

Title (en)
ADJUSTABLE AND COMPACT HINGE DEVICE

Title (de)
VERSTELLBARE UND KOMPAKTE SCHARNIERVORRICHTUNG

Title (fr)
DISPOSITIF DE CHARNIÈRE RÉGLABLE ET COMPACT

Publication
EP 3056644 A1 20160817 (EN)

Application
EP 16153607 A 20160201

Priority
IT UB20150164 A 20150213

Abstract (en)
An adjustable and compact hinge device comprises a first connection means (3) assigned to be fixed to a structure or frame and connected by at least one hinge pin (4) to a second connection means (5) assigned to be fixed to a door or a shutter for rotating it with respect to the first connection means (3) between open and closed extreme conditions. Said device (1) comprises a sliding friction means (7) that translates with sliding friction along a rectilinear respective seat (9) fixed to a or carried out onto a first face of the first connection means (3). Such friction means (7) is fixed to a mobile means (11) placed in correspondence of a second face, opposite to the first, of the first connection means (3). The device (1) further comprises a connecting rod means (13) whose ends are rotatably connected, by corresponding pins, respectively to the mobile means (11) and to the second connection means (5) mutually connecting them. The friction means (7) is oval or rectangular shaped with two parallel longitudinal sides and the respective seat (9) has an elongated and concave shape with parallel longitudinal sides and with complementary cross section to that of the friction means (7). The bottom of the seat (9) for the friction means (7) has a pass through slot (15) parallel to the longitudinal sides and assigned to the free sliding of a stem of a screw (19) for the connection between the friction means (7) and the mobile means (11) for the pressure adjusting of the friction means (7) against the seat (9) and then for the adjustment of the sliding friction. One between the friction means (7) and the mobile means (11) bears a female screw (20) for the stem of the screw (19) and the other (11, 7) has a hole for the free passage of the screw stem and bears a compressible elastic member for the elastic separation of the latter means (11, 7) from the screw (19) head.

IPC 8 full level
E05F 1/12 (2006.01); **E05D 11/08** (2006.01)

CPC (source: EP)
E05D 11/08 (2013.01); **E05F 1/1261** (2013.01); **E05Y 2201/26** (2013.01); **E05Y 2201/686** (2013.01)

Citation (applicant)
EP 1183988 A2 20020306 - CMI SRL [IT]

Citation (search report)
[A] EP 1183988 A2 20020306 - CMI SRL [IT]

Cited by
WO2018157969A1; IT201700022643A1; EP4212690A1; IT202200000716A1

Designated contracting state (EPC)
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)
BA ME

DOCDB simple family (publication)
EP 3056644 A1 20160817; **EP 3056644 B1 20180103**; ES 2662245 T3 20180405; IT UB20150164 A1 20160813; PL 3056644 T3 20180530; TR 201802300 T4 20180321

DOCDB simple family (application)
EP 16153607 A 20160201; ES 16153607 T 20160201; IT UB20150164 A 20150213; PL 16153607 T 20160201; TR 201802300 T 20160201