# Oxford High School

# Class of 2022
# Elective Courses

# APPLIED TECHNOLOGIES

**The purpose of the Applied Technologies Department is to provide students with the fundamental/practical skills and attributes needed for successful, productive, and independent lives. In addition, this department helps prepare students for college study in this area.**

## BUSINESS AND FINANCE TECHNOLOGY

**#716 Accounting I (9-12) One Semester 0.5 Credit**

*Formerly Proprietorship Accounting*

Accounting I presents the introductory phase of accounting and is beneficial to all students. It provides a beginning foundation for students interested in business after high school or in college. The accounting cycle as it applies to personal use and a proprietorship, service business is stressed. Preparation and interpretation of journals, ledgers, and statements are presented.

**#743 Career Explorations (9-12) One Semester 0.5 Credit**

The profound business and economic changes now underway in the United States and other industrial countries are radically altering the world of work, greatly increasing the need to incorporate career exploration and development in the education of today's high school student. The Career Exploration course is designed to prepare our students for these changes and challenges. A major goal of this course is for students to examine their talents, aptitudes, and interests and begin to identify careers which would be suitable for them.

**#721 Communicating with Text I (9-12) One Semester 0.5 Credit**

The ability to process information utilizing the "touch system" of keyboard entry is an essential skill needed by all students bound for college or employment. Students gain mastery in the correct approach for keyboarding on computers. Students will also create, produce, and compose a variety of documents using Microsoft Word. This course stresses building an understanding of the differences between formal (letters, memos, reports) and informal (email, instant messaging, blogging, etc.) methods of text communication and builds practical skills in both.

** NOT a graduation requirement for incoming freshmen or students that haven't take Text I.

**#781 Computer Applications (9-12) One Semester 0.5 Credit**

This course is designed to expand the student's knowledge of the Microsoft Office Suite and Google Docs. During the first half of the course, students will be exposed to and gain an understanding of Google Docs, Sheets, Slides and Forms. During the second half of the course, students will be exposed to and gain an understanding of the advanced features found in Word, Excel, PowerPoint and Publisher. Throughout the course, students will use Google Classroom to send and receive work. Upon completion of the course, students will be well prepared for tasks involving the usage of Microsoft Office and Google Docs in either college or the workplace.

| #795 | Introduction to Business (9-10) | One Semester | 0.5 Credit |
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This course is designed as a survey course that provides a basic understanding of the role of business within our social and economic system and also serves as an introduction to other courses in the department. This course is designed to acquaint students with basic economic functions; small business operation and entrepreneurship; the functions of management; production operations; personnel, marketing, and accounting overviews; finance and investments; and international business. Students will become aware of the importance of business in our economy, the value and qualities of well-trained management, and be better prepared to be successful participants in the business world.

| #782 | Video Game Design (9-12) | One Semester | 0.5 Credit |
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This course is an introduction to the theory and practice of video game design and programming. In this course, students will gain an understanding of the basics in designing a video game, common types of commands, and gaming code using Game Maker, and other software programs. Students will also be exposed to real world business situations in which they must create a video game suited for their customer's needs, plan long term goals using storyboards, and resolve problems to ensure customers' overall satisfaction.

## FAMILY & CONSUMER SCIENCES

| #813 | Culinary Arts I (9-12) | One Semester | 0.5 Credit |
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This course is recommended for students who want to learn the principles of food preparation and will apply them in real life circumstances. Students will learn basic meal planning methods as they apply to class projects and laboratory experiences. Upon completion of this course, students will be introduced to recipe use, weights and measurements, conversions, safety and sanitation, organizing for efficiency, lab procedures, basic knife skills, and cooking techniques, such as steaming, broiling, searing, poaching, pan frying, sautéing, braising, and roasting. Students will be responsible for cleaning their own cooking tools and equipment. Students will be expected to take part in community service activities during class. We also offer after school community service activities on a volunteer basis.

| #823 | Cultures and Cuisines (9-12) | One Semester | 0.5 Credit |
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**Prerequisite: Culinary Arts I**

