Department of Teaching & Learning
Parent/Student Course Information

Foundations of Creative Coding & Computer Solutions II
(BE 3216)
No Credit, One Quarter
Grades 7 - 8

Counselors are available to assist parents and students with course selections and career planning. Parents may arrange to meet with the counselor by calling the school's guidance department.

COURSE DESCRIPTION
This nine-week course expands upon the Foundations of Creative Coding and Computer Solutions course. Students will continue their exploration of coding by building on what they learned in the foundations course. They will delve into more complex concepts such as controlling game flow with loops, events and conditional statements, and add animation using sprites. Admission to this course is based upon the successful completion of the Foundations of Creative Coding and Computer Solutions course.

CERTIFICATION
None

STUDENT ORGANIZATION
The Future Business Leaders of America (FBLA) is the co-curricular organization for middle and secondary Business and Information Technology students. The organization enhances occupational preparation for students by helping them attain the following goals: leadership skills; knowledge of the American enterprise system; self-confidence; improvement of home, business, and community; scholarship; citizenship; and career goals.

PREREQUISITE
None

OPTIONS FOR NEXT COURSE
Advanced Creative Coding and Computer Solutions

REQUIRED STUDENT TEXTBOOK
None

COMPETENCIES FOR FOUNDATIONS OF CREATIVE CODING & COMPUTER SOLUTIONS II

Demonstrating Workplace Readiness Skills: Personal Qualities and People Skills
001   Demonstrate positive work ethic.
002   Demonstrate integrity.
003   Demonstrate teamwork skills.
004   Demonstrate self-representation skills.
005   Demonstrate diversity awareness.
006   Demonstrate conflict-resolution skills.
007   Demonstrate creativity and resourcefulness.

Demonstrating Workplace Readiness Skills: Professional Knowledge and Skills
008   Demonstrate effective speaking and listening skills.
009   Demonstrate effective reading and writing skills.
010   Demonstrate critical-thinking and problem-solving skills.
011   Demonstrate healthy behaviors and safety skills.
012   Demonstrate an understanding of workplace organizations, systems and climates.
013   Demonstrate lifelong-learning skills.
014   Demonstrate job-acquisition and advancement skills.
015   Demonstrate time-, task- and resource-management skills.
016   Demonstrate job-specific mathematics skills.
017   Demonstrate customer-service skills.

Demonstrating Workplace Readiness Skills: Technology Knowledge and Skills
018   Demonstrate proficiency with technologies common to a specific occupation.
019   Demonstrate information technology skills.
020   Demonstrate an understanding of Internet use and security issues.
021   Demonstrate telecommunications skills.

Addressing Elements of Student Life
022   Identify the purposes and goals of the student organization.
023   Explain the benefits and responsibilities of membership in the student organization as a
        student and in professional/civic organizations as an adult.
024   Demonstrate leadership skills through participation in student organization activities, such
        as meetings, programs and projects.
025   Identify Internet safety issues and procedures for complying with acceptable use standards.

Demonstrating Keyboarding Skills
026   Identify computer system components.
027   Boot, access, and exit operating system and software.
028   Key alphabetic, numeric and symbol information, using a touch system and correct techniques.
029   Improve keyboarding techniques, speed and accuracy.
030   Proofread copy.
031   Edit copy.
032   Describe ergonomic guidelines related to safe computer use.

Using Word Processing Software to Solve Problems
033   Key and format documents (e.g., letters, memoranda, reports, outlines, flyers, newsletters, and
        tables).
034   Compose documents (e.g., letters, memoranda, reports, outlines and tables).
035   Apply word-processing skills to solve a problem.

036   Use word processing program to develop notetaking skills.

Using Database Software to Solve Problems
037   Create a database by defining fields and designing formats.
038   Populate the database.
039   Process material using database features such as sort and merge.
040   Apply database skills to solve a problem.

