

Title (en)  
TRANSFORMER.

Title (de)  
TRANSFORMATOR.

Title (fr)  
TRANSFORMATEUR.

Publication  
**EP 0349604 B1 19940518**

Application  
**EP 88909506 A 19881117**

Priority  
• CH 11988 A 19880114  
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Abstract (en)  
[origin: WO8906860A1] The so-called delta-phi transformer makes use of the effects of various core materials and air gap sections in the cores on the magnetization curves of core materials. It consists of at least two magnetically separated cores, designated source core SK and regulating core RK, which possess different magnetic properties. At least one coil A, the primary winding, is wound on said cores, which are thereby electrically coupled. Hence, both cores SK and RK are traversed by the same magnetic flux. As a result of their different magnetic properties, different magnetic fields are generated in the two cores SK and RK. A coil B is wound on the source core SK and a second coil is wound on the regulating core RK. Coils B and C are secondary windings and are designed to be connected in an additive or subtractive series circuit, depending on the desired variation in secondary voltage, or to be arranged in open circuit. Delta-phi transformers can also be connected to form delta-phi transformer systems which can function in primary, secondary or tertiary mode. By suitable design and connection of the individual delta-phi transformers, the magnitude of the secondary voltage can be varied as desired in function of the primary voltage.

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**H01F 31/06**; **H01F 3/10**

IPC 8 full level  
**H01F 27/28** (2006.01); **H01F 3/10** (2006.01); **H01F 30/00** (2006.01); **H01F 38/08** (2006.01)

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