This course allows students to study global food patterns from a cultural point of view and explore various spices, flavors, and holidays of selected U.S. regions and world countries. Students will examine food and food customs of other cultures in relation to their own and apply various food preparation techniques. Food practices and habits of various regions and countries will be compared and contrasted. Students are responsible for the sanitation of cooking tools and equipment utilized during the cooking process. Community service will also be integrated into classroom food preparation.

| #812 | Food for Fitness and Health (9-12) | One Semester | 0.5 Credit |
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**Prerequisite: Culinary Arts I**

The course will help students understand the connections between what we eat and how it impacts our health and the way we live. Areas of study will include basic nutrition, the scientific evaluation of food and the energy it provides, the digestive system, weight control and management, metabolism, diets for various populations, and the impacts and health implications of supplements and other dietary choices.

| #850 | Child Development and Family Dynamics (9-12) | One Semester | 0.5 Credit |
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This course is an interdisciplinary course that provides an overview of the basic processes of child development and family studies. The purpose of these experiences is to provide knowledge that is useful for the health and well-being of individuals and families. Students will understand the impact of choices made throughout the childhood development process and the various opportunities for help and support throughout our society. Students will experience parenting with the "Real Care Baby II," an amazing realistic infant simulator that offers learning by doing. Also, students can experience what it's like being pregnant in the third trimester using The RealCare Pregnancy Profile Simulator.

| #851 | The Preschooler (9-12) | One Semester | 0.5 Credit |
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**Prerequisite: Child Development & Family Dynamics**

The Preschooler is a comprehensive study of the physical, emotional, social and intellectual growth and development of the child from 3 to 5 years of age. Through a better understanding of children, the young adults will better understand themselves and be more prepared for parenthood or teaching. Included, as part of the course content, is an opportunity to interact with preschool-aged children on various occasions throughout the semester. The opportunity will include the planning, implementation, and evaluation of preschool programming for 3 and 4-year old children.

| #842 | Clothing and Fashion I (9-12) | One Semester | 0.5 Credit |
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This course is designed for students interested in clothing, fabric, fashion, and construction. The class will prepare students to make intelligent, informed decisions when buying and caring for clothes. In addition, this course will explore basic sewing construction, recycle, up-cycle and re-make skills, and career options. A culminating activity for this class will be a field trip to the fashion district in New York City.

| #843 | Clothing and Fashion II (9-12) | One Semester | 0.5 Credit |
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**Prerequisite: 80% or higher in Clothing and Fashion I (Formerly The World of Clothing and Fashion) and/or teacher recommendation.**

Building on skills learned in Clothing and Fashion, students will explore more advanced skills, sew clothing items, redesigning new items from previously used garments or items otherwise discarded, explore fashion merchandising career options and culminate with a field trip to New York City. Student's will organize an informal Fashion Show featuring garments and misc. items students constructed. Each year students spend a week making a variety of items to donate to local hospitals, shelters or individuals in need.

## TECHNOLOGY EDUCATION

| #773 | Construction Systems (9-12) | One Semester | 0.5 Credit |
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Construction Systems will focus on the study of various structures such as buildings, bridges, towers, dams, and roadways. Students will examine the forces and stresses involved in the construction of safe and efficient structures. Students will design and build models of truss bridges and towers and then test them in order to determine their strength and efficiency. Also, students will focus on residential construction and build wooden models of homes. This course will allow students to become aware of standard construction practices for wood framed homes. Human, economic, and environmental impacts will also be studied.

| #796 | Introduction to Drafting and Design (9-12) | One Semester | 0.5 Credit |
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This course is the study of basic mechanical and computer aided drafting techniques. The student will study how to communicate ideas and designs conventionally on drafting tables as well as on the computer using CAD software. Students will create two-dimensional, three view, and isometrics drawings, as well as 3D computer models. Students will utilize these technical drawings to create projects and models. Students will also become aware of the design field and what it has to offer.

| #751 | Engineering Design I (9-12) | One Semester | 0.5 Credit |
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**Prerequisite: Introduction to Drafting and Design**

In Engineering Design, students will focus on the design of consumer products and solutions to consumer problems. Students will use CAD software to create solutions to existing consumer problems and build prototypes to test their designs. Students will then evaluate and improve upon their design to find the best and most efficient solution to problems. Students will utilize both ANSI (American National Standards Institute) and ISO (International Standards Organization) dimensioning standards.

