



**Information  
Technology  
Institute**

## **PROFESSIONAL TRAINING PROGRAM 2021/2022**

# **WEB & USER INTERFACE DEVELOPMENT**

### **Track Overview**

**People Develop Countries...  
We Develop People**

# Web & User Interface Development



## DESCRIPTION

ITI – (Web & User Interface ) Specialization - is a product based program that will graduate professional, world class, and well-educated software engineering that will be responsible for front-end developer with the deep knowledge of UI/UX and responsive web design concepts.



## WHO MAY APPLY

Applicants willing to expand their skills and knowledge and fulfilling the following criteria are eligible to apply Gender : Female & Male  
Nationality : Egyptians Military Service : Exempted or Deferred or Completed  
Educational Degree : Bachelor Degree — Graduation Year : Last 5 Years Min Grade : Good



## TRACK DURATION

1086 Hours about 9 months (learning and project ).



## DELIVERY APPROACH

20% Self-paced | 40% Online | 40% Guided Practices  
Project Based Focused Journey  
Your Mentor supports throughout all the learning journey

## BEFORE YOU APPLY

Candidates will have to complete the following prerequisite courses to join our program:

- Introduction to Programming Concepts could be found at Udacity <https://www.udacity.com/course/c-plus-plus-nanodegree--nd213> or Coursera <https://www.coursera.org/learn/intro-programming>
- Introduction to web Technologies could be found at MaharaTech: <http://bit.ly/2OGcLix> or Udacity <https://classroom.udacity.com/courses/ud001> or Khan Academy <https://www.khanacademy.org/computing/computer-programming/html-css>
- Introduction to Database could be found at MaharaTech: <https://maharatech.gov.eg/enrol/index.php?id=740> or Khan Academy <https://www.khanacademy.org/computing/computer-programming/database>

# Web & User Interface Development



## GRADUATE PROFILES

- UI/UX Developer
- JavaScript Developer
- Angular Developer
- React Developer



## REQUIRED TOOLS

- Microsoft Visual Studio
- Microsoft SQL Server
- Adobe Photoshop
- Adobe Illustrator



## TRACK PRACTICES

Candidates may work together in one of the following Suggested Projects:

- Healthcare application (competitor to Vezeeta or Doctolib application).
- An Online course and examination management system (competitor to Udemy, Coursera, Udacity).

# Web & User Interface Development



## OVERALL LEARNING JOURNEY OUTLINE

### Software Development Fundamentals

- Data Structures and Algorithms
- Database Fundamentals
- XML Fundamentals
- Introduction to Programming
- Object-Oriented Programming Concepts

### Frontend web Development

- Client-Side Technologies
- HTML5 & CSS3
- jQuery Fundamentals
- Responsive Web Fundamentals

### MEAN Stack Development

- Angular Fundamentals
- Node.js Fundamentals
- MongoDB
- Advanced JavaScript
- ES.Next

# Web & User Interface Development



## OVERALL LEARNING JOURNEY OUTLINE

### Microsoft Web Application Development

- ASP.Net Core MVC
- Service Oriented Applications with WCF and Web API
- ASP.Net SignalR
- Introduction to gRPC on .Net Core
- ASP.Net Core Blazor
- IIS Administration
- Introduction to MS - Azure

### Software Design and Development Methodologies

- Agile Software Development Methodologies
- DevOps
- Introduction to Software Engineering
- Object Oriented Analysis & Design using UML
- .Net Design Patterns
- SOLID Design Principles & Implementations
- MVVM Light Toolkit Fundamentals
- Microsoft Team Foundation Server & VS Architecture Tools
- Unit Testing
- Test Driven Development
- AWS Fundamentals
- Docker and Kubernetes Fundamentals

### Microsoft .Net Core Programming

- Visual C# .Net Language
- Integrated Query(LINQ)
- Entity Framework 6 & Core
- Advanced SQL Server Programming
- Windows presentation foundation

# Web & User Interface Development



## OVERALL LEARNING JOURNEY OUTLINE

### E-Business Marketing Concepts

- E-Business Fundamentals
- Internet Marketing

### UI/UX Design Concepts & Methodologies

- UI/UX Design principles and wireframing
- Design Thinking
- Visual Design For Web
- Adobe Photoshop Web
- Adobe Illustrator Web
- Adobe XD
- Design elements and Prototype

### Soft Skills Courses

- Business Communication
- Advanced Presentation Skills
- Interviewing Skills
- Workplace Professionalism

## OTHER USEFUL INFORMATION

(Collaborative activities, Outstanding facilities, Remarkable Opportunities, Talents' Innovation, Industry partners ...etc.)