

Semi Design

find you way in #VLSI with us

FPGA

Introduction to FPGA

What's this programmable logic stuff anyway? In Module 1 you learn about the history and architecture of programmable logic devices including Field Programmable Gate Arrays (FPGAs). You will learn how to describe the difference between an FPGA, a CPLD, an ASSP, and an ASIC, recite the historical development of programmable logic devices; and design logic circuits using LUTs. Examples will include designs of digital adders and multipliers in FPGAs.

Architectures

1. CPLD
2. FPGA

FPGA working

Code Run

Basics of FPGA

1. Design flow
2. Design tricks
3. Hardware components on FPGA board and their working
4. Xilinx ISE tool installation and working
5. Designing basic FPGA examples
6. Designing advanced FPGA examples
7. Burn these models on available FPGA kit

FPGA Design Tool Flow; An Example Design