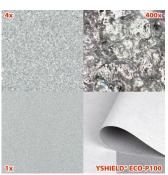
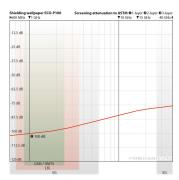
# YSHIELD® ECO-P100 | Shielding wallpaper | Width 53 cm | 1 meter

Shielding wallpaper with high shielding for versatile applications. Eco-friendly metallized. 100 dB. Interior. Width 53 cm.







#### **Properties**

ECO-P100 is a **one-side metallized wallpaper** for the shielding of high frequency radiation (HF) and low-frequency electric fields (NF). **Our professional shielding product with high attenuation for walls, ceilings, and floors.** Commercial product suitable for data centres, laboratories, TEMPEST-rooms,...and now for private usage, too.

## Sustainable wallpaper base

The base material for our shielding wallpaper is a white premium wallpaper backing paper with a very high dimension stability while and after



processing. The backing paper is certified to **The Forest Stewardship Council FSC**. Main component is cellulosic pulp according to the **European Union Timber Regulation**. The small amount of polyester fibers is certified to **OEKO-TEX 100**.

## **Ecological coating process**

All previous shielding products have been metallized "chemically", a lot of chemicals are needed for those metal coatings. Our new coating process allows to apply the metal on the backing paper with only green electricity. Without chemicals or auxiliary materials, the ecological approach is extremely high. The metal coating is not fully applied but spattered onto the material, which makes products from the ECO-series highly vapour diffusible.

## **Application**

**Only suitable for interior application** as an **intermediate wallpaper** on walls and ceilings. Applicable for laying it loosely only if the wallpaper is protected against mechanical damage.

#### **Processing**

Underground: The underground needs to be clean, dry and free of water removable layers. Absorbent surfaces must be prepared with our primer GK5. Application method with metallized side showing into the room: The technically best solution, although the result is not as visually appealing. But afterwards, all sheets can easily be connected with grounding tape GSX and can then be grounded. Furthermore, the best solution with a wallpaper primer - you can then remove the wallpaper without having metallized residues on the wall. Application method with the white wallpaper side **showing into the room:** Visually the nicer solution, but the grounding tape can no longer be applied afterwards. If you prefer doing so, you need to apply the grounding tape GSX on the underground. After gluing, the metal-side should be contacted, we highly recommend tests with different glues. Glue: For heavy wallpapers. Successfully tested from Henkel Methylan: Spezial (Special), Vlies (Fleece), Raufaser (Ingrain wallpaper). Edge on edge or overlapping: To achieve the best shielding result, you should ideally glue the individual strips with an overlapping. The overlapping can be smoothed out extensively with a fine putty, then sanded. Alternatively, you could also glue edge on edge - as it's usually done with wallpapers - you'll have to accept minimal shielding losses for higher frequencies. Attention: Due to the thick metal layer, the wallpaper has sharp edges after cutting. Work with caution and wear protective gloves!

# **Technical data**

- Width: 53 cm
- Length: By the meter / 100 m roll
- Attenuation: 100 dB / Surface conductivity: 0.002 ohm (square resistance)
- Weight: 360 g/m<sup>2</sup> / Material thickness: 0.28 mm
- Color: White / Silver
- Tensile strength: 4400 (crosswise) 6800 (lenghtwise) N/m
- Materials: Zink, cellulosic pulp, polyester fibers

## <u>Grounding</u>

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**.