MUSICAL FIDELITY




# X-Power

Reimagining the iconic Musical Fidelity X-profile
Line Power Conditioner

**X-Power In Brief**

**Power Conditioner**
- Surge and overvoltage protection
- EMI/RFI filter
- DC blocker

**In & Outputs**
- Inputs: IEC C14 10A socket
- Output: Schuko socket

- also available with US, UK or AUS socket

**Features**

- 10A max. rated power output
- Absolutely stunning and uniquely high RFI attenuation of up to 80dB
- Surge protection & DC blocker
- Revival of iconic Musical Fidelity X-profile
- Main chassis consists of a one-piece aluminium extrusion for best shielding against electro-magnetical interference
- Beautiful brushed aluminium face-plate


Technical data and price changes reserved.

**Line Power Conditioner**

The quality of mains electricity is declining, and this is affecting the performance of audio systems. The use of switch mode power supplies, energy saving bulbs, and Ethernet is contributing to this problem. Therefore, it is important to use proper filtration and DC blocking when using sensitive audiophile systems. Surge and overvoltage protection is also necessary to protect your system.

The X-Power is a single inlet, single outlet power conditioner in the classic Musical Fidelity X-profile. It contains three main blocks:

1) **Surge & overvoltage protector**
2) **EMI/RFI filter**
3) **DC blocker**

It is an absolute rarity to find a power conditioner with all of those three elements in today's market, especially at this price point. The revival of Musical Fidelity's X-line with the introduction of the X-Power aims to change that.

The main chassis consists of a one-piece aluminium extrusion for best shielding against electro-magnetical interference. The front is glaced by a beautifully brushed aluminium face-plate and on the backpanel you can find a high-quality in- and outlet socket.

**Surge & Overvoltage Protection**

Surge protectors safeguard your electronic devices from damage caused by voltage surges, providing peace of mind and potentially saving you from costly repairs or replacements.

The X-Power's multi-stage design employs two surge and overvoltage protection stages, one at the outset and one in the very last stage. Voltage surges may result from a number of factors, including lightning strikes, fluctuations in the power grid, or sudden changes in electrical loads. The X-Power diverts excess voltage away from connected devices, preventing it from reaching and damaging your valuable audio equipment.



**EMI/RFI Filter**

The incorporation of EMI (electromagnetic interference) and RFI (radio frequency interference) filters into audio systems serves to suppress unwanted electromagnetic and high frequency interference, therefore resulting in cleaner and more accurate audio signals. This can help to enhance audio quality, minimise noise, and prevent distortion.

The X-Power uses a bespoke EMI filter consisting of two common-mode chokes with common-mode and differential mode capacitors followed by another step of overvoltage protection.

With permanent work on our filter we have achieved astonishing results. Already at 100kHz we are very close to -60dB and from 600kHz on, we are below -70dB. At 1MHz we achieve more than -80dB. Such numbers are absolutely unique.




**DC Blocker**

In sensitive audio systems it is important to eliminate any unwanted DC offset (unwanted DC voltage or current superimposed on an AC signal) from the AC signal. DC offset can cause distortion, saturation, or other undesirable effects in audio systems, which can in turn lead to problems in audio signal transmission.

The X-Power employs a meticulously designed network of diodes and electrolytic capacitors to effectively block DC components while allowing AC components to pass through. Even a small amount of DC voltage can saturate the core of a power transformer, leading to audible mechanical vibrations and a reduction in transformer efficiency.

It should be noted that DC blockers are not a standard feature of all amplifiers or preamplifiers to ensure that the output signal is free from DC offset. This makes the X-Power an essential addition to any audio system!



# The X-Power in Action

## Sources

The X-Power can be used to supply clean power to sources like CD players, phono preamps, regular preamps, DACs, streamers and many more.




