

Airlastic layer 601

Material Data Sheet

Product Description & Properties



Shockpad for artificial turf systems, applied insitu, with a proprietary carrier mat to enhance shock absorption and designed to facilitate installation, combined with expanded cork to create a high-performance system.

It is weatherproof, long-lasting and decay-resistant.

Application

The introduction of an insitu shockpad between the stone or macadam base and the artificial turf provides comfort to players, optimising sporting functionality for the players and the sustainability of the system.

Specially designed cork components can be used under the turf to create a 100% natural elastic layer. Cork helps the turf to be more elastic and oxygenated. It is the best natural inert material and does not absorb moisture, it simply conserves it on the surface.

Physical and mechanical properties

Cork components	Expanded Cork
Cork granule size (mm)	2–4
Cork granule bulk density (kg/m ³) ¹	60–70
Moisture content (%) ²	<12
Average total thickness (mm)	20–25
Average thickness of profiled PE foam (mm)	10/4

(¹) ISO 2031

(²) ISO 2190

Benefits

Sport function

- Excellent shock absorption, avoiding player injuries from falls
- Reduces players' physical fatigue
- Gentle on joints, muscles, tendons and ligaments
- Designed for high performance
- Excellent results in terms of ball bounce and energy restitution

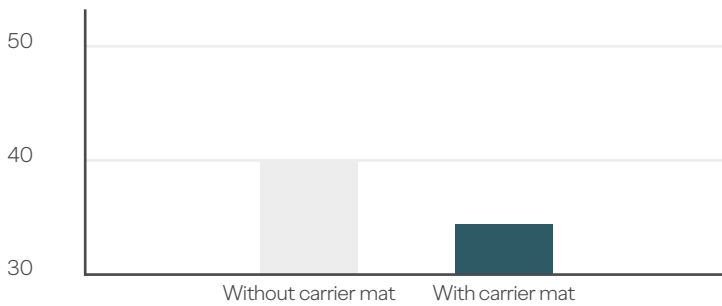
Construction

- No freezing
- Conserves temperature during winter
- Decay resistant
- High elasticity and compression resistant
- Fast and easy installation
- At the end of the turf system's working life, the existing Amorim Sports insitu shockpad can be reused in a new system*

Sustainability

- Made from cork, a 100% natural component that acts as a CO₂ retainer
- Renewable and recyclable
- Carbon negative contribution to artificial turf system

Energy Restitution (%)



Strength

Tensile strength (MPa) ¹	> 0.15
⁽¹⁾ ASTM F152	

Performance

Force reduction (%) ¹	65.87
Energy restitution (%) ¹	34.63
Vertical deformation (mm) ¹	9.9
Critical fall height (m) (Head Injury Criterion - 1000) ²	1.4 ³

⁽¹⁾ AAA - Advanced Artificial Athlete

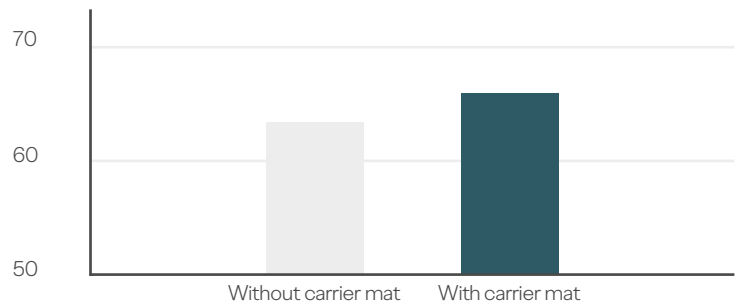
⁽²⁾ EN 1177

⁽³⁾ Including a 60 mm synthetic turf with 20 mm of cork infill

Drainage and isolation

Water permeability (mm/hr) ¹	1500
⁽¹⁾ EN 12616	

Force Reduction (%)



Due to the product being installed insitu, Amorim Sports is not responsible for the results of the material's force reduction, energy restitution, vertical deformation and CFH.

* Due to the product being installed insitu and the different options that can be considered regarding artificial turf and infills, Amorim Sports cannot control the installation conditions and therefore is not ultimately responsible for the final product lifetime.

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