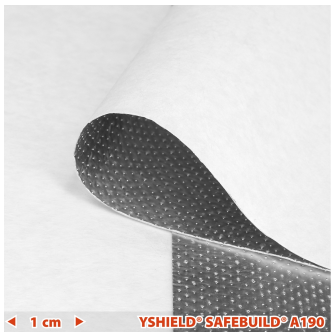
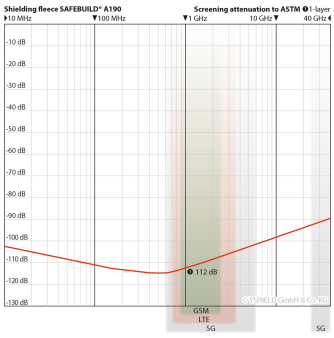
YSHIELD® SAFEBUILD® A190 | Shielding fleece | Width 90 cm | 1 meter

Shielding laminated fleece for a wide range of applications. Highly permeable to water vapor. 112 dB. For indoor use. Width 90 cm.





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Properties

Our SAFEBUILD® A190 shielding fleece is a surface-stable **cellulose fleece that is laminated on one side with a micro-needled aluminum foil**. The micro-needling with 200,000 tiny holes per square meter makes the material **highly permeable to water vapor**. This electromagnetic shielding fleece has the **highest shielding attenuation value of 112 dB** we have ever had in a series product. The micro-holes are so small that they have no effect on the shielding attenuation. **Produced in-house in Germany**.

Application

Due to its **good surface stability, moisture resistance and tear resistance**, SAFEBUILD® A190 **can be used universally indoors in all conceivable applications**. Only suitable for loose laying if the aluminum layer is protected against mechanical damage.

Technical data

- **Width: 90 cm**
- **Length: by the meter / 50 m roll**
- **Shielding attenuation: 112 dB** / surface conductivity: 0.0018 Ohm (square resistance)
- **sd value: 0.012 m** = very high water vapor permeability
- Basis weight: 190 g/m² / Thickness: 0.28 mm
- Color: White / silver
- Tear resistance: 4400 (transverse) - 6800 (longitudinal) N/m
- Corrosion resistance: Corresponds to that of aluminum
- Materials: Cellulose pulp (FSC, EUTR), aluminum, polyester fibers (OEKO-TEX® certified), adhesive powder (OEKO-TEX® certified)

FSC EU TR OEKO-TEX® CONFIDENCE IN TEXTILES STANDARD 100

TÜV-SÜD certification in progress

This shielding fleece is currently being tested by TÜV-SÜD. It is being tested for heavy metals, SVOCs and emissions in accordance with test specification TM-22 (issue 08-2020). Due to the absence of pollutants and emissions of all preliminary products, this test is passed with certainty. The test report can be found above in the downloads if confirmed.

Processing

Substrate: The substrate must be free of dirt, water-soluble layers and dry. Highly absorbent substrates must be pre-treated with our GK5 primer. **Bonding the aluminum side towards the room**: Technically the best solution, even if the result is not as attractive. However, all sheets can be easily connected afterwards with the GSX earthing tape. Also the best solution with alternating primer to be able to remove the fleece again without leaving any metal residue. **Gluing the white side towards the room**: Visually the more attractive solution, but no grounding tape can be glued on afterwards. If you want to do it this way, first stick the GSX grounding tape to the substrate. After gluing, the aluminum side should be contacted, we strongly recommend testing with different adhesives. **Adhesive**: Adhesive for heavy wallpaper on the fleece side. Cellulose adhesive cannot be used on the aluminum side due to adhesion problems. We strongly recommend tests on a test surface. **Butt-jointed or overlapping**: The sheets should be glued overlapping to achieve the best shielding result. The overlap can be smoothed and sanded with a fine spatula. Alternatively, glue them together as usual, but this will result in minimal losses when shielding higher frequencies. **Contact materials**: Due to the aluminum layer, a neutral pH value of pH 6-8 must be ensured for all materials when bonding and reworking. “Preservative-free” paints contain potassium silicate with a high pH value of up to 12 for preservation; such paints must not be used.

Grounding

This product with an electrically conductive surface **has to be integrated into the functional-equipotential bonding (FEB)**. Please find suitable grounding accessories under "Grounding".

Shielding attenuation HF & LF

This product **shields high frequency electromagnetic fields (HF)**. Unless otherwise stated, the indicated dB-values apply to 1 GHz. Measurement from 600 MHz to 40 GHz according to standards ASTM D4935-10 or IEEE Std 299-2006. This product with an electrically conductive surface **shields low-frequency alternating electric fields (LF)**.

Laboratory & expert report of shielding attenuation up to 40 GHz

We have already invested in our **own professional EMV laboratory** years ago. We not only use it to create our laboratory screening reports but also to check each batch daily. Additionally, we have all our products checked by an **independent, well-respected expert**. Double checked for twice the safety. **Please find the reports above at the downloads**.