

Title (en)
Control device with an actuator having two-degrees-of-freedom movement

Title (de)
Bedienvorrichtung mit einem Stellglied mit mindestens zwei Verstellfreiheitsgraden

Title (fr)
Dispositif de commande avec un actionneur à mouvement de deux degrés de liberté

Publication
EP 0989477 A3 20030102 (DE)

Application
EP 99118658 A 19990922

Priority
DE 19843854 A 19980924

Abstract (en)
[origin: EP0989477A2] The operating device comprises a positioning element (1) with at least two degrees of freedom, and a device (3, 5, 6, 9, 11) for an optical evaluation of the position of the positioning element. There is a unit (3, 11) for an optical variation of a ray of light (LS, LR) with respect to its intensity or spectral characteristics. This is activated with the positioning element, and the change is detected with an optical sensor (6, 9).

IPC 1-7
G05G 9/047

IPC 8 full level
G09G 5/08 (2006.01); **G05G 9/047** (2006.01)

CPC (source: EP US)
G05G 9/047 (2013.01 - EP US); **G05G 2009/04759** (2013.01 - EP US)

Citation (search report)
• [XA] DE 4302670 A1 19940804 - VALENTRON AG [CH]
• [X] FR 2595851 A1 19870918 - REXROTH SIGMA [FR]
• [A] US 4445541 A 19840501 - SCHMIEL HERBERT H [US]

Designated contracting state (EPC)
AT BE CH CY DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE

DOCDB simple family (publication)
EP 0989477 A2 20000329; EP 0989477 A3 20030102; DE 19843854 A1 20000330; US 6545662 B1 20030408

DOCDB simple family (application)
EP 99118658 A 19990922; DE 19843854 A 19980924; US 40527399 A 19990923