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(54) Title: LENS HAVING DENSELY-DISTRIBUTED CONVEX FACETS ON ITS ENTRANCE AND EXIT SURFACES

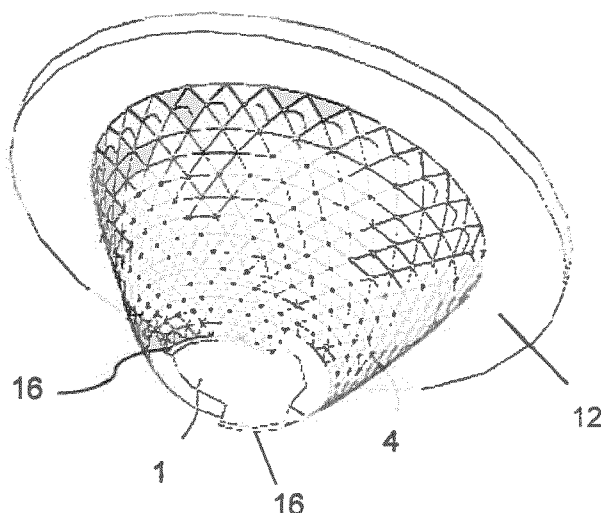


Fig.1

(57) Abstract: Optical lens (3) for a LED comprising a lens body (10) having: - a light-entering section (1), where light from the LED enters the lens (3), having a cross-sectional dimension (D2) and recessed to accommodate a LED; - a light-emitting front face (2); - a frusto-conical shape (4), extending along a central axis between the light-entering section (1) and the light-emitting front face (2), the outer surface of which incorporating a plurality of densely-distributed convex facets (24); - a height (H) along said central axis; - a cross-sectional width (D1) at the level of the light-emitting front face (2). This optical lens enhances light utilisation efficiency, avoids creating spots with chromatic aberration hence greatly improves colour rendering.

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