

VisSim/Digital Power Designer

Digital Power Converter Development Software

Key Highlights

- Complete tool chain for digital power converter development
- High-level blocks for digital power control design
- Highly configurable nonlinear load events
- Debugging and performance tuning on Texas Instruments microcontrollers
- Firmware blocks include compensators, controllers, filters, monitoring and fault detection, soft start, and measurements
- Simulation blocks include switching converter models, sensors, MCU peripherals, sources, and loads
- Analog stage, digital control, and configurable loads can be combined for complete system simulations

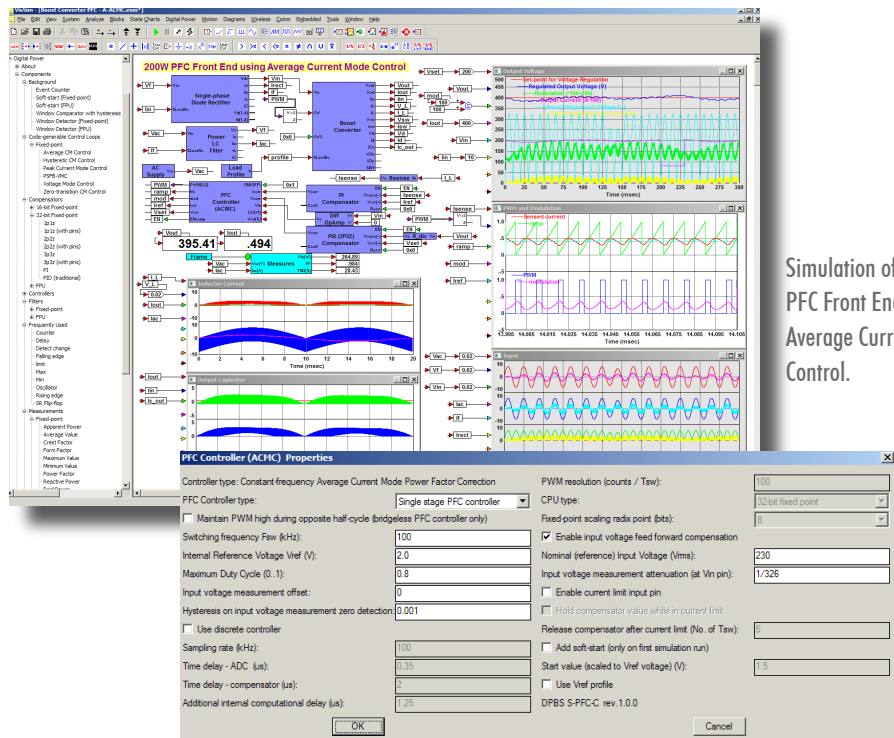
System Requirements

- Professional VisSim v9.0
- Windows XP, Vista, 7, or 8
- 128 MB RAM
- 125 MB RAM hard disk space

Introduction

VisSim/Digital Power Designer provides high-level blocks for simulation and code generation of power supply and digital power components and controls. VisSim/Digital Power Designer blocks let you develop a working controller that can be directly downloaded to the MCU for digital power applications.

The VisSim/Digital Power Designer blocks efficiently model analog power supply configurations, along with control loops, to simulate and verify the control loop without the need for hardware. This allows you to develop your control routines much more flexibly, simulate, verify and make any needed corrections before sending out Gerbers to manufacture hardware. When your hardware arrives, you can use VisSim/Digital Power Designer (with VisSim/Embedded Controls Developer) to compile and download the diagram to the MCU and test your real hardware.



Simulation of a 200W PFC Front End with Average Current Mode Control.

I've been very impressed with the ease of use of VisSim and how well it generates code for our Piccolo line. VisSim/Digital Power Designer is a great way for analog power designers to get up to speed fast with digital power solutions.

Brett Novak, C2000 Product Marketing, Texas Instruments