

KTL SPORT MULTI CLIP SYSTEM



KTL SPORT MULTI CLIP is an area-elastic sports floor, based on 22mm solid hardwood 2-strip parquet boards connected with clips, including clips at board ends, and installed floating over foam and possible load distribution sheets, on levelled concrete or wooden based subfloor. Total construction height including the floor board is 32mm to 40mm, depending on the elastic underlay chosen.

The sports performance of this floor features medium shock absorbency and resilience, high ball bounce combined with ultimate stability under foot, designed for multi-purpose use in fitness rooms and smaller Multipurpose halls. Tested and conforms fully to EN 14904, Class A3.

The KTL open cellular bonded foam features high durability, also after full compression, securing long-term performance of the floor, of both low and heavy dynamic impacts.

COMPOSITION OF FLOOR SYSTEM

1. Floor boards:

22 x 130 x 2180mm solid 2-strip parquet boards connected with clips, and installed floating over foam and possible load distribution layer, on levelled concrete or wooden based subfloor.

Wood species:

Ash, Beech, Hevea, Maple, Merbau and Oak.

Grades: Premium/Select

Surface: Matt lacquer (standard factory lacquer) and semi-gloss

2. Clips:

S-clips – 130.1mm (for moderate expansion) M-clips – 130.4mm (for larger expansion/floor span)

4 clips per board.

Board ends are connected by means of the unique end clips. 1 clip per board.

3. Intermediate layer:

A 3mm masonite + cardboard, 500g/m², is installed as intermediate layer over bonded foam

4. Foam:

To meet EN 14904 - A3, KTL 15mm bonded foam is installed.

Alternatively 10, 8 or 5mm bonded foam or open cellular cross linked foam can be used when lower resilience is required, e.g. when installed over elastic sub floors.

5. Moisture barrier:

Min. 0.20 mm PE-folio + tape (on concrete)

6. Subfloor:

Concrete, alternatively existing wooden subfloor, levelled to a minimum deviation of max. ± 2mm on a 2m straight edge.



Material consumption at 100 m²:

■ Floor boards:	100 m ² + 2% waste
■ Clips: 170 S-clips (alt. M-clips) + 50 X-clips per box	9 boxes
■ Intermediate layer: 3mm Masonite + cardboard	100 m ² + waste.
■ PVAC glue:	0.1 litre
■ Foam:	100 m ² + waste
■ Moisture barrier:	110 m ² incl. overlap + tape
■ Line marking:	Line marking can be applied directly onto the factory finish, using a special 2-pack water-based paint system, and is ready for use after hardening.
■ Maintenance lacquer:	When maintenance lacquering is later required, the floor is buffed, before the maintenance coat of lacquer is applied onto the surface. Verify adhesion of the maintenance lacquer before starting the job.

Performance:

Sports functional features of KTL SPORT MULTI CLIP SYSTEM

Test method	EN Standards	EN demands acc to Class A3	Test results on 15mm foam
Shock absorption [%]	EN 14904:2006	40 – 55	48
Standard deviation [mm]	EN 14904:2006	1.8 - 2.5	2.3
Ball rebound [%]	EN 12335:2004	≥ 90	97
Rolling load [N]	EN 1569	Min. 1500	> 1500
Friction	EN 13036-4	80 – 110	80 - 90
Other Tests			
Friction	DIN 18032	0.4 – 0.6	0.41
Loading Capacity	EN 1533	4.0 kN	4.0 kN

*) Tested by Technological Institute, DK.

SPECIFICATION OF KTL SPORT MULTI CLIP SYSTEM

- Floor boards:** 22 x 130 x 2180mm solid 2-strip parquet boards of **[Ash/Beech/Hevea/Maple/Merbau/Oak]** in the grade **[Premium/Select]**, composed from two rows of glued finger joined staves, assembled by a longitudinal glued centre joint. The boards are profiled with tongue and groove on all 4 sides.
- Connection and sub-construction:** Boards are laid with clips including clips at board ends, over **[5/8/10/15mm] [bonded foam/open cellular foam]** [on bonded foam only: **with an intermediate layer of Masonite and cardboard felt**], installed floating over levelled **[concrete/wooden floor/ existing sports floor]**.
Total construction height incl. flooring board is **[27mm/30mm/35mm/40mm]**.
- References:**
- KTL SPORT brochure.
 - KTL product datasheets for parquet floor boards.
 - KTL checklist re. choice of sport floor (wood specie, loading capacities, building heights) and KTL requirements re. site conditions and workmanship.
 - KTL Laying instruction Multi Clip system.
 - KTL Cleaning and maintenance for sports floors.
 - www.ktlfloor.com or contact Technical Service at KTL for consultancy.