

Release Notes
RSoft OptSim, OptSim Circuit and ModeSYS
Version 2016.12

Optical Solutions Group

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SYNOPSYS®

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OptSim, OptSim Circuit and ModeSYS version 2016.12, Synopsys' RSoft System Tools, include the changes described in the following sections.

OptSim

The 2016.12 release of OptSim adds:

- New MATLAB-based Gaussian Noise (GN) model for nonlinear noise modeling in uncompensated optical transmission systems. The model provides significant speed gains compared to the split-step method for optical fiber simulation.
- An application note (pre-supplied project design files and corresponding description) on the use of the GN-model link emulator for a multi-channel PM-QPSK system.
- Support for encrypted data files in block mode's Standard S-Parameter Block.
- Native 64-bit support that enables faster MATLAB co-simulation with OptSim as well as overall speed and memory management gains.
- Windows 10 support.

OptSim Circuit

The 2016.12 release of OptSim Circuit adds:

- Support for the American Institute for Manufacturing Integrated Photonics (AIM Photonics) Process Design Kit (PDK). The PDK helps save costs in photonic integrated circuit (PIC) design and brings PIC designers a step closer to fabrication through AIM Photonics wafer run facilities.
- Support for encrypted data files in the Multiport Optical Device Bidirectional model.
- Support for S-matrix modeling in PDAFlow blocks with both electrical and optical ports.
- Native 64-bit support that enables faster MATLAB co-simulation with OptSim Circuit as well as overall speed and memory management gains.
- Windows 10 support.

ModeSYS

The 2016.12 release of ModeSYS adds:

- Native 64-bit support that enables faster MATLAB co-simulation with ModeSYS as well as overall speed and memory management gains.
- Windows 10 support.