

## Application Scenario RSI.014: Demonstration of Abbe's Resolution Limit

### Abstract

The resolution limit of an imaging system with an ideal lens is investigated. To this end we use an ideal grating object and consider its image for different periods. Abbe's resolution limit is illustrated. The effect of the wavelength on the resolution is also demonstrated.

**Author:** Frank Wyrowski, University of Jena  
**Keywords:** Imaging, Resolution, Diffraction Limited, Gratings  
**Requirements:** VirtualLab version 4.0.1 or higher – **Starter Toolbox**  
**Scenario Version:** 1.1  
**Sample Files:** Corresponding files can be found [here](#).

### Technical Support

If you have any questions, remarks or problems concerning this application scenario, or in using VirtualLab in general, please do not hesitate to contact us by E-Mail [support@lighttrans.com](mailto:support@lighttrans.com).

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