

PathWave ADS and RFPro Fundamentals class

Detailed Course Agenda

Course Overview

- About the ADS workspace structure, libraries, schematics and Data Display
- How to setup linear, nonlinear and system design analysis and optimization
- How to optimally create layouts in ADS
- How to simulate ADS layouts in RFPro using Momentum and FEM EM-technologies

Course Type

User/Application Training

Audience

Technical staff who work in an RF or microwave design environment and want a comprehensive introduction to the application of ADS.

Prerequisites

Familiarity with basic RF and microwave concepts. Windows and PC experience.

Course Length

3 days

Course Format

The course combines lecture presentations with instructor guided, hands-on sessions.

□ Day 1

Introduction to ADS

Overview of workspaces, libraries, cells and technologies. Schematic capture, system and circuit components, sub-circuits and symbols. Basics of Sources, Terminations, and Variables. Simulation basics: DC, S-Parameter and Harmonic Balance. Plotting data for DC, S-Parameter and Harmonic Balance. Using Examples, Smith chart and Matching utilities, and Design Guides

Day 2

Optimal Usage of ADS Layout for Quick Generation of Prototypes

Learn how to optimally create layouts in ADS using design synchronization and manual entry. Understand technology files and editing procedures. Proficient use of the physical design user interface is a pre-requisite for defining robust EM models, but is also essential for correctly manufacturing circuits.

□ Day 3

Introduction to RFPro Simulations (Momentum & FEM)

Learn how to simulate ADS layouts in RFPro using Momentum and FEM EM-Technologies. Understanding the RFPro GUI. Learn about Net Types and Component Roles. Simulating Multi-Technologies designs and using Virtual pins. Create schematics for ADS co-simulation.