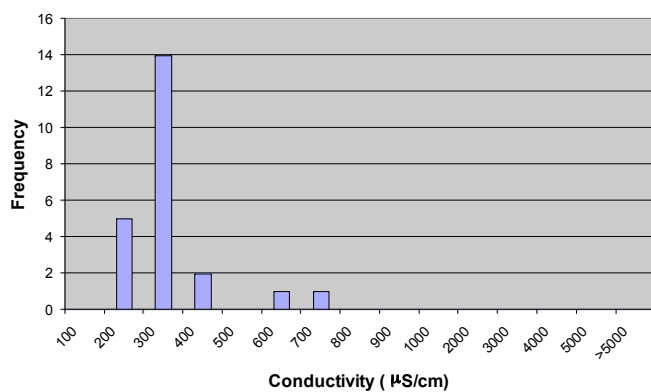




Table. Mean, median and range for selected physical and chemical parameters and habitat categories for *Lathrocordulia metallica* (N= number of records).

	Mean	Median	Range	N
Altitude (m)	184	210	20-260	23
Distance from source (km)	7.1	6.0	2-16	23
Width (m)	2.2	2.0	0.77-4	23
Depth (m)				
Water Temperature	15.9	15.5	11.1-24.4	23
Conductivity (µS/cm)	260	233	164-679	23
pH	6.6	6.5	5.9-7.8	23
Turbidity (NTU)	2.4	2	0.3-5.7	23
Oxidised Nitrogen (mg/L)	0.060	0.020	0.010-0.460	23
Total N (mg/L)	0.26	0.19	0.05-0.80	23
Total P (mg/L)	0.006	0.005	0.005-0.010	23
Alkalinity (mg/L)	14.6	10	5-75	23

References

Houston WWK, Watson JAL (1988) Odonata. In 'Zoological Catalogue of Australia'. (Eds DW Walton and WWK Houston) pp. 33-132. (Australian Government Publishing Service: Canberra)

Sutcliffe K (2003) The conservation status of aquatic insects in south-western Australia. Doctor of Philosophy thesis, Murdoch University.

Theischinger G (2001) 'Preliminary keys for the identification of larvae of the Australian Synthemistidae, Gomphomacromiidae, Pseudocorduliidae, Macromiidae and Austrocorduliidae.' (Cooperative Research Centre for Freshwater Ecology: Albury)