

CODE V Training

Munich, Germany | 18-22 October 2010

OPTICAL RESEARCH ASSOCIATES



Register today for the upcoming CODE V® training in Munich. To register or for more information, contact us about these events.

CODE V is ORA®'s comprehensive program for optical design, analysis, and fabrication support. It is used by engineers around the world to design a wide range of optical systems for a variety of products, including photographic equipment, video cameras, medical instruments, aerospace systems, and much more. CODE V's advanced features are combined with outstanding flexibility and ease of use, and ORA's excellent technical support makes you more productive.



Introduction to CODE V for Image Forming Systems (3 days, €1200)

Goals for this Course

This course covers the basics on modelling, analyzing, optimizing, and tolerancing image forming optical systems using CODE V, including hands-on workshops. It assumes familiarity with optics concepts and terminology. This course will be taught using CODE V version 10.2, which features CODE V's new user interface. Therefore, both new and part-time users can benefit from this course. *Note that some topics will be abbreviated in this three-day version of the introductory class.*

By the end of the course, you will be able to do the following:

- Model an optical system given its design parameters
- Evaluate the system to determine its quality
- Optimize the system to improve its quality
- Evaluate the manufacturability of the final design

Course Content (Monday through Wednesday)

- Background for running CODE V
- Performance evaluation
- Optimization of lens performance
- Reflective optical systems
- Non-spherical surfaces
- Afocal systems
- Zoom and multi-configuration systems
- Tolerancing an optical system
- Command mode and macros

Advanced Topics in CODE V (2 days, €800)

Goals for this Course

This short course for current CODE V users will give you a more detailed understanding of the usage and operation of the program's more familiar features, and exposure to some of more specialized features as well. You will learn how to address your design and analysis tasks more effectively and discover new applications for CODE V in your work.

Format for the Course

Seminar attendees will be CODE V users with varying interests and experience levels. Thus, a flexible, informal, and wide-ranging format will be used, which will include presentations on all topics, computer demonstrations, hands-on exercises, informal discussions, and workshops.

Course Outline (Thursday and Friday)

Note: *For the two-day version of this class, topics will be selected from among the following list.* Please let us know if you have a particular interest in any of the following topics.

- Diffraction analysis (including image simulation)
- Environmental analysis of optical systems
- Diffractive and binary optics
- Advanced optimization techniques
- Interferograms and the Alignment option
- Non-sequential surfaces
- Macro-PLUS™ programming
- Tolerancing tools and techniques
- Beam Propagation

CODE V Course Instructor

Craig Pansing (Optical Research Associates) is an optical engineer with several years of experience at ORA. He provides technical support for CODE V and *LightTools*.

IMPORTANT:

- Attendees are responsible for their own arrangements for accommodation.
- Tuition includes all teaching materials.
- Tuition must be paid in full prior to attendance. Minimum enrollments apply.

Contact Us



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