



NEW ZEALAND BIOSECURE

Entomology Laboratory



Anopheles (Anopheles) lesteri Baisas and Hu

NZ Status: Not Present – NSP Watchlist

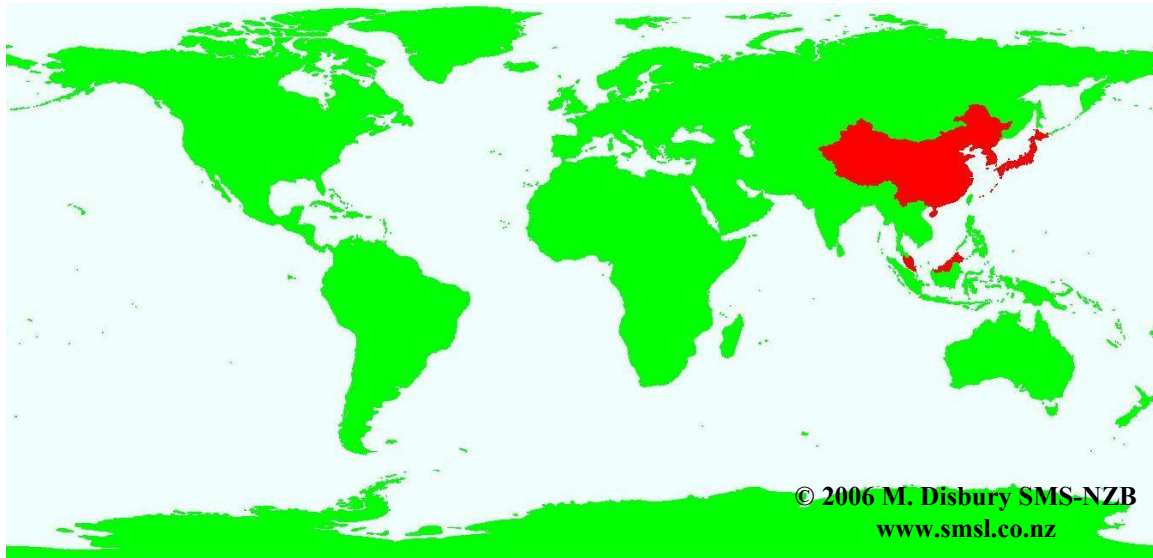


Vector and Pest Status

This species is an important vector of malaria (Tanaka *et al.*, 1979).

Geographic Distribution

Anopheles lesteri is known to have a wide geographic range from Japan through Korea, China, Malaysia (Reid, 1953; 1963), Guam and the Philippines (Tanaka *et al.*, 1979). *Anopheles lesteri* is widely distributed throughout much of Japan, including Hokkaido, Honshu, Kyushu and Ryukyu archipelago (Tanaka *et al.*, 1979). It is particularly common in Hokkaido and rare in south western parts (Oguma and Kanda, 1977).



This map denotes only the country or general areas where this species has been recorded, not actual distribution.

Incursions and Interceptions

This species has not been intercepted in New Zealand.

Taxonomy

Anopheles lesteri belongs to the Hyrcanus group of the genus *Anopheles*. The Hyrcanus group comprises many closely related species with wide distributions in the Oriental and Palaearctic regions (Yajun and Xu, 2005).

Recent molecular studies have confirmed that *Anopheles lesteri* from Japan, Korea and Philippines, and *An. anthropophagus* from China are the same species (Wilkerson *et al.*, 2003; Hwang *et al.*, 2006).

Habits and Habitat

Anopheles lesteri breed in cool shaded ground water habitats that include marshes, ground pools, ponds, rice fields, ditches, flooded areas, wheel tracks, swamps, irrigation canals, stream margins, in slight to strongly brackish habitat (Tanaka *et al.*, 1979; Sithiprasasna *et al.*, 2005).

In Malaysia in a host-preference study *An. lesteri* showed a preference for cow (Jaal and Macdonald, 1993), however in China it showed a strong preference for human blood (Ho *et al.* 1962).

References

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