

Tephromela atra

SYNONYMS

Lecanora atra, Parmelia atra

FAMILY

Tephromelataceae

AUTHORITY

Tephromela atra (Huds.) Hafellner

FLORA CATEGORY

Lichen – Native

ENDEMIC TAXON

No

ENDEMIC GENUS

No

ENDEMIC FAMILY

No

STRUCTURAL CLASS

Lichens - Crustose

CURRENT CONSERVATION STATUS

2018 | Not Threatened | Qualifiers: SO

BRIEF DESCRIPTION

Characterised by the corticolous and saxicolous habit; the whitish grey or creamish, smooth, plicate, rugose, to warted-areolate thallus; conspicuous apothecia, 0.2–3 mm diam., with prominent, white, entire to crenulate thalline margins and a black, glossy, epruinose disc; a thick, dark red-brown epithecium; a dark-brown hymenium, to 120 µm tall; ellipsoidal ascospores, 10–15 × 5–8 µm; and a chemistry of atranorin and α-collatolic and ±alectoronic acids.

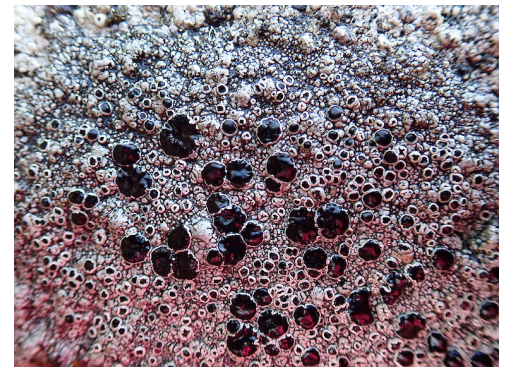
DISTRIBUTION

North Island: Northland (Three Kings Islands, Matai Bay, Karikari Peninsula, Poor Knights Islands, Great Barrier Island), Auckland (Rangitoto), Waiotapu Valley, Kaimanawa Ranges, Wellington (Kapiti Island). **South Island:** Nelson (Lake Sylvester, Takaka Hill, Dun Mountain, Lake Rotoiti), Marlborough (Chetwode Island), Canterbury (Arthur's Pass, Cass, Lewis Pass, Boyle River, Hanmer, Monument, Banks Peninsula, Rangitata Valley, Mt Peel, Mt Sebastopol, Governor's Bush), Otago (Mt Brewster, Timaru Creek Lake Hawea, Routeburn Valley, St Bathans Range, Dunstan Mountains, The Remarkables, Poolburn, Alexandra, Old Man Range, Gem Lake, Umbrella Mts, Rock & Pillar Range Akatore), Southland (Thomson's Bush Invercargill, Bluff Hill, Pahia Point, Manapouri, Borland Saddle). **Stewart Island. Chatham Islands** (Owenga). **Campbell Island.**

A rather variable species having a very wide distribution in both hemispheres. Known also from Great Britain, Europe, Macaronesia, Cape Verde Is, Scandinavia, Svalbard, Socotra, North and South America, Marion Island and Prince Edward Island, Antarctica, South Georgia, South Orkney Island, South Shetland Island, Zimbabwe, South Africa and Australia.



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HABITAT

Throughout, on coastal and inland rocks and on bark of twigs and bark of forest trees and shrubs. Especially common on canopy branches of *silver beech* (*Lophozonia menziesii*) and mountain beech (*Fuscospora cliffortioides*). Also on subalpine to high-alpine rocks, s.l. to 2000 m.

DETAILED DESCRIPTION

Thallus grey to whitish-grey or creamish, smooth or warted-areolate, plicate, rugose, areolae, 1-3 mm diam., separated by gaping cracks or ± continuous, uneven, effuse or lacking, matt or slightly shining. **Apothecia** conspicuous, scattered to frequent, sessile, constricted at base, 0.2-3 mm diam., rounded to subirregular, disc black, matt or shining, epruinose, concave to plane to ± undulate-irregular to convex, thalline margin conspicuous, persistent, white, entire or crenulate or flexuose, inflexed when young. Epithecium dark red-brown 8-13 µm thick, dense. Hymenium dark brown, to 120 µm thick. Paraphyses thick, dense, 5-7 µm thick, apices capitate, 8.5 µm thick, dark brown. **Asci** globose to clavate, 52 × 17.4 µm. **Ascospores** biserial, often difficult to find, ellipsoid, 10-15 × (5-)6-8 µm

Chemistry: Atranorin, α-collatolic and ±alectoronic acids.

SUBSTRATE

Saxicolous, corticolous

Tephromela is a genus of c. 30 species included in the family Ramalinaceae (Eriksson *et al.* 2004; Pennycook & Galloway 2004). *Tephromela* has a K+ purple epithecium, thick-walled paraphyses, simple, ellipsoidal ascospores, branched conidiophores producing bacilliform conidia laterally. Useful information on the genus is given in Kalb (2004) who describes several new taxa from Australia and Brazil. The dark purplish hymenium and the lecanorine apothecia associated with the most well-known species, *T. atra*, are typical of only part of the genus (Ekman 1996). One species is recorded from New Zealand, being known in the earlier literature in New Zealand lichens as *Parmelia atra* (Babington 1855) or *Lecanora atra* (Hooker 1867; Galloway 1985). It is a commonly collected species both from coastal and inland areas.

ATTRIBUTION

Fact sheet prepared by Melissa Hutchison (3 September 2021). Brief description, Distribution, Habitat, Features, and Extra information sections copied from Galloway (1985, 2007).

REFERENCES AND FURTHER READING

- Babington C. 1855: Lichenes. In: Hooker, J.D. *Botany of the Antarctic Voyage of H.M. Discovery ships Erebus and Terror in the years 1839-1843. II Flora Novae Zelandiae. Part II. Flowerless plants.* London, Reeve. Pp. 266-311.
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- Galloway D.J. 1985: *Flora of New Zealand: Lichens.* Wellington: PD Hasselberg, Government Printer. 662 pp.
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- Kalb K. 2004: New or otherwise interesting lichens II. *Bibliotheca Lichenologica* 88: 301-329.
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MORE INFORMATION

<https://www.nzpcn.org.nz/flora/species/tephromela-atra/>