



EXPANDED POLYSTYRENE HARD FOAM

Environmental Safety

Elements Hard Foam is not effected by bacteria, moulds or fungi, and will not provide nutrient value for insects or vermin. It is non-toxic, non-irritant and odourless. It does not contain CFC's or HCFC's.

Elements Hard Foam has a Global Warming Potential (GWP) of zero and an Ozone Depletion Potential (ODP) of zero.

Thermal Insulation

Elements Hard Foam is a lightweight closed-cell material with excellent stable thermal properties based on entrapped air. It has a thermal conductivity of 0.031w/mk.

Moisture Resistance

Elements Hard Foam is non-hygroscopic and is therefore moisture resistant whilst retaining it's thermal properties.

Materials Compatibility

Elements Hard Foam is compatible with cement, concrete, brick; masonry, mortars, plaster and bitumen based damp-proof membranes. It must not be used in contact with membranes based on coal tar pitches or other building materials containing solvents.

Ease of Installation and Handling

Elements Hard Foam products are light weight and easy to handle, store and install. No specialised equipment or specialist trades are required.

Durability

Elements Hard Foam is rot proof and durable, and will remain effective as an insolent for the life of the construction (when installed as recommended).

Combustibility

Elements Hard Foam is manufactured with flame retardant additive as a naked board Elements Hard Foam will achieve Euroclass E. When used in conjunction with the Elements cement screedis will achieve a Euroclass B rating.

Physical Properties

The physical properties of Elements Hard Foam are listed below. Test methods are required by EN 13163.

Property	Rating
Density	
Compressive Strength @ 10% Def (k/pa)	250
Compressive Strength @ 1% Def (k/pa)	100
Bending Strength (k/pa)	350
Thermal Conductivity (w/mk)	.031
Dimensional Stability @ 23°C/50% RH	DS (N) 2
Dimensional Stability @ 23°C/90% RH	DS (23,90) 1
Water Absorption Capillary	0
Water Absorption by Immersion	0.1%