

(19)



Europäisches Patentamt

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(11)

**EP 0 740 312 A3**

(12)

**EUROPEAN PATENT APPLICATION**

(88) Date of publication A3:  
**05.11.1997 Bulletin 1997/45**

(51) Int Cl.<sup>6</sup>: **H01C 7/10**

(43) Date of publication A2:  
**30.10.1996 Bulletin 1996/44**

(21) Application number: **96301883.3**

(22) Date of filing: **20.03.1996**

(84) Designated Contracting States:  
**DE FR GB IT**

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(30) Priority: **27.04.1995 JP 104161/95**

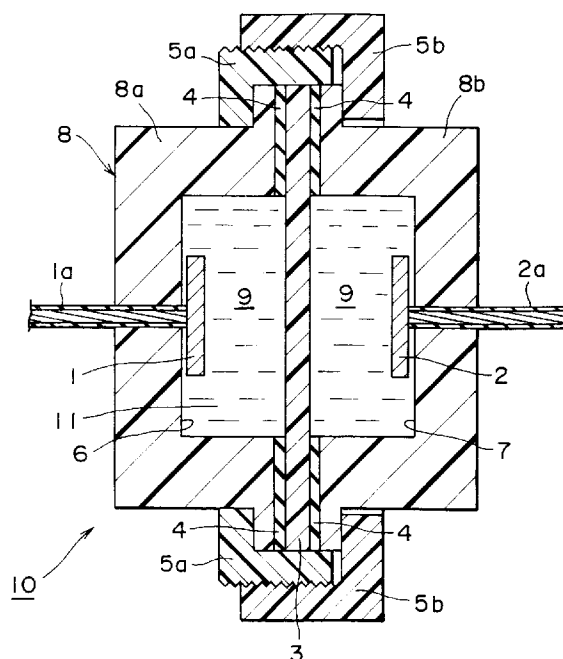
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(54) **Non-linear resistor using poly (amino acid) membrane**

(57) A nonlinear resistor is disclosed which includes a housing in which a membrane of a water-insoluble poly(amino acid) having ionic side chains is disposed to divide the space within the housing into first and second chambers. An electrolyte-containing hydrogel is con-

tained in each of the first and second chambers for electrical contact with the membrane. First and second electrodes are disposed in the first and second chambers, respectively, for electrical contact with the corresponding hydrogel and are coupled with first and second lead wires, respectively, each extending out of the housing.

**FIG. 1****EP 0 740 312 A3**



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## EUROPEAN SEARCH REPORT

Application Number  
EP 96 30 1883

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.6)
Y	EP 0 340 887 A (JAPAN AS REPRESENTED BY DIRECT) 8 November 1989 * the whole document *	1,3-5	H01C7/10
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Y	US 4 627 906 A (GOUGH DAVID A) 9 December 1986 * column 2, line 29 - column 6, line 15; claims 1,4,6,7,9 *	1,3-5	
A	WO 89 01228 A (MAXDEM INC) 9 February 1989 -----	1	
			TECHNICAL FIELDS SEARCHED (Int.Cl.6)
			H01C
The present search report has been drawn up for all claims			
Place of search		Date of completion of the search	Examiner
THE HAGUE		27 August 1997	Gorun, M
CATEGORY OF CITED DOCUMENTS 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 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 I : document cited for other reasons & : member of the same patent family, corresponding document			

EPO FORM 1503 01/92 (P04C01)