## Multiple Sources

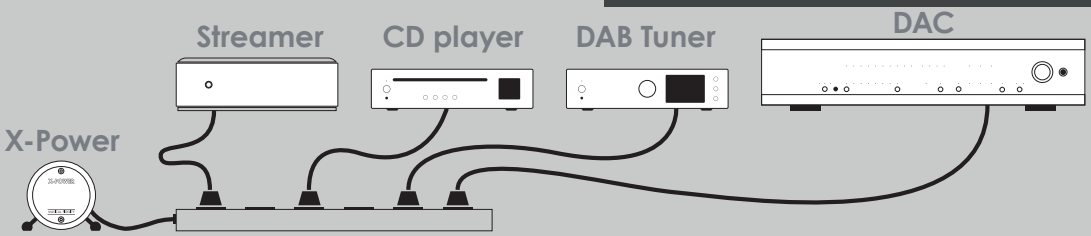
Due to its 10A power rating, when used with a high quality (unfiltered) power strip, the X-Power can supply clean power to multiple source.

**Multiple digital sources:** we highly recommend to not mix analogue and digital devices. Below setup consists of a streamer, tuner, CD player and DAC.

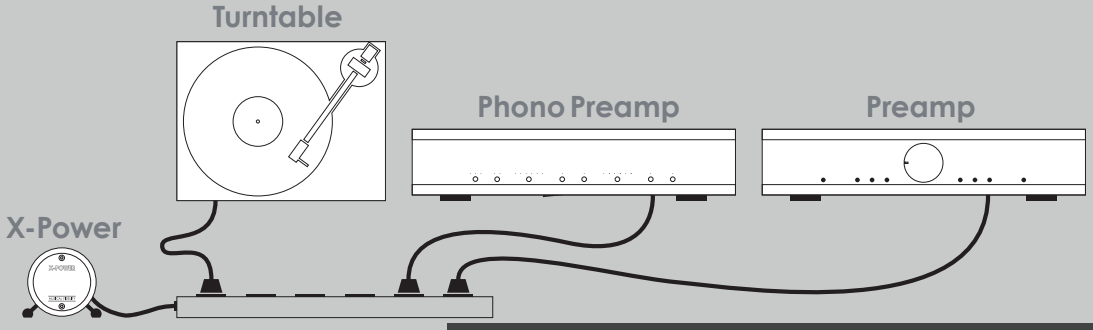
**How many multiple sources can I connect?**

Rated at **10A** when used with **230V** the maximum power throughput is **2300W** (**1100W** when used in **110V** regions). As a general rule of thumb, one source consumes between **20 - 40W**. You can comfortably connect **6 and even more sources** at the same time.

**Note:** we recommend to not mix digital with analogue source devices.




**Multiple analogue sources:** analogue devices like turntables and phono preamps or preamps (devices that operate with and amplify low voltage signals) should always be kept separate from digital devices. Below exampl setup consists of turntable, phono preamp and regular preamp.




## Amplifiers

The X-Power can be used with integrated and power amps alike. We recommend to connect only one amplifier per X-Power.




**Is the X-Power "powerful" enough for my amp?**

**General formula for 230V (adjust accordingly for 110V):**
**(channels x amp power @ 8 Ohm) x efficiency headroom < 2300W**

**Class AB:** Calculating a headroom of 50% for the lesser efficiency of Class AB and to account for **proper peak power delivery**, we can safely say that the X-Power handles stereo amps around 700W and even more.
**(2 x 700W) x 1,5 headroom < 2300W**
The power consumption of Class AB is proportional to the listening level, so in typical listening scenarios, Class AB amps draw much less power than in the above calculation.
**Class A:** Class A draws the same amount of power at full or minimum volume level. Calculating a headroom of 100%, the X-Power handles Class A stereo amps up to **2 x 550W**.
**Tube Amps:** standard tube amps have an efficiency of 20%. The X-Power is able to handle tube amps up to **2 x 200W.**




**X-Power**

# SPECIFICATION

**In & Outputs**
- Input: IEC C14 10A socket
- Output: Schuko socket
  - also available with US, UK or AUS socket

**Power Specifications**
- Input voltages: AC 100 - 240V 50/60Hz
- Power output: max. rated 10A
- RFI attenuation: > 60dB @ 100kHz, > 80dB @ up 1MHz
- DC blocker up to 2V

**General Information**
- Dimensions (WxHxD): 108 x 105 x 274 mm
- Weight: 2,29 kg net / 2,58 kg in shipping box


Technical data and price changes reserved.