

Title (en)
Connection system for realising of branchings to continuous conductors

Title (de)
Anschluss-System zur Realisierung von Abzweigungen an durchgehenden Leitern

Title (fr)
Système de connexion pour réalisation des branchements des conducteurs continus

Publication
EP 1764871 A1 20070321 (DE)

Application
EP 06120441 A 20060911

Priority
DE 202005014719 U 20050917

Abstract (en)
[origin: EP1764871B1] An electrical connector arrangement comprises base (1) having horizontal upper surface containing coplanar parallel longitudinally extending conductor seats (13); pivot (3) arranged above the conductor seats; pivot mechanism (8ab) pivotally connecting successive ones of the pivot with opposite ends of the base for pivotal movement about transverse horizontal pivot axes between engaged and disengaged positions relative to the base; and output terminal respectively connected with a piercing contact for connecting the input conductors with corresponding output conductors (30). The electrical connector arrangement comprises (a) base having horizontal upper surface containing coplanar parallel longitudinally extending conductor seats to receive the input insulated conductors, respectively; (b) pivot arranged above the conductor seats; (c) pivot mechanism pivotally connecting successive ones of the pivot with opposite ends of the base for pivotal movement about transverse horizontal pivot axes between engaged and disengaged positions relative to the base, respectively, each of the pivot including piercing contact for piercing the insulation layer and electrically engaging the conductor of the insulated conductor arranged in the associated conductor seat; and output terminal respectively connected with the piercing contact for connecting the input conductors with corresponding output conductors. The output terminal comprises junction blocks (2) extending above and parallel with the input conductor seats; fastener (24) rigidly fastening each junction block at one end with the associated pivot; and bus bar connecting the piercing contacts with the output terminals of the associated junction blocks. A friction mechanism is mounted on the base for laterally engaging and supporting the sides of the junction blocks when the pivots are in their engaged positions. The connector arrangement includes a bridge arranged on the base for supporting the bottom walls of the junction blocks when the pivots are in their engaged positions. An insulator is arranged between the output terminals successive junction blocks.

IPC 8 full level
H01R 4/24 (2006.01); **H01R 9/03** (2006.01); **H01R 9/24** (2006.01); **H01R 12/08** (2006.01)

CPC (source: EP US)
H01R 4/24 (2013.01 - EP US); **H01R 9/031** (2013.01 - EP US); **H01R 9/2408** (2013.01 - EP US); **H01R 12/592** (2013.01 - EP US); **H01R 12/675** (2013.01 - EP US); **H01R 4/2429** (2013.01 - EP US); **H01R 4/2475** (2013.01 - EP US); **H01R 4/4809** (2013.01 - EP US)

Citation (search report)
• [XA] DE 10201495 A1 20030814 - WIELAND ELECTRIC GMBH [DE]
• [A] WO 9904455 A1 19990128 - WHITAKER CORP [US], et al
• [A] US 6811430 B1 20041102 - CARRICO ALAN [US], et al
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• [A] DE 19700600 A1 19980716 - PSI PRODUCTS GMBH [DE]
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Designated contracting state (EPC)
AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IS IT LI LT LU LV MC NL PL PT RO SE SI SK TR

Designated extension state (EPC)
AL BA HR MK YU

DOCDB simple family (publication)
EP 1764871 A1 20070321; **EP 1764871 B1 20080409**; AT E392032 T1 20080415; CN 100536258 C 20090902; CN 1937330 A 20070328; DE 202005014719 U1 20070201; DE 502006000598 D1 20080521; ES 2306377 T3 20081101; US 2007066123 A1 20070322; US 7234961 B2 20070626

DOCDB simple family (application)
EP 06120441 A 20060911; AT 06120441 T 20060911; CN 200610154228 A 20060915; DE 202005014719 U 20050917; DE 502006000598 T 20060911; ES 06120441 T 20060911; US 51877106 A 20060911