

Title (en)

PROTECTION DEVICE AGAINST ELECTROMAGNETIC INTERFERENCE

Title (de)

SCHUTZVORRICHTUNG GEGEN ELEKTROMAGNETISCHE STÖRUNGEN

Title (fr)

DISPOSITIF DE PROTECTION CONTRE LES INTERFÉRENCES ÉLECTROMAGNÉTIQUES

Publication

**EP 2489246 A2 20120822 (DE)**

Application

**EP 10766268 A 20101011**

Priority

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- EP 2010065173 W 20101011

Abstract (en)

[origin: WO2011045264A2] The invention relates to a protection device for reducing grid-bound interference, comprising a protection circuit as an input filter of an electronic circuit, wherein the electronic circuit is applied to a multilayer circuit board or is at least partially integrated therein, wherein individual components of the circuit are implemented as embedded structures in the multilayer circuit board. According to the invention, the protection circuit is formed by a cascade of at least two capacitances coupled to each other by means of low-inductance circuit board structures, wherein the capacitances are implemented as embedded capacitor structures on or within the multilayer circuit board. By means of said protection device, improved filter behavior can be achieved relative to discretely populated protection filters, in particular at higher frequencies, leading to improved protection against electrostatic interference. The filter structure can further be adjusted very well in simulation to the required interference resistance of the circuit to be protected, and also achieve improved aging behavior.

IPC 8 full level

**H05K 1/16** (2006.01)

CPC (source: EP US)

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Citation (search report)

See references of WO 2011045264A2

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