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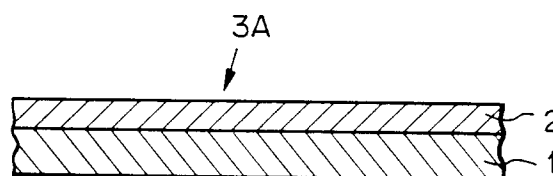
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(54) **A speaker diaphragm.**

(57) In a laminated construction of a speaker diaphragm including one or more diamond phase base layers, one or more silicon carbide or beryllium predominant layers are combined with the diamond phase base layer as a substitute for conventional alumina or silicon nitride layers. High sound transmission speed inherent to silicon carbide and beryllium much improves frequency characteristics in particular in the treble range.

Fig. 1**EP 0 398 257 A3**



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Application Number

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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	US-A-4 725 345 (SAKAMOTO) * Column 2, lines 18-28; column 6, lines 18-47 *	1,5,6	H 04 R 7/02
Y	---	8-11	
Y	PATENT ABSTRACTS OF JAPAN, vol. 009, no. 015 (E-291), 22nd January 1985; & JP-A-59 161 200 (NIPPON GAKKI SEIZO K.K.) 11-09-1984 ---	8-11	
X	PATENT ABSTRACTS OF JAPAN, vol. 011, no. 245 (E-531), 11th August 1987; & JP-A-62 059 499 (KENWOOD CORP. et al.) 16-03-1987 * Abstract *	1	
A	PATENT ABSTRACTS OF JAPAN, vol. 9, no. 301 (C-316), 28th November 1985; & JP-A-60 141 697 (PIONEER K.K.) 26-07-1985 * Abstract *	1,2-4	
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The present search report has been drawn up for all claims			
Place of search THE HAGUE		Date of completion of the search 06-11-1992	Examiner GASTALDI G.L.
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 I : 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 & : member of the same patent family, corresponding document			



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CLAIMS INCURRING FEES

The present European patent application comprised at the time of filing more than ten claims.

- ☐ All claims fees have been paid within the prescribed time limit. The present European search report has been drawn up for all claims.
- ☐ Only part of the claims fees have been paid within the prescribed time limit. The present European search report has been drawn up for the first ten claims and for those claims for which claims fees have been paid,
namely claims:
- ☐ No claims fees have been paid within the prescribed time limit. The present European search report has been drawn up for the first ten claims.

LACK OF UNITY OF INVENTION

The Search Division considers that the present European patent application does not comply with the requirement of unity of invention and relates to several inventions or groups of inventions,
namely:

see sheet -B-

- ☒ All further search fees have been paid within the fixed time limit. The present European search report has been drawn up for all claims.
- ☐ Only part of the further search fees have been paid within the fixed time limit. The present European search report has been drawn up for those parts of the European patent application which relate to the inventions in respect of which search fees have been paid,
namely claims:
- ☐ None of the further search fees has been paid within the fixed time limit. The present European search report has been drawn up for those parts of the European patent application which relate to the invention first mentioned in the claims,
namely claims:



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Application Number

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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)
A	PATENT ABSTRACTS OF JAPAN, vol. 13, no. 23 (E-705), 22nd August 1986; & JP-A-63 226 198 (KENWOOD CORP.) 20-09-1988 * Abstract * -----	1	
			TECHNICAL FIELDS SEARCHED (Int. Cl. 5)
The present search report has been drawn up for all claims			
Place of search THE HAGUE		Date of completion of the search 06-11-1992	Examiner GASTALDI G.L.
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, hut published on, or after the filing date D : document cited in the application L : document cited for other reasons & : member of the same patent family, corresponding document	



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LACK OF UNITY OF INVENTION

The Search Division considers that the present European patent application does not comply with the requirement of unity of invention and relates to several inventions or groups of inventions, namely:

1. Claims 1-7,13,14: Speaker diaphragm comprising a diamond layer and a silicon carbide laminate layer
2. Claims 8-12: Speaker diaphragm comprising a diamond layer and a predominant layer