

Title (en)
ELECTRO-HYDRAULIC ACTUATOR

Title (de)
ELEKTROHYDRAULISCHER STELLANTRIEB

Title (fr)
ACTIONNEUR ÉLECTRO-HYDRAULIQUE

Publication
EP 3336363 B1 20211027 (EN)

Application
EP 17205499 A 20171205

Priority
IT 201600126329 A 20161214

Abstract (en)
[origin: EP3336363A1] Electro-hydraulic actuator (10) comprising: a hydraulic cylinder (15) equipped with: a cylinder (20), a piston (25) slidably received in the cylinder (20) and adapted to divide the internal volume of the cylinder (20) into a first chamber (30) and a second chamber (35), a stem (40) connected to the piston (25) and passing outside of the cylinder (20), and a cam (60, 60a) associated with a portion of the stem (40) contained in the first chamber (30) of the cylinder (20), a hydraulic valve (80, 80a) equipped with: a valve body (85) coupled with the cylinder (20), a first access mouth (115) formed in the valve body (85) and placed in communication with the first chamber (30) through a connection duct (120, 120a) formed in the hydraulic cylinder (15), a second access mouth (125) formed in the valve body (85) and adapted to be placed in communication with a pump (P), and a third access mouth (130) formed in the valve body (85) and adapted to be placed in communication with a tank (T), a slider (135) received in the valve body (85) and slidable from a first position, wherein the slider (135) closes the second access mouth (125) leaving the third access mouth (130) in communication with the first access mouth (115), towards a second position, wherein the slider (135) closes the third access mouth (130) leaving the second access mouth (125) in communication with the first access mouth (115), passing from an intermediate position, wherein the slider (135) closes the second access mouth (125) and the third access mouth (130), and a solenoid (180) configured to generate a thrust adapted to actuate the slider (135), characterised in that it comprises a ball (190, 190a) at least partially inserted in the connection duct (120, 120a) and a spring (195, 195a), which is arranged between the slider (135) and the ball (190, 190a) to counteract the thrust generated by the solenoid (180) and keep said ball (190, 190a) pressed on the cam (60, 60a).

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