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(54) **REFLECTION REDUCING COATING**

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(58) **Field of Search** ..... **428/426, 432, 428/428, 412, 446, 448, 689, 697, 699, 701, 702, 212**

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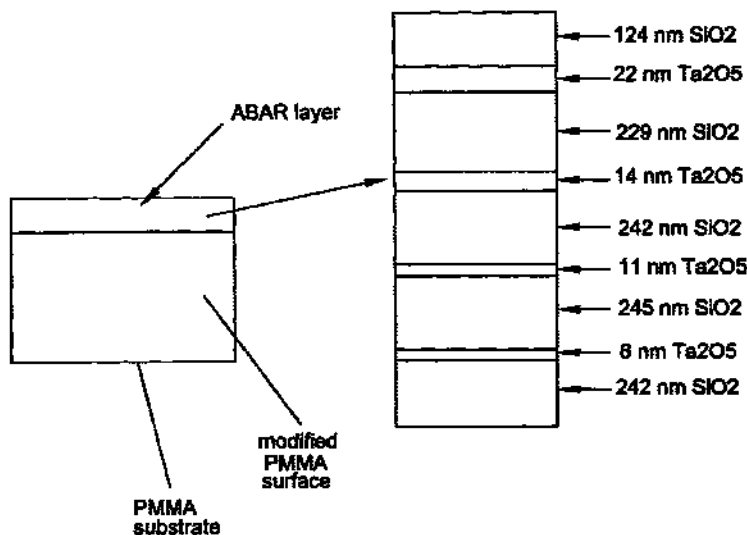
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(57) **ABSTRACT**

The invention relates to a reflection reducing coating on a substrate which is formed from an alternating change layer system each having a lower and higher refractive index. In particular, the invention can be advantageously employed on surfaces of substrates such as optical elements and spectacle glasses, in particular. According to the object most different substrates are to be coated, and during the deposition of a reflection reducing coating an unacceptable temperature rise of the respective substrate is not to occur. With this, a coating is deposited in which the sum of the layer thicknesses of layers each having a higher refractive index is  $\leq 5\%$  of the total layer thickness of the coating, and the layers of the material having a higher refractive index within the layer sequence of the change layer system are uniformly distributed.

**14 Claims, 5 Drawing Sheets**



**Diagrammatic structure of an abrasionproof anti-reflex layer system on PMMA (total layer thickness appr. 1.1  $\mu\text{m}$ )**