ETB
ENGINEERS TO BE

Universal American School

www.etb-club.com

info@etb-club.com
050 9451937

Coding and Robotics Week
Join the "EDU-TAINMENT" experience

Week without walls with ETB

About Us

Engineers To Be is a team of actual engineers from different fields that offer engineering, coding and robotic programs. ETB has been running with the top premier schools in Dubai, Abu Dhabi and Sharjah offering different programs; after school activities, enrichment programs, STEM academies, developing Coding and STEM curriculums, and holiday camps.

Our Qualifications

Bachelor's & masters degree in engineering
First aid & child safety training
Public liability insurance covering all UAE
Abu Dhabi Educational Council (ADEC) approval

Week Without Walls – Coding & Robotics

As a part of the unique learning experience; WWW organized by Universal American School, we are delighted to offer our ETB Coding & Robotics week.

During this unique edu-tainment experience, our students will be experiencing a full hands-on engineering environment. The program will introduce the students to the robotics world, they will understand what are robots and how they work, they will also learn the logistics behind coding.

Each day will the students will have a variety of different activities from designing and coding simple video games, to coding different projects using Aurduino controllers.

By the end of the week the students will understand how coding works and how it can be applied in real life applications. They will also understand how games are designed and they can build their own simple video games.

Who can attend this program

This program will be offered to middle and high school. The outline is the same for both, however the complexity and level of the project will be different.)The two groups will be running separately not together)

Projects

The program will have two main courses running along side some small engineering challenges, all the projects and challenges are linked together to enhance the students experience and understand of our goals.

A) **Game design**; Each day the students will be building a new video game using different software's like Scratch. Each game will have its own learning objective, like how to use screen coordinates to move objects in 3D or how to use "IF conditions"…

B) **Hard ware coding;** Students will be using Aurduno controllers to program different projects, like cars, light signals…
Each project will help the students understand a different coding concept, and use physics theories and mathematical skills to solve real life problems. For example for the cars, the students will need to program the car to get through a maze. They will need to use newton's law, Speed= dis/time in order to calculate when the car needs to turn.

A) **Engineering challenges**; small engineering challenges that will help students improve many of their skills and enhance their understanding of different engineering aspects as well as their problem solving skills.

Learning outcome

This course will help the students improve and develop many of their skills such as; problem solving, critical thinking, team work, and communication skills. They will also learn many essential concepts such as:

1- What are robotics and how they work
2- The logistics of coding and programming and how they are developed
3- Get familiar with some coding and programming software's like scratch
4- Get familiar with different micro controllers that can be programmed like Arduino
5- Learn more about electric circuits and how they are connected in different ways.

Book your space now
&
Join the EDU-TAINMENT experience

Fees and Dates

Middle school: Feb,9th – 13th
High school: Feb, 23rd – 27th

Fees are: 1050 AED for the week (price includes VAT)

For registrations or more details please contact us on:
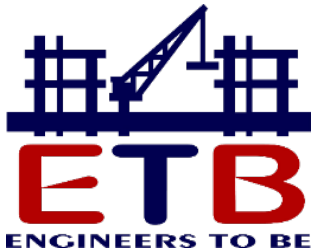info@etb-club.com
+971509451937

Understand

Design

Build

Test

Compete

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