NATURAL TURF ALLIANCE

“Eco-Friendly” Synthetic Turf: What Do the Claims Really Mean?

“Eco-friendly”, “PFAS-free” and “recyclable” are claims to test, not reasons to approve a synthetic field. A change to one material does not demonstrate that the complete system is environmentally sound. Councils should demand independent evidence, clear limitations and a comparison with best-practice natural turf.

Why This Matters

Environmental language can make a plastic sporting surface sound like a green investment. Yet a claim about one component can leave the rest of the field’s impacts unanswered: plastic wear, heat, stormwater pollution, manufacturing, replacement and disposal.

A genuine improvement should be acknowledged. But “better than an older synthetic product” is a different proposition from “better for the environment than natural turf”. The supplier must establish the comparison being claimed, rather than inviting the community to assume it.

This distinction matters when public green space is being replaced. Brochures, green branding and selected test results should never substitute for a complete assessment of the proposed field and its location.

The burden of substantiating a claim belongs with the organisation making it. Residents should not have to disprove a marketing promise.

1. The Evidence

The ACCC’s Making environmental claims: A guide for business warns against vague, sweeping environmental statements. It calls for evidence, prominent qualifications and disclosure of important limitations. Even a technically true statement can create a misleading overall impression. [1]

NSW’s May 2025 synthetic turf guideline identifies microplastic migration from infill and fibre wear, and calls for pollution controls. It also requires consideration of heat, stormwater and end-of-life costs. These issues cannot be dismissed by highlighting a single product feature. [2]

NTA’s position is straightforward: do not give an unverified environmental claim weight in a public investment decision.

2. Understanding the Issue: Test the Claim

“PFAS-free”: prove exactly what was tested

Ask whether the claim means no intentionally added PFAS or no PFAS detected by specified tests. Those statements are not equivalent. A non-detect result applies to the substances, samples, methods and detection limits in the report; it does not establish universal absence.

Demand the complete laboratory report, relevant accreditation, sample identification and testing scope. Does it cover fibres, backing, infill, shockpad and other relevant components, or only a selected material? Ask an independent specialist whether the methods support the claim.

Even a properly substantiated PFAS-free claim does not establish freedom from microplastics, heat impacts or other environmental harm.

“Recyclable”: identify the actual destination

A material’s theoretical ability to be recycled is not proof that a worn, contaminated field will be accepted and processed. The ACCC guidance stresses the need to explain recycling facilities, conditions and special schemes. [1]

Require a named receiving facility, written acceptance criteria, capacity, transport costs and a funded arrangement. Ask how much becomes usable recovered material, how much becomes residual waste and what happens if the proposed route is unavailable at replacement time.

A recycling logo or future intention is not an end-of-life plan. Do not credit promised recycling without a credible, costed route.

“Eco-friendly”: reject the vague assurance

Require the supplier to define the benefit, comparison and evidence. Does it concern one component, manufacturing or the entire lifecycle? A narrow improvement should be described narrowly. It must not be used to imply that replacing living grass with the complete synthetic system causes no environmental harm.

3. Impacts and Implications

“Organic infill”: the plastic carpet remains

Cork or another plant-based infill may change some impacts associated with rubber crumb. It does not remove the synthetic fibres or establish that the whole field is biodegradable. Fibre wear remains an issue identified by NSW guidance. Organic infill also needs assessment for migration during storms and floods. [2, 3]

Challenge the leap from “natural infill” to “natural field”. Ask for evidence for the whole system, not just the loose material between its fibres.

“Infill-free”: no loose infill is not no plastic

Removing infill eliminates that particular material pathway. It does not remove the manufactured carpet. Require field evidence on fibre shedding, wear, drainage, heat and end-of-life management for the actual proposed product.

Do not accept “infill-free” as a substitute for evidence supporting “microplastic-free” or “pollution-free”.

“Cooler”: cooler than what, and under which conditions?

Ask whether the comparator is another synthetic product or natural grass. Require independent results under comparable sunlight, air temperature, moisture and use conditions. Identify whether reported cooling depends on irrigation, recent rain or shading, and how long it lasts.

