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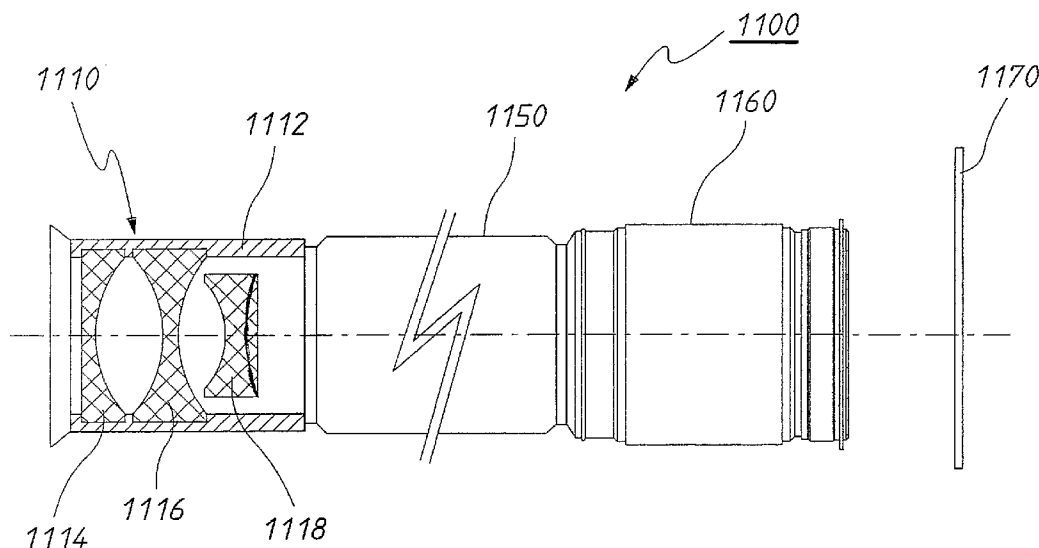
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(54) Title: OPTICAL LENS SYSTEMS



(57) Abstract: Wide-angle, deep-field, close-focusing optical systems (1100, 1200, 1300, 1400) are disclosed. According to one aspect, the optical system (1100) comprises a negative lens unit (1110) and a relay lens (1160). The negative lens unit (1110) accepts radiation from an object in space. The relay lens (1160) is coupled to the negative lens unit (1110). The negative lens unit (1110) and the relay lens (1160) are aligned on an optical axis in that order. The negative lens units (1110) forms a first image on the relay lens (1160) to form a final image at a final image plane at a distance from the relay lens (1160). The relay lens (1160) may comprise a zoom lens or zoom lens components, which may be movable.

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