| #732 | Introduction to Transportation (9-12) | One Semester | 0.5 Credit |
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Runs 2019-2020
Introduction to Transportation will focus on the study of how we move people, goods, and materials. Students will design and build models of terrestrial (land), marine (water), atmospheric (air), and aerospace (space) transportation vehicles. These models include gliders, roller coasters, wind and solar powered boats, mousetrap vehicles, impact cars, and tethered vehicles. Human, economic and environmental impacts including alternative fuel sources will be studied.

| #771 | Web Page Design (9-12) | One Semester | 0.5 Credit |
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This course is designed for those who are interested in all aspects of web page development, hosting, and design. This course focuses on creating web pages using HTML code as well as HTML code generators. Technical aspects of client-server architecture will be discussed, along with standards and recommendations of the creation and distribution of information. The course also covers issues related to usability and accessibility, navigation, site structure, and information architecture. By the end of the course, students should be confident uses of HTML, CSS, and be able to design and create their own page or a page for others.

| #224 Computer Science (9-12) | Full Year | 1.0 Credit |
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**Prerequisite: Algebra I**

Exploring Computer Science I and II is a yearlong course (divided into two semester courses) consisting of 6 units: Human Computer Interaction, Problem Solving, Web Design, Programming, Computing & Data Analysis, and Robotics. The course was developed around a framework of both computer science content and computational practice. Assignments and instruction are contextualized to be socially relevant and meaningful for diverse students. Units utilize a variety of tools and platforms, and culminate with final projects.

**Can also be used as a math credit for after students have completed primary math requirements*

## PROJECT LEAD THE WAY

In PLTW Engineering, students engage in open-ended problem solving, learn and apply the engineering design process, and use the same industry-leading technology and software as are used in the world's top companies. Students are immersed in design as they investigate topics such as sustainability, mechatronics, forces, structures, aerodynamics, digital electronics and circuit design, manufacturing, and the environment, which gives them an opportunity to learn about different engineering disciplines before beginning post-secondary education or careers.

Schools offer a minimum of three courses by the end of the third year of implementation: Introduction to Engineering Design, Principles of Engineering, and any specialization course or the capstone course.

| #762 Introduction to Engineering & Design (9) | Full Year | 1.0 Credit |
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**Prerequisite: Algebra I**

Students dig deep into the engineering design process, applying math, science, and engineering standards to hands-on projects. They work both individually and in teams to design solutions to a variety of problems using 3D modeling software, and use an engineering notebook to document their work.

# FINE AND PERFORMING ARTS

**The purpose of the Fine and Performing Arts Department is to ensure that Oxford students create, perform, and respond as part of the core curriculum and the National and State Content Standards. Students will be given the opportunity to develop and appreciate the importance of fine and performing arts and be prepared to apply their artistic skills and understandings throughout their lifetime.**

## VISUAL ARTS

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| **#612** | **Foundations of Art I (9-12)** | **One Semester** | **0.5 Credit** |

This course introduces students to the elements and principles of design while focusing on two-dimensional design applications. This course is the foundation to all other courses.

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| **#615** | **Foundations of Art II (9-12)** | **One Semester** | **0.5 Credit** |

**Prerequisite: Foundations of Art I**
This course is designed to build on concepts and processes learned in Foundations of Art I. This course introduces students to the elements and principles of design while focusing on three-dimensional design applications. This course is the companion course to Foundations of Art and focuses on sculptural applications and techniques. Both Foundations of Art I and II are required courses for students planning a major/minor sequence in Art at the collegiate level.

## MUSIC

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| **Concert Band (9-12)** | | **One Semester** | **0.5 Credit** |
| **#655** | **Fall Semester** | | |
| **#656** | **Spring Semester** | | |

Students participating in a performing ensemble class are expected to demonstrate progress throughout the year in musical performance, general musicianship skills, and musical knowledge. Grades for these courses are based on a combination of daily performance, required preparation, daily ensemble participation, periodic individual performance assessments, written assignments, and concert attendance. The goal of this ensemble is to study and perform quality literature written for the concert band medium. Emphasis will be placed on the development of individual musical skills as well as contribution to an ensemble. Seating and part placement are determined by the director based on the student's ability to demonstrate range and other musical attributes. Full rehearsals are held daily and sectional rehearsals are scheduled periodically throughout each semester.

