

FDITE194 Optics 1

Description:

The aim of the course is to prepare students for the complex exam in optics. The topics included in the optics exam syllabus are covered in a two-semester course, of which this course covers the first half.

Topics:

- Wave motion, wave equations
- Electromagnetic waves
- Reflection and refraction of waves
- Waveguides, optical fibers
- Interference of waves
- Geometrical optics
- Fourier optics

Recommended reading for the course:

[1] R. Guenter: Modern Optics, John Wiley and Sons, 1990.

[2] A. Nussbaumm, R.A. Phillips: Modern Optika, Műszaki Könyvkiadó, 1982.