

Brighton High School *Digital Multimedia Program*

Programming Game Development 9th – 12th # 66075/66076

What is computer science and cutting edge technology? Learn how to think like a computer by understanding what technology is and how to apply it to everyday life. Learn multiple programming languages to understand concepts of computer science by creating games using simple blocks of code, syntax error language and 3D/first person. Experience how to create an App and compete with students nationwide. Create games using motion sensing input devices. Program robots to sense, draw and move through obstacles. Program a game to use circuits to turn everyday objects into touch pads. Code a raspberry Pi (not food!) to learn about hardware hacking. Females have multiple field trip opportunities including Digital Divas and GirlsEncoded.

4th year math credit & ½ 2nd year world language requirement Next Suggested Class: Web Design

Web Design 9th – 12th # 66073/66074

Students will learn how to create and maintain websites and how to integrate graphics, sound and user interaction. Students will use HTML, Javascript, CSS, and Dreamweaver web design software to create effective, functional websites. Students will use Adobe Creative Suite software to design logos and graphics with Illustrator and change and create images with Photoshop. Students will also be introduced to animation software. The use of design elements and principles will be used to properly communicate ideas and enhance layout of their work. Students will create a personal portfolio website, learn how to publish to a server and participate in a Photoshop contest.

VPAA credit & ½ 2nd year world language requirement Next Suggested Class: Social Media

Social Media 10th – 12th # 66057/66058

Become a social media strategist – one of the hottest career trends in technology and marketing. This class will use many social media tools to promote and explore the purpose of social media as a marketing tool. Students will create and implement a social media campaign for a local business to help their business grow and succeed. Not only will students have the opportunity to apply what they learn in class this also gives them the opportunity to work professionally with a business. A field trip to Comerica Park to learn from a panel of professionals and explore Social Media at the park is part of this class along with multiple guest presentations from the profession.

VPAA credit & ½ 2nd year world language requirement Next Suggested Class: Programming

NEW 16-17 AP Computer Science Principles 11th – 12th Yearlong

This course covers the fundamentals of computer science and its impact on people, society, and innovation. The purpose of this course is to design and implement ideas using technology to make a difference. Students will use creativity, algorithms, abstraction, elementary logic, generating and analyzing computational artifacts, digital security and privacy, computer networks, data encoding, creative and ethical computing, and use a visual programming language. Some projects include developing mobile phone applications, games, and tools that can help others. No prior experience of computer science or programming is necessary.

4th year math credit & 2nd year world language requirement

Digital Multimedia Program

Program Information: <http://brightondigitalmultimediaprogram.weebly.com/>

Follow on Twitter: #BHSDigitalMedia Contact: Michelle Costa costam@brightonk12.com

Like on Facebook: <https://www.facebook.com/bhsdigitalmedia>

VPAA CREDIT

4th YEAR MATH CREDIT

2nd YEAR WORLD LANGUAGE REQUIREMENT

AP CREDIT

EARN **COLLEGE CREDIT** - *complete all 3 courses and receive*

Washtenaw Community College - 7 credits

Ferris State University - 18 credits

Oakland Community college - 6 credits

DIGITAL MULTIMEDIA **CLUB** – Tuesday's in B-8

- Learn Professional **Design Software**: Dreamweaver, Photoshop, Illustrator
- Create Dynamic Websites using HTML, CSS, Javascript
- Create a Personal Portfolio
- Participate in Photoshop **Competition**
- Social Media panel of professionals at Comerica Park **Field Trip**
- Detroit Business **Field Trip**
- Digital Divas and GirlsEncoded **Field Trip**
- Work with **local businesses** to create a social media campaign
- Guest **Professional Speakers**
- Learn Multiple Programming Languages & Computer Science concepts
- Create first person games similar to a video game and games for young kids to play, motion sensing devices, and circuits to make games work like a touch pad
- Program robots to sense, draw, and move
- Explore using Raspberry pi's to learn hardware hacking
- Create Android Apps and participate in a nation-wide **competition**

DIGITAL MULTIMEDIA CLUB

- * **Gaming Competitions**
- * **Auto ShowPoster- Design competition !**
- * **App Inventor -Programming Competition!**
- * **United Way Video Competition!**
- * **Various Logo and Poster competitions!**
- * **Manipulate robots!**
- * **Build with Raspberry pi(computer)**
- * **Have loads of technology oriented fun!**
- * **Sponsor the One hour of Code Event!**

No previous experience is necessary!

Meets Tuesday in B-8 from 2:30 to 3:15

#bhdsdigitalmedia

Remind: 81010 @dmmclub



NEW COURSE 2016-2017

AP Computer Science Principles

It's not about syntax it's about creativity and making a real world impact!