**Concert Choir (9-12)** **One Semester** **0.5 Credit**
**#658 Fall Semester**
**#663 Spring Semester**

The Concert Choir is the premier vocal ensemble representing Oxford High School. The course places a major emphasis on vocal development, music comprehension, and the continued study of a wide variety of musical styles. Students will perform concerts at Oxford High School, local and regional festivals, and community performances within Oxford and beyond. Students will be encouraged to audition for the Oxford High School musical and the CMEA (Connecticut Music Educators Association) regional festivals.

**#TBD Bel Canto Treble Choir** **Full Year** **1.0 Credit**

**Prerequisite:** Audition is required

Course Description: Treble Choir is an intermediate-advanced choral ensemble specifically designed for soprano and alto voices. This course places strong emphasis on music performance and music literacy as well as understanding of vocal technique, music theory, and human anatomy & physiology pertaining to breathing and the vocal mechanism. Students are required to attend all performances, festivals, and state and local community events scheduled by the director. In addition, students are required to attend any additional rehearsal and sectionals should an occasion necessitate.

**#677 Guitar Ensemble** **One Semester** **0.5 Credit**

Guitar Ensemble is a performance based course open to players at all levels. The course is taught in a rehearsal format with emphasis on performing as a group and attaining a deeper understanding of the elements of music (style, harmony, dynamics and expression)

**#646 American Pop Music** **One Semester** **0.5 Credit**

No musical experience is necessary for this class. American Pop Music traces the origins, development, and fascinating history of America's music. Students will analyze music from all of the great periods from Early Jazz to Rock and Roll to Contemporary music today. Students will gain an appreciation for the complexity and beauty of many of America's musical forms. Students will study how American music has offered a window in which so much of American history can be seen. Students will also learn how American music was an objective witness to the 20$^{th}$ Century, the story of two world wars, a devastating depression, and beyond. This class will also study American music as the soundtrack that helped Americans survive through the worst of times and the best of times. Students will listen to, discuss, and journal about legendary jazz and rock musicians.

**#666 Music Theory I** **One Semester** **0.5 Credit**

This course is designed to teach the basic elements of music: note reading, intervals, key and scale relationships, chords, rhythm, and melody. Students will learn the elements of the piano keyboard. Special emphasis will be placed on increasing the student's ability to compose music and realize the use of computers in music.

**#667 Music Theory II/Composition** **One Semester** **0.5 Credit**

**Prerequisite: Music Theory I**
This course is a continuation of learning how music is created and put together. It provides an in-depth study of how the basic elements of melody, harmony, rhythm, form, tone, color, and texture are integrated in musical composition. This course provides a two-pronged approach to understanding composition that combines conventional theory and instrumentals with the use of digital technology. Students will work on computer/keyboard music stations during class and outside of class to complete original compositions. General musicianship and listening are also an integral part of this class.

**#678 Music Technology** **One Semester** **0.5 Credit**

This hands-on course is an introduction to the fundamental concepts of music technology, including the basics of digital audio, sound recording/engineering and mixing, and computer music composition. Students will learn to work the web-based software, PreSonus Studio One digital audio workstation. The course is also an introduction to a wide-range of applications and careers in music technology.

**#680 Music Appreciation** **One Semester** **0.5 Credit**

The goal of this course is to equip students with the ability to experience a richer and more comprehensive music listening experience. Students are taught ways to talk about what they are listening to and how to answer the question, “What is music trying to express?” This course provides an opportunity to discover great music from the last 500 years; everything from Beethoven to the Beastie Boys and Palestrina to Pink Floyd.

**#681 Percussion Lab** **One Semester** **0.5 Credit**

Percussion Lab is a beginner’s study of percussion instruments. Students will learn the history, musical language, and background of various pitched and non-pitched percussion instruments. Course requirements will include at least one public ensemble performance as well as several in-class solo performances. Students will gain a basic understanding of music notation.