

Spring 2018

YTA classes start Jan. 29, 2018

<p><u>AIT 1030: Basic Construction Language</u> Wednesdays 3:15-5:15pm Study of construction drawings to determine specifications, lines and line weights, measurements related to laying out, dimensioning, estimating and planning.</p>	<p>2 credits</p>
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<p><u>EET 1180: Surface Mount Soldering</u> Wednesdays 3:15-4:45pm Develop skills using surface mount soldering equipment and techniques to facilitate design, construction and rework of circuit boards. Keep the Watch! (10 seat max)</p>	<p>1 credit</p>
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<p><u>MET 1240 Machine Tools and Manufacturing Processes</u> Wednesdays & Thursdays 3:30-6:30pm Application of traditional and contemporary machine tools processes to accomplish the mechanical parts production or the maintenance and/or repairs of mechanical parts or equipment. Laboratory experiences include measuring and inspection, layout and fundamentals of machine tool setup and techniques for drilling, turning, milling and grinding. Manufacturing processes including the production of metals and alloys, polymers and plastics, forming, machining, fabrication, conditioning and finishing of metallic, plastic and composite engineering parts.</p>	<p>3 credits</p>
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<p><u>EET 2530 Unmanned Aerial Vehicles</u> Wednesdays 3:30-7:30pm This course addresses the emerging market for unmanned aerial vehicle (drones), their ethical use, safety issues, legal issues, electrical and mechanical components, on-board control systems, software and remote control. Keep the Drone! (10 seat max)</p>	<p>3 credits</p>
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<p><u>EET 2812 Single Board Comp. & App.</u> Wednesdays 3:30-7:30pm An introductory course on Single Board Computers (SBC) with an emphasis on embedded applications. Topics include standard interface devices like keyboards, High-Definition Multimedia Interface (HDMI), Universal Serial Bus (USB), microprocessor architecture, flash and read/write memory, General Purpose Input and Output (GPIO) ports, conventional serial communications. Communicating with external sensors, like Global Positioning System (GPS), Infrared transmission and detection, accelerometers, etc., are discussed from the aspect of programming. Keep the Microcomputer! (10 seat max)</p>	<p>3 credits</p>
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<p><u>MARS 1180 Intro. to Media Arts and Filmmaking</u> Wednesdays 3:30-7:30pm Provides a technical foundation for further study and practice in the art and technology of digital filmmaking. Analysis of examples of visual storytelling with regard to how lighting, color palette, picture composition, sound, performance, staging, editing and graphics work in concert to communicate theme. Hands-on instruction in producing and maintaining desired image and sound quality in production and post-production. Introduces the three phases of a media production: preproduction, production, and post-production.</p>	<p>3 credits</p>
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<p><u>EET 1100 Robotics</u> Wednesdays 3:30-5:45 Introduction to direct current circuits, binary and hexadecimal numbering systems, signed numbers and elementary programming language statements (confined to programming a robot in laboratory component). Keep the Robot! (10 seat max)</p>	<p>2 credits</p>
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To register, contact:

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