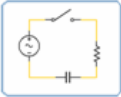


NI Multisim Fundamental Circuits

Overview

The NI Multisim Fundamental Circuits series presents many frequently used circuits and design topologies, essential in the understanding of electronics. These examples, for new or advanced users, provide a powerful starting point to building a library of circuits showcasing various components, designs, and the power of interactive SPICE simulation and analyses. Divided into seven chapters consisting of RLC, diode, transistor, amplifier, opamp, filter, and miscellaneous circuits, groups of circuits can be downloaded. Each circuit is documented to indicate the illustrated design concept.

Chapter 1: RLC Circuits



Chapter 1 provides a number of detailed and documented circuits investigating basic electronics laws and passive component designs with interactive SPICE simulation.

[View Chapter 1 circuits »](#)

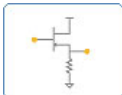
Chapter 2: Diodes



Chapter 2 provides examples of diode and Zener diode circuits. Topics covered include half and full rectifier circuits as well as voltage regulation.

[View Chapter 2 circuits »](#)

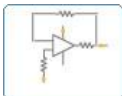
Chapter 3: Transistors



Chapter 3 focuses on transistor-based circuits. The detailed and documented examples include various PNP- and NPN-biased transistors.

[View Chapter 3 circuits »](#)

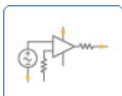
Chapter 4: Amplifiers



Chapter 4 investigates various amplifier designs with interactive SPICE simulation and analyses. The amplifier examples include both single and two stage designs.

[View Chapter 4 circuits »](#)

Chapter 5: Opamps



Chapter 5 examines a number of operational amplifier circuits with interactive SPICE simulation. Topics include inverting and non-inverting designs, as well as peak detectors.

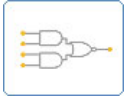
[View Chapter 5 circuits »](#)

Chapter 6: Filters



Chapter 6 explores the concept of filter design with topics including low-pass, high-pass, Butterworth, and notch filters.

[View Chapter 6 circuits »](#)



Chapter 7 studies a number of miscellaneous designs. Topics include transistor-to-transistor logic (TTL), oscillators, and filters.

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