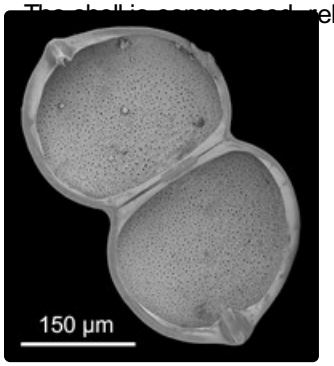
Velesunio angasi (Sowerby, 1867)

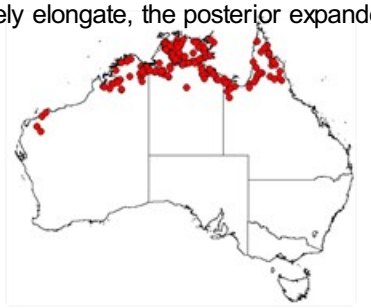
Velesunio angasi (adult size 70-90 mm)

Diagnostic features

The shell is compressed, relatively elongate, the posterior expanded, usually winged; ventral margin usually straight, rarely convex or slightly sinuate; shell length up to 90 mm; width/length ratio greater than 55%. The siphons are brick red with dark blotches (cf. *V. wilsoni*). Anterior adductor scar weakly impressed and the hinge teeth are smooth.



Glochidium of *Velesunio angasi* , Mudginberri Billabong, Kakadu National Park, NT. Photo: M. W. Klunzinger, L. Chandler & C. L. Humphrey.



Distribution of *Velesunio angasi*.

Small channel of Roper River, Northern Territory. Habitat of *V. angasi*. Photo: V. Kessner.

Classification

Velesunio ***angasi*** (Sowerby, 1867)

Common name: Angas's freshwater mussel

Class Bivalvia

Infraclass Heteroconchia

Cohort Palaeoheterodonta

Order Unionida

Superfamily Unionoidea

Family Hyriidae

Subfamily Velesunioninae

Genus Velesunio Iredale, 1934

Original name: *Unio angasi* Sowerby,1867. *In* Sowerby, G.B. (1867). Monograph of the genus *Unio*. *Conchologia Iconica* 16: plts 55-60.

Type locality: Strangways River, Northern Territory.

Synonyms: *Unio bednalli* Tate, 1882; *Hyridella (Hyridella) bardwelli* Clench, 1934; *Aparcthyria hemesa* Iredale, 1943; *Aparcthyria inspecta* Iredale, 1943; *Quaesithyria fleckeri* Iredale, 1943.

State of taxonomy

The last major taxonomic revision of Australian freshwater mussels was by McMichael & Hiscock (1958).

Based on the available molecular results, Walker et al. (2014) pointed out that a re-assessment of Australian hyriids is needed.

Biology and ecology

Shallow burrower in silty sand/mud in streams, billabongs, and slow-flowing rivers. Suspension feeder. Reproduction occurs throughout the year. Larvae (glochidia) are brooded in the marsupia in the gills of females and, when released, become parasitic on the fins or gills of fish where they undergo metamorphosis before dropping to the sediment as free-living juvenile mussels. Able to tolerate low oxygen concentrations and long periods out of water. Recruitment is affected by levels of dissolved oxygen (Humphrey & Simpson 1985). These mussels may live for at least 11-35 years and life span is correlated with dissolved oxygen concentrations.

Distribution

This species is widely distributed, occurring from north-eastern Queensland throughout tropical northern Australia, and extending south to the Pilbara region of Western Australia.

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To contact the authors for comment or suggestions, please email: fwmollusc@gmail.com