

How You Can Help

- Don't bring used fishing gear or other freshwater recreational equipment into Tasmania. Hire, buy or borrow your gear locally, whether in Tasmania or when travelling overseas.
- If you do travel with used fishing gear (or other freshwater recreational equipment) you must declare it upon entry to Australia. Ensure that it is cleaned and completely dried prior to travelling.
- Be aware of the threat your used gear poses as a carrier of pests between waterways, particularly items that may remain damp for long periods. Check the best treatments for decontamination.
- 'Check Clean Dry' all your freshwater sporting and recreational equipment between waterways. This includes gear used for fishing, hunting, camping, hiking, boating and kayaking.
- Never release any freshwater animal or plant species, alive or dead, into Tasmanian waterways. Dispose of unwanted plant or animal material, including potentially contaminated water used in cleaning equipment, away from waterways.
- Report any suspicious algal sightings in Tasmanian waterways. Collect a specimen in a container with water, note the exact location and contact the Inland Fisheries Service immediately on (03) 6261 8050.

How to identify Didymo

Didymo may be confused with Tasmanian native species of algae but can be distinguished by:

- **Touch** - although it looks slimy, it doesn't feel slimy, but rather spongy and scratchy like cotton wool;
- **Strength** - didymo attaches very securely to river stones and does not fall apart when rubbed between your fingers;
- **Colour** - didymo is beige/brown/white but not green;
- **Odour** - live didymo has no distinctive odour;
- **Microscope** - definitive identification requires microscopic analysis.

For further information

- Quarantine Tasmania - (03) 6233 3352
- Inland Fisheries Service - (03) 6261 8050
- www.ifs.tas.gov.au

Keep Out Didymo!

Check → Clean → Dry

anything that's been in freshwater

Check: your gear before leaving the waterway and remove visible clumps of algae or other weeds. Dispose of this unwanted material later in a rubbish bin or landfill, away from waterways.

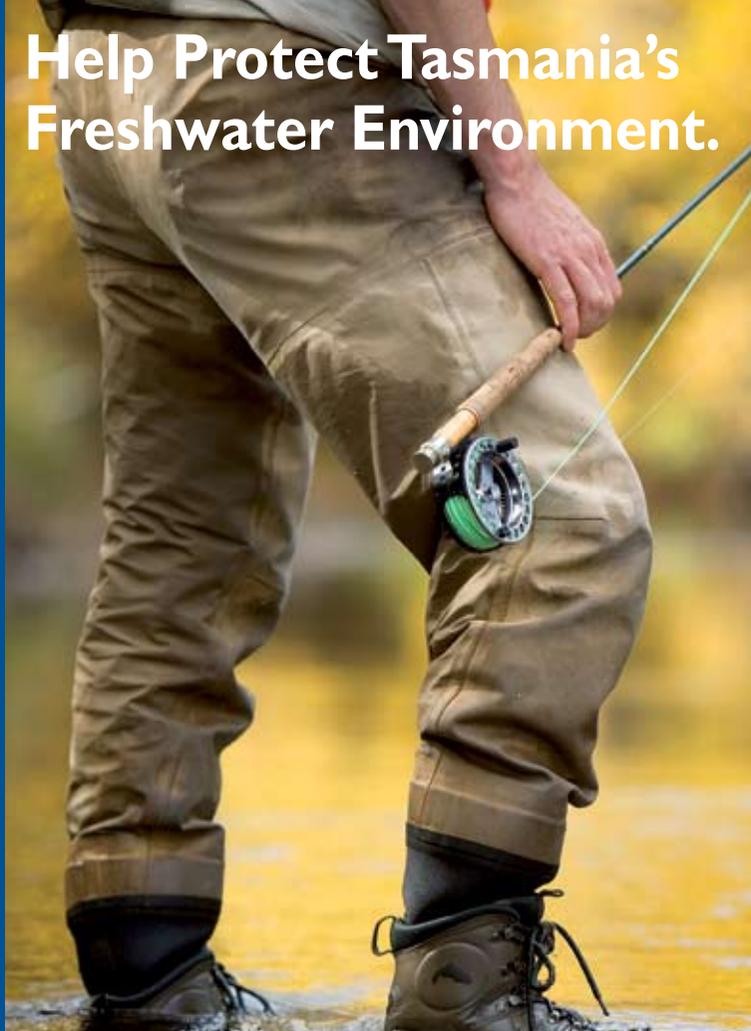
Clean: your gear by scrubbing and soaking items for a minimum of 1 minute in a 2% solution of household bleach (200 ml bleach with added water to make 10 Litres) or a 5% salt, nappy or antiseptic cleaner, or dishwashing detergent solution. As a greater precaution, use a hot water solution (maintained at 45°C or higher) and soak for 30 minutes. For items that are difficult to clean or dry (eg felt soled boots), soak for 45 minutes in water maintained at 45°C or higher, containing 5% household bleach, dishwashing liquid or nappy cleaner. Discharge cleaning waste away from waterways.