A cooler synthetic product is not automatically a cool playing surface. A reduction from a hotter comparator does not establish safe summer conditions.

“Certified”: inspect the scope of the certificate

Check the issuing body, standard, expiry, product identity and properties assessed. A certificate about sporting performance does not establish environmental safety. A test of one component should not be presented as approval of the complete field or its proposed location.

Every claim must stand on its own evidence. One certificate cannot answer every environmental question.

4. Best Practice Approach

Create a public claims register before procurement or approval. Record each environmental claim, its exact wording, the product and components covered, the supporting evidence, material exclusions and independent review findings.

Assess the complete field over its life: manufacture, installation, normal wear, maintenance, storms, replacement and disposal. Compare it with an independently designed best-practice natural turf option meeting the same sporting need. Include the benefits lost when living green space is removed.

Make verified commitments measurable and enforceable in contracts. Specify testing, monitoring, reporting, recycling responsibilities and remedies where promised outcomes are not delivered. A warranty should be examined for exclusions, rather than treated as environmental proof.

5. Recommendations

1. Demand proof before giving credit. Give unsupported claims no weight in the environmental case for a proposal.

2. Reject sweeping labels. Replace “eco-friendly” with a precise description of the demonstrated benefit and its limits.

3. Publish the evidence. Make full reports and independent reviews available, rather than selected brochure extracts.

4. Test the whole system. Do not let a PFAS, infill or recycling claim obscure fibre pollution, heat, flood or disposal risks.

5. Compare with living turf. Require evidence that the proposed system is environmentally preferable to best-practice natural turf before accepting that proposition.

Key Takeaways

A narrower improvement is not overall sustainability

One verified benefit does not cancel the field’s other impacts.

Product names and green logos are not evidence

Independent, relevant testing and practical delivery arrangements matter.

“If the claim cannot withstand independent scrutiny, it should not shape the decision.”

References

1. Australian Competition and Consumer Commission. Making environmental claims: A guide for business. December 2023. Principles 1-5 and 7; printed pp. 22-24 on broad terms, recyclability and "free" claims.

https://www.accc.gov.au/system/files/greenwashing-guidelines.pdf

2. NSW Department of Planning, Housing and Infrastructure. Synthetic turf sports fields in public open space - Guideline for decision-makers. May 2025. Environmental considerations; economic considerations and end-of-life.

https://www.planning.nsw.gov.au/sites/default/files/2025-05/synthetic-turf-sports-fields-in-public-open-space-guideline-for-decision-makers.pdf

3. NSW Chief Scientist & Engineer. Independent Review into the Design, Use and Impacts of Synthetic Turf in Public Open Spaces. Released June 2023. Flooding discussion and commissioned UNSW Water Research Laboratory report, WRL TR 2022/12, section 2.3.

https://www.chiefscientist.nsw.gov.au/independent-reports/archive/synthetic-turf-in-public-spaces

4. NSW Department of Climate Change, Energy, the Environment and Water. Best-practice guidelines for sporting fields. January 2025. Reference for assessing the natural turf alternative.

https://www.water.dcceew.nsw.gov.au/sites/default/files/2025-07/best-practice-guidelines-for-sporting-fields%20%281%29_0.pdf

Visit the NTA Document Library:

https://naturalturfalliance.org/document-library/

Prepared October 2026. The claim-testing questions and procurement recommendations are NTA's approach. The fact sheet challenges the sufficiency and scope of claims; it does not allege that any named supplier has breached the law or that every product has identical impacts. Material improvements should receive credit only to the extent supported by evidence.

NATURAL TURF ALLIANCE

E: enquiry@naturalturfalliance.org
A: PO Box 481, Lindfield, NSW 2070

This Fact Sheet has been developed with the support of Lawn Solutions Australia, the nation's largest network of turf specialists.
www.lawnsolutionsaustralia.com.au

Natural Turf Alliance Inc (NTA) is a Registered Association consisting of community groups committed to preserving and developing natural grass open spaces including sporting fields.
Our core focus is engaging with local councils and sporting groups in relation to best practice natural turf construction and maintenance.