VIDEO: <https://youtu.be/S1vFrz4NETg>

BROCHURE: [AP CS Principles Brochure - What is this course?](#)

Topics for the course:

Creativity
Abstraction
Data and Information
Algorithms
Programming
The Internet
Global Impact

Course Length: One Year Course

Grade Level: 11 – 12 Grade

Prereq: Algebra

4th year math requirement

2nd year world language requirement

Students design and implements innovative solutions using an iterative process similar to what artists, writers, computer scientist, and engineers use to bring ideas to life. This course covers the fundamentals of computer science and its impact on people, society, and innovation. Course topics include: algorithms, abstraction, elementary logic, generating and analyzing computational artifacts, digital security and privacy, computer networks, data encoding, creative and ethical computing, and using a visual programming language to develop mobile phone applications. The course focus is on creativity. This course focuses on using technology and programming as a means to solve computational problems and create exciting and personally relevant artifacts. While many of these topics can be quite complex, *this course will focus primarily on providing a high-level overview of each topic no prior knowledge of computer science is necessary.*

More questions: See Mrs. Costa B-8 costam@brightonk12.com

Brighton High School

Business/Marketing Department

.....

Marketing Website: <http://brightonmarketingprogram.weebly.com/>

Digital Multimedia Website: <http://brightondigitalmultimediaprogram.weebly.com/>

.....

VPAA Credit

- Marketing I
- Marketing II
- Social Media
- Web Design

4th Year Math Credit

- Accounting
- Entrepreneurship
- Marketing II
- Programming Game Development
- AP Computer Science Principles

DECA – Student Organization

- Accounting
- Entrepreneurship
- Marketing I
- Marketing II
- Sports and Entertainment Marketing

College Credit

- Accounting
- Entrepreneurship
- Marketing I
- Marketing II
- Programming Game Development
- Web Design
- AP Computer Science Principles
- Social Media

Economics Credit

- Marketing I

2nd Year World Language Credit

- Entrepreneurship
- Marketing I
- Marketing II
- Programming Game
- Social Media
- Sports and Entertainment Marketing
- Web Design
- AP Computer Science Principles

Business/Marketing Department

<http://www.brightonk12.com/BrightonHigh.cfm?subpage=183086>

Accounting

Description:

1 year 11-12 grade

Accounting I will prepare students who may be considering pursuing a career in accounting and/or for those who will be required to take an accounting course at the college level. This course will introduce students to the basic accounting principles and procedures that are applied to accounting records kept for businesses. This will include journalizing transactions, posting, petty cash, financial statements, and adjusting and closing entries. Automated accounting software may be utilized.

College Credit

**4th year Math
Credit (1 credit)**

DECA

Applied Computer Technology

Description:

1 semester 9-12 grade

This one semester computer course will introduce students to the skills and knowledge of using Windows operating system, Microsoft Office, as well as online educational applications. Students will enhance their technology skills using: Microsoft Word, Excel, and Movie Maker. Online applications are integrated into the course to help students keep current with technology trends including Google and its applications, Prezi, Weebly, and YouTube Editor. Students will end the semester with a culminating project, which will require students to apply their new knowledge and display it for others to see.

**Computer
Credit**

Business Law

Description:

1 semester 10-12 grade

This semester course is designed to introduce students to those business laws that will affect their daily lives and relationships to the business world. The class will include such topics as basic structure and sources of law, crimes and torts, court structure and contract law.

AP Computer Science Principles

Description:

1 year 11-12 grade

It's about creativity and making a real world impact.

This course covers the fundamentals of computer science and its impact on people, society, and innovation. Course topics include: algorithms, abstraction, elementary logic, generating and analyzing computational artifacts, digital security and privacy, computer networks, data encoding, creative and ethical computing, and using a visual programming language to develop mobile phone applications. While many of these topics can be quite complex, this course will focus primarily on providing a high-level overview of each topic no prior experience of computer science in necessary. Video about AP CS Principles: <https://youtu.be/S1vFrz4NETg>

**2nd year World
Language Credit**

4th year Math

College Credit

Business/Marketing Department

<http://www.brightonk12.com/BrightonHigh.cfm?subpage=183086>

Digital Multimedia Program: <http://brightondigitalmultimediaprogram.weebly.com/index.html>

Web Design

1 semester 9-12 grade

Students will learn how to create and maintain websites and how to integrate graphics, sound and user interaction. Students will use HTML, Javascript, CSS, and Dreamweaver web design software to create effective, functional websites. Students will use Adobe Creative Suite software to design logos and graphics with Illustrator and change and create images with Photoshop. Students will also be introduced to animation software. The use of design elements and principles will be used to properly communicate ideas and enhance layout of their work. Students will create a personal portfolio website, learn how to publish to a server and participate in a Photoshop contest. *Next Suggested course: Social Media*

**2nd year
World
Language
Credit**

**VPAA
Credit**

Programming-Game Development

Description:

1 semester 9-12 grade

What is computer science and cutting edge technology? Learn how to think like a computer by understanding what technology is and how to apply it to everyday life. Learn multiple programming languages to understand concepts of computer science by creating games using simple blocks of code, syntax error language and 3D/first person. Experience how to create an App and compete with students nationwide. Create games using motion sensing input devices. Program robots to sense, draw and move through obstacles. Program a game to use circuits to turn everyday objects into touch pads. Code a raspberry Pi (not food!) to learn about hardware hacking. Females have multiple field trip opportunities including Digital Divas and GirlsEncoded. *Next Suggested course: Web Design*

**2nd year
World
Language
Credit**

**4th year
Math
(1½ credit)**

Social Media

Description:

1 semester 10-12 grade

Become a social media strategist – one of the hottest career trends in technology and marketing. This class will use many social media tools to promote and explore the purpose of social media as a marketing tool. Students will create and implement a social media campaign for a local business to help their business grow and succeed. Not only will students have the opportunity to apply what they learn in class this also gives them the opportunity to work professionally with a business. A field trip to Comerica Park to learn from a panel of professionals and explore Social Media at the park is part of this class along with multiple guest presentations from the profession.

**College
Credit**

**2nd year
World
Language
Credit**

**VPAA
Credit**

Business/Marketing Department

<http://www.brightonk12.com/BrightonHigh.cfm?subpage=183086>

Marketing Program: <http://brightonmarketingprogram.weebly.com/index.html>

Advanced Marketing	
<p><u>Description:</u></p> <p><i>1 year 11-12 grade</i></p> <p>This culminating course will build on the material learned in Marketing I and will provide the advanced marketing student with the opportunity to assume a business leadership role. Students will need to be independent learners and will engage in group and individual projects dealing with real life business situations in areas of their interest. Students will complete a research project via simulations and/or by working with a local company to help carry out the goals of that business. All students will be members of DECA and will have the opportunity to display their projects with students from around the state and country.</p> <p><i>Prerequisite:</i> Marketing I (B average), DECA, and approval by marketing instructor</p> <p>*There is a DECA fee associated with this course</p>	College Credit
	4th year Math Credit (1 credit)
	VPAA Credit
	DECA
	2nd year World Language Credit
Entrepreneurship	
<p><u>Description:</u></p> <p><i>1 semester 11-12 grade</i></p> <p>Entrepreneurs are the cornerstone of the American free enterprise system. Students will develop a business plan for the twenty-first century and will learn the many options available to them and the challenges of those opportunities. This class will include topics in types of business ownership, market and opportunity analysis, business planning, price and promotional strategies, and financial analysis. This class satisfies the fourth year math credit (1/2 credit) and the computer credit.</p> <p><i>Suggested course: Marketing I</i></p>	College Credit
	4th year Math Credit (1/2 credit)
	Computer Credit
	DECA
	2nd year World Language Credit

Business/Marketing Department

<http://www.brightonk12.com/BrightonHigh.cfm?subpage=183086>

Marketing I

<p><u>Description:</u></p> <p style="text-align: center;"><i>1 year 9-12 grade</i></p> <p>This one year course is a study of how a product or service is introduced, developed, priced, advertised, and sold in the marketplace. Course topics include: business communication; economics; market analysis; product decisions from innovation to production, pricing, and packaging; promotion decisions from advertising to personal selling; placement decisions from channel of distribution to merchandising and visual displays, salesmanship and technology.</p> <p>**DECA Highly Recommended</p>	Economics Credit
	DECA
	VPAA Credit
	2nd year World Language Credit

Marketing II (School Store)

<p><u>Description:</u></p> <p style="text-align: center;"><i>1 year 2 hour block 11-12 grade</i></p> <p>This two hour block, one year course is designed to provide training in managing the operations of a retail store under real conditions in the school store. Course topics include: business communications; retailing, budgeting, purchasing, pricing, and sales analysis; visual and display design, marketing research, advertising and management.</p> <p><i>Prerequisite:</i> Marketing I, DECA, application and approval by marketing instructor</p> <p>*There is a DECA fee associated with this course</p>	College Credit
	4th year Math Credit (1 credit)
	VPAA Credit
	DECA
	2nd year World Language Credit

Sports and Entertainment Marketing

<p><u>Description:</u></p> <p style="text-align: center;"><i>1 semester 9-12 grade</i></p> <p>The purpose of this course is to provide students with the fundamental principles and concepts of sports and entertainment marketing and to develop critical thinking and decision making skills through the application of marketing principles. A strong base of skills in communication, mathematics, social science, and the arts as well as the specific tasks associated with employment will be included. Successful completion of this course will help students develop knowledge of career opportunities, entry level skills, and how marketing relates to the sports and entertainment industries. Students will also develop and utilize skills required to produce an actual sports and entertainment event.</p>	DECA
	2nd year World Language Credit

Business/Marketing Department

<http://www.brightonk12.com/BrightonHigh.cfm?subpage=183086>