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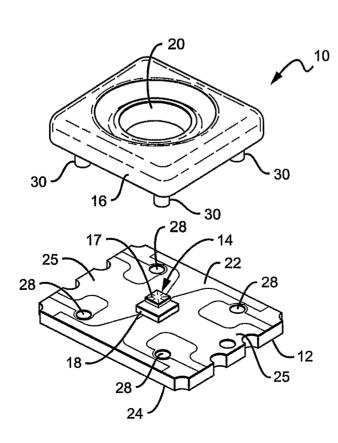
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(57) Abstract: Adhesive-free assembly of the substrate (12) and reflector components (16) of a semiconductor die package (10) is achieved by injection molding the reflector (16) onto a surface (22) of the substrate (12) or by molding the reflector (16) separate from the substrate (12) and securing it in place on the substrate (12) through deformation of a portion (36) of the reflector (16) . The reflector (16) may be made reflective either by molding the reflector (16) using a light scattering material or through the addition of a reflective element (20), such as a piece of foil material that is secured to the reflector (16). A variety of interchangeable reflective elements (20) having different surface shapes, and thus different light reflecting properties, may be made.





INTERNATIONAL SEARCH REPORT

International application No PCT/US2006/016259

A. CLASSIFICATION OF SUBJECT MATTER INV. H01L33/00

According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

 $\label{lem:minimum documentation searched (classification system followed by classification symbols) $H01L$$

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

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Further documents are listed in the continuation of Box C.	See patent family annex.
* Special categories of cited documents: 'A' document defining the general state of the art which is not considered to be of particular relevance 'E' earlier document but published on or after the international filling date 'L' document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified) 'O' document referring to an oral disclosure, use, exhibition or other means 'P' document published prior to the international filling date but later than the priority date claimed	 "T" (ater document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention "X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone "Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art. "&" document member of the same patent family
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Name and mailing address of the ISA/ European Patent Office, P.B. 5818 Patentlaan 2 NI. – 2280 HV Rijswljk Tel. (+31-70) 340-2040, Tx. 31 651 epo nl, Fax: (+31-70) 340-3016	Authorized officer Sauerer, Christof

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