

19



Europäisches Patentamt  
European Patent Office  
Office européen des brevets



11 Publication number:

**0 597 272 A3**

12

**EUROPEAN PATENT APPLICATION**

21 Application number: **93116642.5**

51 Int. Cl.<sup>5</sup>: **H02H 7/085**, E05F 15/16,  
B60R 16/02

22 Date of filing: **14.10.93**

30 Priority: **13.11.92 IT TO920924**

71 Applicant: **ROLTRA MORSE S.p.A.**  
**Via Albenga, 9**  
**I-10090 Cascine Vica - Rivoli (IT)**

43 Date of publication of application:  
**18.05.94 Bulletin 94/20**

72 Inventor: **Filippi, Aldo**  
**Via San Quintino, 5**  
**I-10100 Torino (IT)**

84 Designated Contracting States:  
**DE ES FR GB IT PT SE**

88 Date of deferred publication of the search report:  
**14.09.94 Bulletin 94/37**

74 Representative: **Cerbaro, Elena et al**  
**c/o Studio Torta, Via Viotti 9**  
**I-10121 Torino (IT)**

54 **Safety cutoff power window control device.**

57 A control device (1) for detecting the presence of an obstacle on the basis of the current absorbed by the motor (11) controlling the window (11a) in the course of an opening or closing stroke. For effectively distinguishing an obstacle from other factors, such as defects on the window guide resulting in a regular, local increase in current absorption, the current measurement is integrated and compared with threshold values varying within the stroke and describing a reference line (20; 21) consisting of a number of line portions (20a-20c), each equal in value to the integral of the current in a respective portion of the stroke in the absence of an obstacle.

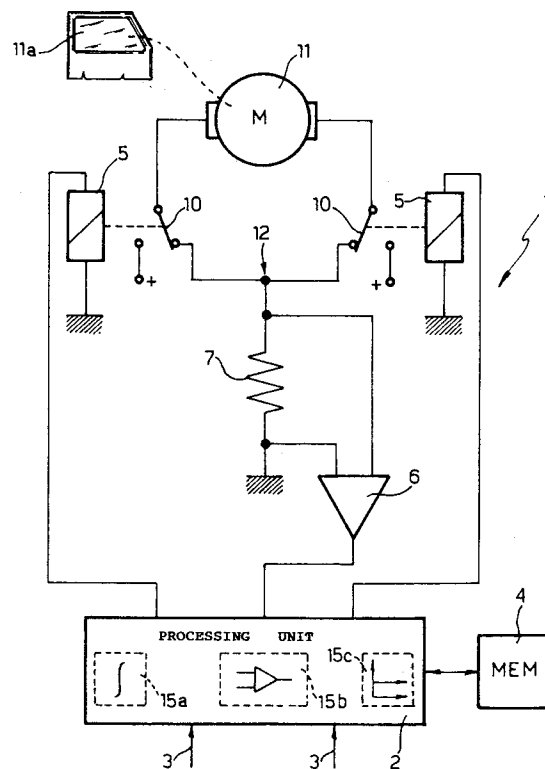


Fig. 1

EP 0 597 272 A3



DOCUMENTS CONSIDERED TO BE RELEVANT			
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (Int.Cl.5)
X	GB-A-2 169 105 (AUTOMATIC ROLLER DOORS) * page 4, line 117 - page 5, line 48 * ---	1-3,7	H02H7/085 E05F15/16 B60R16/02
A	DE-A-33 03 590 (KÜSTER) * the whole document * ---	1,2,4,5	
A	GB-A-2 010 957 (DAIMLER-BENZ) * page 1, line 49 - line 87 * -----	1,6,7	
			TECHNICAL FIELDS SEARCHED (Int.Cl.5)
			E05F H02H
The present search report has been drawn up for all claims			
Place of search BERLIN		Date of completion of the search 7 July 1994	Examiner Standing, M
<p><b>CATEGORY OF CITED DOCUMENTS</b></p> <p>X : particularly relevant if taken alone  Y : particularly relevant if combined with another document of the same category  A : technological background  O : non-written disclosure  P : intermediate document</p> <p>T : theory or principle underlying the invention  E : earlier patent document, but published on, or after the filing date  D : document cited in the application  L : document cited for other reasons  &amp; : member of the same patent family, corresponding document</p>			