

ADVANCED ARM CORTEX



CURRICULUM

» Module 1:-

- Introduction to ARM Processor
- ARM Architecture
- ARM series
- Cortex Processor and its variants
- Pipelining Concept
- Memory Mapping
- Bus Architecture
- Sys Tick Timer
- NVIC & Interrupt Handling
- Comparison between various ARM Architecture

» Module 2:-

- Adding Filters to Expressions
- Filtering Input
- Order By filter

» Module 3:-

- Introduction to STM Controllers
- STM32 32-bit ARM cortex MCU's
- Package Types & Portfolio
- Nomenclature of STM32
- STM32 Architectures and its Features
- Hardware Considerations
- Memory map & bus structure
- External Oscillators
- Clock control and Internal Oscillators
- PVD/POR/PDR
- Boot Modes

» Module 4: Peripherals interfacing

- EMBEDDED C PROGRAMMING
- C programming basics
- Difference between C and Embedded C
- Compiler handling
- Creating and modifying projects in Compiler Conventional programs
- Basic Embedded programs structure
- Getting your programs into a compiler, writing your programs

» 1.INTRODUCTION TO REAL WORLD INTERFACE

- Led interfacing
- Seven Segment interfacing
- Micro switch Interfacing
- Keypad interfacing
- LCD interfacing

3.TIMERS

- Timer Features &programming
- Pin Description
- Register Description

» 4.SERIAL PORT

- Basics of serial port (RS232)
- Types of connectors
- Interfacing pc with micro controller
- MAX 232 interface Hardware structure
- Serial port configuration (mode selection)

» 5.SERIAL PORT

- INTERRUPT CONTROLLER
- Basics of interrupt
- Polling method
- Difference between polling and interrupt method
- Interrupt service routine (ISR)
- Vector Interrupt Control
- FIQ
- IRQ
- NVIC

» 1.ADC:-

- Theory of ADC
- Types
- Inbuilt ADC
- Interfacing external device to ADC

» 7.SENSOR INTERFACING:-

- Introduction to Sensing Devices
- IR Sensor Interfacing
- Temperature Sensor Interfacing

» 8. C PROTOCOL IINTERFACIING

- Features
- Applications
- Pin Description
- Architecture and Register Description
- LCD interfacing

» 9.SERIAL PERIPHERAL INTERFACE (SPI)

- Features
- Applications
- Pin Description
- Architecture and Register Description

» 10.PULSE WIDTH MODULATION-

- PWM Generator
- Register Description
- Application

» 11.DMA (Direct Memory Access)

Partners :



Java



development | consultancy | training

E-mail: info@ducatindia.com
Visit us: www.ducatinidia.com
www.facebook.com/ducateducation

NOIDA

A-43 & A-52, Sector-16,
Noida - 201301, (U.P.) INDIA
Ph. : 0120-4646464
Mb. : 09871055180

GURGAON

1808/2, 2nd floor old DLF ,
Near Honda Showroom,
Sec.-14, Gurgaon (Haryana)
Ph. : 0124-4219095-96-97-98
Mb. : 09873477222-333

GREATER NOIDA

F 205 Neelkanth Plaza Alpha 1
commercial Belt Opposite to Alpha
Metro Station Greater Noida
Ph. : 0120-4345190-91-92 to 97
Mb. :09899909738, 09899913475

GHAZIABAD

1, Anand Industrial Estate,
Near ITS College, Mohan Nagar ,
Faridabad (HAR YANA)
Ghaziabad (U.P.)
Ph.: 0120-4835400...98-99
Mb. : 09810831363 / 9818106660
: 08802288258 - 59-60

FARIDABAD

SCO-32, 1st Floor , Sec.-16,
Faridabad (HAR YANA)
Ph. : 0129-4150605-09
Mb. : 0981 1612707