Using Spreadsheet Software to Solve Problems
041   Input data and formulas.
042   Edit data within the spreadsheet (e.g., retrieve, update, move and save).
043   Create graphs and charts to visually represent data.
044   Apply spreadsheet skills to solve a problem.

Using Telecommunications to Solve Problems
045   Identify emerging telecommunication technologies available to solve problems.
046   Identify local and worldwide network communication systems.
047   Use search strategies to retrieve electronic information.
048   Use electronic sources (e.g., encyclopedias, almanacs, indexes and catalogs) to retrieve and select relevant information.
049   Analyze a problem to determine the telecommunication options needed for a solution.
050   Apply telecommunication skills to solve a problem.

Solving Ethical and Security Problems Relating to Computers
051   Identify security issues related to computer hardware, software and data.
052   Analyze problems involving integrity, courtesy and confidentiality related to information and communications systems.
053   Analyze the impact of regulations such as copyright and licensing agreements in computer software applications.

Solving Problems Relating to Computer Maintenance
054   Identify safety precautions associated with computer use.
055   Describe the care necessary for internal and external storage devices.
056   Describe methods of preventing the spread of computer viruses.

Dr. Aaron C. Spence, Superintendent
Virginia Beach City Public Schools
2512 George Mason Drive, Virginia Beach, VA 23456-0038

Produced by the Department of Media and Communications for the Department of Teaching and Learning.
For further information please call (757) 263-1070.

Notice of Non-Discrimination Policy
Virginia Beach City Public Schools does not discriminate on the basis of race, color, religion, national origin, sex, sexual orientation/gender identity, pregnancy, childbirth or related medical condition, disability, marital status, age, genetic information or veteran status in its programs and activities and provides equal access to the Boy Scouts and other designated youth groups. School Board policies and regulations (including, but not limited to, Policies 2-33, 4-4, 4-6, 4-43, 5-7, 5-19, 5-20, 5-44, 6-7, 7-48, 7-49, 7-57 and Regulations 4-4.1, 4-4.2, 4-6.1, 4-43.1, 5-44.1, 7-11.1, 7-17.1 and 7-57.1) provide equal access to courses, programs, counseling services, physical education and athletic, vocational education, instructional materials and extracurricular activities.

To seek resolution of grievances resulting from alleged discrimination or to report violations of these policies, please contact the Title VI/Title IX Coordinator/Director of Student Leadership at (757) 263-2020, 1413 Laskin Road, Virginia Beach, Virginia, 23451 (for student complaints) or the Section 504/ADA Coordinator/Chief Human Resources Officer at (757) 263-1133, 2512 George Mason Drive, Municipal Center, Building 6, Virginia Beach, Virginia, 23456 (for employees or other citizens). Concerns about the application of Section 504 of the Rehabilitation Act should be addressed to the Section 504 Coordinator/Director of Student Support Services at (757) 263-1980, 2512 George Mason Drive, Virginia Beach, Virginia, 23456 or the Section 504 Coordinator at the student's school. For students who are eligible or suspected of being eligible for special education or related services under IDEA, please contact the Office of Programs for Exceptional Children at (757) 263-2400, Laskin Road Annex, 1413 Laskin Road, Virginia Beach, Virginia, 23451.

Alternative formats of this publication which may include taped, Braille, or large print materials are available upon request for individuals with disabilities. Call or write The Department of Teaching and Learning, Virginia Beach City Public Schools, 2512 George Mason Drive, P.O. Box 6038, Virginia Beach, VA 23456-0038. Telephone 263-1070 (voice); fax 263-1424; 263-1240 (TDD) or email at Theresa.Dougherty@VBSchools.com.

vbschools.com
your virtual link to Hampton Roads' largest school system

VIRGINIA BEACH CITY PUBLIC SCHOOLS
CHARTING THE COURSE

No part of this publication may be produced or shared in any form without giving specific credit to
Virginia Beach City Public Schools.

(Revised August 2017)