



## Plant Disease Update Water Repellent Soils - Dry Patch

Dry Patch occurs when soil becomes hydrophobic, meaning it actively repels water instead of absorbing it. Even though irrigation or rainfall is applied, moisture fails to move into the root zone, leaving turf under drought stress despite “adequate” watering.

Dry Patch commonly appears during warm to hot weather and is often mistaken for under-watering. In reality, hydrophobicity can persist all year round, but becomes evident when the weather warms up and the plant’s water requirement increases.

### What Causes Dry Patch?

Dry Patch can develop for several reasons, often overlapping in the same area

### Common Contributing Factors

- *Hydrophobic soils* - an accumulation of organic residues that coat the sand grains in the soil column.
- *Heat stress* can bake the soil during hot dry conditions and accelerate the drying of the soil.
- *Soil compaction* - high traffic areas restrict air and water movement
- *Organic matter buildup* - a physical barrier to water penetration.
- *Fairy Ring fungi* - can often promote water repellency in the soil root zone.

### How to Identify Dry Patch

Dry Patch has several clear indicators that help separate it from disease or nutrient issues.

### Visual Symptoms

- Irregular and dry soil under the turf. Always check soil moisture.
- Areas that fail to respond to normal irrigation.
- Small, localised patches or larger irregular zones.

### Physical Indicators

- Water beads on the surface or runs off when irrigated.
- Soil beneath the surface feels dry and dusty.
- Turf may lift easily in severe cases where roots have died.
- High-traffic areas feel hard or compacted underfoot



*Localised dry spots and impaction zones on a soccer field.*

### What Dry Patch Does to Turf

If not addressed, Dry Patch can lead to ongoing turf decline:

- Roots are unable to access moisture, even when water is applied.
- Turf becomes stressed, weak and slow to recover.
- Increased susceptibility to pests, weeds and disease.
- Patchy appearance and reduced surface quality.
- In severe cases, turf loss requiring repair or re-turfing.

### Managing and Treating Dry Patch

Successful management focuses on restoring water movement into the soil and relieving stress on the turf.



# Plant Disease Update

## Water Repellent Soils - Dry Patch

### Recommended Management Practices

- *Aerate affected areas* using a garden fork or hollow-tine aerator to relieve compaction and create channels for water. A specialist product such as Floratine's OMG!!! can also be used.
- *Apply a soil wetting agent* to break surface tension and allow moisture to penetrate the root zone.
- *Water deeply after treatment*, allowing moisture to move down through the profile.
- *Irrigate early in the morning* and avoid frequent shallow watering.
- *Encourage recovery* with balanced nutrition once moisture movement is restored root decay, limiting water and nutrient uptake. Incorporate Mineral Magic into the soil column in order to assist with water retention.

### Preventing Dry Patch

Ongoing and pre-emptive management reduces the likelihood of Dry Patch returning.

### Prevention Tips

- Mow at a slightly higher height to shade the soil and reduce evaporation.
- Manage thatch levels to prevent moisture barriers forming.
- Reduce traffic and compaction in vulnerable areas.
- Use wetting agents as part of a preventative soil-management program.
- Incorporate Mineral Magic into the soil profile during surface renovation.

### Product Recommendations Available from Turfcare Australia

1. OMG!! - Specialist thatch reducing enzymes
2. TPW AquaPro - Wetting Agents
3. TPW RapidPro - Wetting Agents
4. Pervade - Wetting Agents
5. Pervade Pellets - Wetting Agents
6. MaxiPlex - Wetting Agents
7. Propel - Wetting Agents
8. Retain Pro - Wetting Agents
9. Ninja Tines - Open punch hole aeration
10. Mineral Magic - Natural Conditioner



*Rooted in Science*



For more information, please contact

- ✉ [sales@turfcareaus.com.au](mailto:sales@turfcareaus.com.au)
- ☎ 02 4571 6444
- 🌐 [www.turfcareaus.com.au](http://www.turfcareaus.com.au)

This publication is a guide only and no substitute for professional or expert advice. The product label should be consulted before use of any of the products referred to in this publication. Turfcare Australia shall not be liable for any results, loss, or damage whatsoever, whether consequential or otherwise through the use or application of products and/or materials referred to herein. Always read the label before use.