



Breault
Research

Taking Light
Further

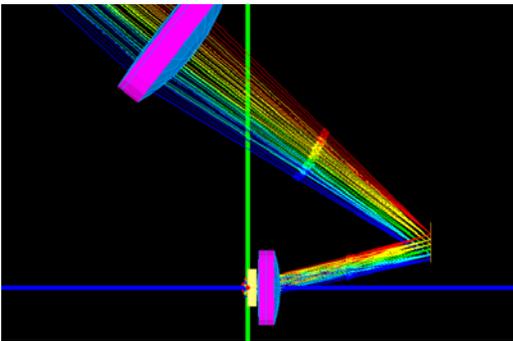
ASAP®

Design and analyze imaging and illumination systems with CAD interoperability

ASAP® is known throughout the optics industry for its accuracy and efficiency. Rays can encounter surfaces in any order and any number of times, with automatic ray splitting. Optimized for speed, ASAP will trace millions of rays in minutes. Use ASAP to model complex imaging systems, illumination systems, and light-concentrating devices. Create highly accurate source models using source images, point sources, ray grids, and fans. Model incandescent bulbs, LEDs, CCFLs, and HID arc lamps, or import from the BRO Light Source Library. Perform the analyses necessary to validate your designs without experimental prototyping.

Customers in need of CAD software solutions may also purchase a license of SolidWorks®, an intuitive 3D-design environment optimized for use with ASAP. Multiple configurations of SolidWorks Parts, Assemblies, and Drawings are available. Write ASAP geometry files from within SolidWorks, import XML files, or use BRO's proprietary smartIGES™ system to import system models from any CAD package.

ASAP includes a distributed-processing capability allowing you to complete big design jobs in a fraction of the time required by other tools — spawn up to 5 additional ASAP sessions on your Local Area Network (LAN), without leaving your desk.



Key ASAP Features

- **NEW** Run ASAP on 64-bit Windows Vista/7 Business and Ultimate Editions
- **NEW** Model both TIR and scatter at rough surface interfaces
- **NEW** Define nonlinear system object arrays using the ARRAY command
- **NEW** Create ABg (linear-shift invariant) and K-Correlation scatter models
- **ENHANCED** Use sources by Bridgelux, Cree, Lumileds, Nichia, and OSRAM
- Build system models requiring large numbers of objects and sources
- Model optical and mechanical system components
- Model imaging systems, illumination systems, and light-concentrating devices
- Model visible, ultraviolet, and infrared radiation in optical systems
- Model surface (BRDF) and volume scatter (pre-defined or custom)
- Model radiometry of complex systems, including radiance
- Visualize, analyze, and monitor light distributions using conformal radiometry
- Render system geometry, raytraces, and light sources
- Perform numerical and graphical CIE/Chromaticity analyses
- Optimize optical systems with the ASAP Optimization interface
- Save, review, and resume optimizations in progress with ASAP .osf files
- Tolerance optical systems in the ASAP Builder interface or scripts
- Import measured source data such as Radiant Sources™
- Import/Export Photometric Data in EULUMDAT and IES LM-63-02
- Import data from images using the BRO Digitizer™
- Use the SolidWorks Parts Only 3D Modeling Engine (license optional)
- Write ASAP-specific GTX files from within SolidWorks
- Assign object and layer names in SolidWorks
- Import/Export IGES files using the ASAP smartIGES translator
- Import geometry and optical properties using the XML file format
- Integrate scripts in Python, VBscript, Jscript, and other languages
- Drag-and-drop sources, lenses, glasses, scatter models, and coatings
- Begin your simulation with one of 600+ example files
- Perform distributed processing tasks using the enhanced REMOTE
- Create your own custom workspace within ASAP

