

Title (en)  
MICROSTRUCTURED INFRA-RED SENSOR

Title (de)  
MIKROSTRUKTURIERTER INFRAROT-SENSOR

Title (fr)  
CAPTEUR A INFRAROUGE MICROSTRUCTURE

Publication  
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Application  
**EP 05738156 A 20050511**

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Abstract (en)  
[origin: WO2006000498A1] The invention relates to an infra-red sensor comprising at least one measuring structure (11) consisting of e.g. a sensor chip (10) with a measuring structure (11) and a cap chip (20), which is fixed onto the sensor chip (10) and together with the latter (10) defines a sensor chamber (23). An aperture (25, 32), comprising an inner aperture region (25b, 32b) and an outer aperture region (25a, 32a) that surrounds the latter (25b, 32b), is configured on the upper face (24) of the cap chip (20). The inner aperture region (25b, 32b) is configured above the measuring structure (11) and is transparent to the infra-red radiation (IR 1) that is to be detected and the outer aperture region (25a, 32a) is at least partially intransparent to incident infra-red radiation (IR2). The outer aperture region can be configured in particular as a reflective coating consisting of metal or a dielectric layer, or as a reflective structure composed of trenches with oblique surfaces or an absorbent structure.

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