

Title (en)

Latching mechanism for plug and socket type electrical connector.

Title (de)

Verriegelungsmechanismus für stecker- und sockelartigen elektrischen Verbinder.

Title (fr)

Mécanisme de verrouillage pour connecteur électrique du type fiche et douille.

Publication

EP 0363804 B1 19940608 (EN)

Application

EP 89118417 A 19891004

Priority

GB 8823738 A 19881010

Abstract (en)

[origin: EP0363804A1] This invention is directed to a latching mechanism (70,93,60) for a plug and socket type electrical connector assembly (10) comprising matable housing (12) and cover (50) members, respectively containing a plurality of male tabs or plugs (130), and a like plurality of female contacts or sockets (140) matable therewith. The housing member (12) comprises a fixed member (14) and a movable member (18) in sliding engagement therewith, where said movable member (18) is provided with at least one cam groove (30), a portion (36) of which extends in the sliding direction. The cover member (50) includes at least one cam projection (58) which engages in said cam groove (30) in the mated condition for said cover (50) and said movable member (18). The latching mechanism (70,93,60) preferably comprises a lever arm (72,94), one end (74,96) of which contains dual pivot points (78,80,100,102) where such pivot points are pivotal with respect to said fixed member (14) and said movable member (18). The opposite end (76,98) of the lever arm contains a latching slot (86,110) engageable with a projection (60) on said cover member, where said latching slot is formed by an angled arm member (88,110), such that on pivoting the lever arm to bring the members into full mating engagement, the projection (60) on said cover member contacts said angled arm member (88,110) during mating of said members prior to engagement with said latching slot, the latter representing a condition of full mating engagement.

IPC 1-7

H01R 13/629

IPC 8 full level

H01R 13/639 (2006.01); **H01R 13/629** (2006.01)

CPC (source: EP)

H01R 13/62933 (2013.01)

Citation (examination)

US 4435033 A 19840306 - GANSERT WILLI [DE], et al

Cited by

EP0883212A3; DE10007988A1; CN103225729A; CN103441379A; EP0940886A1; US6116928A; DE19917825C2; US5681175A; EP0825684A1; US5915982A; EP0940885A1; FR2702889A1; DE19939408C1; EP1079471A1; EP0817321A1; US5876254A; FR2717319A1; DE19602293B4; EP0731534A3; CN1081837C; FR2778275A1; US5279506A; EP0538782A3; EP0954063A3; US6210185B1; US6193530B1; WO2006087097A1; WO9632761A1; US6345995B1; US7568925B2

Designated contracting state (EPC)

DE ES FR GB IT NL

DOCDB simple family (publication)

EP 0363804 A1 19900418; **EP 0363804 B1 19940608**; DE 68915925 D1 19940714; DE 68915925 T2 19940922; ES 2054976 T3 19940816; GB 8823738 D0 19881116; JP 2887396 B2 19990426; JP H02123681 A 19900511

DOCDB simple family (application)

EP 89118417 A 19891004; DE 68915925 T 19891004; ES 89118417 T 19891004; GB 8823738 A 19881010; JP 24826389 A 19890926