

## **OPTICA APPLICATA**

Optica Applicata 2004(Vol.34), No.3, pp. 439-451





A quarterly of the Institute of Physics, Wroclaw University of Technology



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## Hybrid objective with corrected chromatism in visible spectrum

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## Keywords

hybrid objective, chromatic aberration, apochromatic correction, superachromatic correction

## Abstract

The possibilities of chromatic aberration correction in a hybrid (diffractive-refractive) objective are discussed. It is possible to design a hybrid triplet objective free from chromatic aberration in the wavelength range 0.45-0.85 mm practically covering the whole visible spectrum. To that end one of the lenses should be made of special glass, but not necessarily of fluorite. For illustration purposes objectives of relative aperture 1:3 and maximum field-of-view angle  $w = 5^{\circ}$  have been designed and their aberrations presented.



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