Dry: your gear completely and wait an additional 48 hours before contact or use in another waterway. Remember that some materials such as felt soled boots may need much longer, even several weeks to dry. Treatment using hot air at 45°C for at least 40 minutes is a faster alternative when available.

Photo credits:

Cover photograph © Brad Harris.
Location photographs of Didymo infestations reproduced courtesy of Biosecurity New Zealand and NZ Ministry of Agriculture and Forestry.

Help Protect Tasmania's Freshwater Environment.



Keep Out Didymo

One drop of water. One microscopic cell. One ecological disaster. That's all it takes to start an invasion.

Don't take our world class fishery for granted.

Don't bring used fishing gear into Tasmania.

Declare all your equipment to Quarantine.

Always Check, Clean & Dry your fishing equipment.



Didymo (Rock Snot) - Potential Algal Pest



Didymo - declared a 'List A Pest' under the *Plant Quarantine Act 1997*.

Didymo (*Didymosphenia geminata*), also called Rock Snot, is a freshwater alga that is widespread in the Northern Hemisphere. It is highly invasive and is considered a significant quarantine pest in Australia. Didymo is prohibited from entry into Tasmania under the *Plant Quarantine Act 1997*.

Didymo is a diatom (type of alga) invisible to the human eye until cell colonies form. It attaches to rocks and submerged plants by stalks and can multiply rapidly to form a thick brown layer completely smothering the stream or lake bed. These massive blooms grow flowing 'rats tails' that can turn white at their ends and appear similar to tissue paper.

Didymo occurs naturally in the cool, low nutrient waters of northern Europe and the northern parts of America. Since the mid 1980s, however, it has taken on characteristics of an invasive species in its original range and colonised many new locations throughout North America, Canada, Europe, parts of Asia and Great Britain. In 2004, it was discovered in New Zealand, invading waterways in the South Island.

It takes only one didymo cell in a single drop of water for the alga to spread between waterways. Once established, didymo blooms can adversely affect water quality, aquatic invertebrates and fish stocks and are a hazard for hydro-electric generation, agricultural irrigation and recreational pursuits. Currently there is no 'cure' for didymo. Preventing further spread relies on freshwater users cleaning aquatic equipment between waterways.

Didymo poses a significant threat to the Tasmanian aquatic environment due to the number of anglers visiting the State and the potential transfer from New Zealand via used fishing equipment. Wet or damp fishing gear, particularly felt-soled boots, has been identified as a primary vector for transferring didymo, but anything with the potential to hold contaminated water or algal material is of great concern.

Reducing The Risk of Invasion

The Government is working to prevent the introduction of didymo to Australia at Quarantine entry points. Anglers who are visiting Australia or returning home from a fishing trip overseas are now required to declare all **used** fishing equipment for inspection. Any potentially contaminated fishing or other freshwater recreational equipment will be confiscated by the Australian Quarantine Inspection Service (AQIS) and treated at the traveller's expense.

Didymo can spread quickly and easily between waterways



Used fishing gear – a potential carrier of pests like didymo.



All freshwater recreational equipment is a potential source of transmission of didymo.

To avoid the confiscation and treatment of fishing equipment by AQIS, anglers should ensure that all their gear is cleaned and dried prior to travelling. As a guide to cleaning, the treatments used by AQIS vary depending on the item's porosity and its ability to retain water without detection.

Items that are easy to clean and dry, such as cloth fishing bags, knee guards and gaiters, neoprene socks, and non-plastic rope and fishing nets, should be soaked for one minute in a decontaminant solution such as household bleach. Where AQIS can determine that these items are completely dry and have not been in contact with any waterway for a period of 48 hours, they may be released without treatment.

In the case of items that are more difficult to clean and dry, such as felt soled wading boots, hiking boots, soft foam or cork rod handles, the best treatment is to soak them in a hot water solution containing 2-5% disinfectant solution for 30-45 minutes and dry them thoroughly. Where it is not possible for AQIS to determine that these items are completely dry, treatment is mandatory. This may involve gamma irradiation, hot air (at 45°C) treatment for 40 minutes, or cold storage at -18°C for 24 hours. AQIS advises that some of these treatments may have adverse effects on some goods.