

Title (en)
DEVICE FOR MANUFACTURING ALL-METAL SPRING-TYPE DIE CUSHIONS.

Title (de)
VORRICHTUNG ZUM HERSTELLEN VON GANZMETALL-FEDERKISSEN.

Title (fr)
DISPOSITIF DE FABRICATION DE PRESSES-TOLES A RESSORT TOUT-METAL.

Publication
EP 0531477 B1 19950719 (DE)

Application
EP 92906501 A 19920314

Priority
• DE 4109738 A 19910325
• EP 9200564 W 19920314

Abstract (en)
[origin: US5289853A] PCT No. PCT/EP92/00564 Sec. 371 Date Sep. 23, 1992 Sec. 102(e) Date Sep. 23, 1992 PCT Filed Mar. 14, 1992 PCT Pub. No. WO92/16321 PCT Pub. Date Oct. 1, 1992. For producing an all-metal spring cushion, a knitted piece knitted from spring wire is wound in a winding sleeve (14). In the winding sleeve (14), the end of the knitted piece is fixed to the knitted roll (76) by micro-welding. In a pressing station (22), the winding sleeve (14) is flush and aligned in front of a pressing sleeve (148) of the same inner diameter. The knitted roll is pushed into the pressing sleeve (148) by a press die (162) and compressed therein to form a spring cushion. Then, the spring cushion is ejected from the pressing sleeve.

IPC 1-7
B21F 27/16

IPC 8 full level
B21F 27/16 (2006.01)

CPC (source: EP US)
B21F 27/16 (2013.01 - EP US); **Y10T 29/147** (2015.01 - EP US)

Designated contracting state (EPC)
AT BE CH DE DK ES FR GB IT LI NL SE

DOCDB simple family (publication)
WO 9216321 A1 19921001; AT E125179 T1 19950815; CA 2083373 A1 19920926; CA 2083373 C 20030128; DE 4109738 A1 19921001; DE 4109738 C2 20010322; DE 59202936 D1 19950824; EP 0531477 A1 19930317; EP 0531477 B1 19950719; US 5289853 A 19940301

DOCDB simple family (application)
EP 9200564 W 19920314; AT 92906501 T 19920314; CA 2083373 A 19920314; DE 4109738 A 19910325; DE 59202936 T 19920314; EP 92906501 A 19920314; US 92728692 A 19920923