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(71) Applicant *(for all designated States except US)*: **3DCONNEXION HOLDING SA** [CH/CH]; Z.I. Moulin du Choc D, CH-1122 Romanel-sur-Morges (CH).

(72) Inventors; and

(75) Inventors/Applicants *(for US only)*: **SENFT, Volker** [DE/DE]; In der Au 2, 82229 Seefeld (DE). **PASCUCCI, Antonio** [IT/DE]; Ulrich-Haid-Strasse 5, 82229 Seefeld (DE).

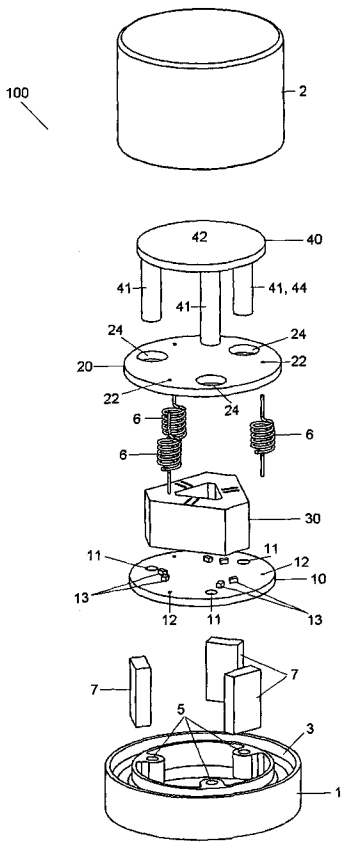
(74) Agent: **SCHMIDT, Steffen, J.**; WUESTHOFF & WUESTHOFF, Patent- und Rechtsanwälte, Schweigerstrasse 2, 81541 München (DE).

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[Continued on next page]

(54) Title: OPTOELECTRONIC DEVICE FOR DETERMINING RELATIVE MOVEMENTS OR RELATIVE POSITIONS OF TWO OBJECTS



(57) Abstract: The present invention relates to an optoelectronic device (100) for determining relative movements or relative positions of two objects, comprising a first object (10) fixed relative to a frame (1) of the device; a second object (20) mounted in spaced relation to the first object (10) and adapted for movement relative thereto; and a plurality of measuring cells for determining movement or displacement of the second object (20) relative to the first object (10). Each measuring cell comprises a light-emitting element (13) and a detector (23) for detecting light from the light-emitting element (13). The invention provides a light shield (30) for the optoelectronic device (100), the light shield comprising a plurality of channels (31) which together define a non-planar or three-dimensional array of light beam paths between the first and second objects (10, 20) of the optoelectronic device. Each channel (31) forms a path for a light beam between a light-emitting element (13) and a detector (23) of the optoelectronic device, and at least two of said channels (31) define light paths which converge with one another from the light-emitting elements (13).

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A. CLASSIFICATION OF SUBJECT MATTER
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B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)
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Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)
EPO-Internal, WPI Data

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 2003/102422 A1 (GOMBERT BERND) 5 June 2003 (2003-06-05) the whole document	1-4,6-26
A	US 6 353 217 B1 (UCHIO MASATOSHI ET AL) 5 March 2002 (2002-03-05) column 4, line 10 - column 5, line 30	1-26

☐ Further documents are listed in the continuation of Box C.

☒ See patent family annex.

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Name and mailing address of the ISA/	Authorized officer
European Patent Office, P.B. 5818 Patentlaan 2 NL – 2280 HV Rijswijk Tel. (+31–70) 340–2040, Tx. 31 651 epo nl, Fax: (+31–70) 340–3016	Davenport, Kevin

INTERNATIONAL SEARCH REPORT

Information on patent family members

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