

Lakeview Middle- High School  
Scheduling Handbook for Grades 9-12

2482 Mercer Street  
Stoneboro, PA 16153  
724-376-7911

Student and Parent Scheduling Handbook  
DESCRIPTION OF REQUIRED AND ELECTIVE COURSES TO BE OFFERED



# Scheduling Handbook

## 2021-2022

*The focus of the educational program at Lakeview Middle-High School is on the growth and development of each student to his/her maximum potential.*

### INTRODUCTION

Selecting a program of studies is one of the most important decisions a secondary school student must make. The curriculum and specific elective courses a student selects open avenues of opportunity for the immediate post-high school years. Choosing courses that are worthwhile and challenging will promote personal satisfaction as well as educational excellence.

The purpose of this booklet is to provide a comprehensive presentation of the programs of study available to Lakeview Middle-High School students. An overall understanding of the curriculum enables students – together with their parents, guidance counselors and teachers – to set goals and objectives which can be met through thoughtful selection of courses. Students interested in early college acceptance should review the procedures outlined in this scheduling manual or the student handbook and must contact the school counselor.

The program of studies includes an outline of our educational programs, descriptions of courses offered and student course selection worksheets. Every student is urged to study this guide carefully and discuss its contents with parents, counselors and teachers. Planning and wise choosing of courses will enable students not only to satisfy present needs and interests, but to attain future goals as well.

Students should remember that selecting a program of studies is only one part of their obligations in school. Study, preparation, participation, disciplined behavior and a good attitude are vital ingredients to attaining a successful secondary school education. If you have any questions about a course, you are encouraged to discuss those with the appropriate teacher, counselor, or principal.

Administrative and Guidance Staff for 2021-2022

**Mrs. Laurie Snyder**  
Principal of Academics

6-12

**Mr. David Blakley**  
Principal of Athletics and  
Student Activities

6-12

**Mr. James Morris**  
School Counselor

9-12

**Mrs. Alicia Sciaretta**  
School Counselor

6-9

**SPECIAL EDUCATION**

Students in need of special education services receive an evaluation by a multidisciplinary team. Evaluation will be provided on a non-disciplinary basis. The results of the evaluation will be utilized to plan for appropriate instructional methods and materials to teach the student. Each student receiving special education services has an Individual Education Plan (I.E.P.) developed on an annual basis, and a re-evaluation conducted every two/three years. Eligible students shall be provided an education, which approximates as nearly as possible the curriculum of the school district. All eligible students have an Individual Transition Plan and a Graduation Plan as a part of their I.E.P. Gifted students will be provided an education that enables them to participate in acceleration or enrichment, or both. All eligible and gifted students' programs shall be in accordance with their I.E.P.

Parents of handicapped or disadvantaged students are urged to contact Lakeview Middle-High School if there are questions concerning assessment and special services. Please contact Mr. James Morris, High School Guidance Counselor at 724-376-7911, Ext. 6109, or Mrs. Julie Lyon, Special Program Contact at 724-376-7911, Ext. 6026.

**VOCATIONAL EDUCATION PROGRAM**

All students have the opportunity to participate in vocational courses. It is strongly recommended that the student consider all vocational opportunities available. For students identified with special needs, services and modifications will be made available so that the student can complete his or her vocational educational program. All vocational teachers are informed on an annual basis of any modifications or special services to be provided to the handicapped or disadvantaged student who enrolled in vocational education. IEPs for handicapped students enrolled in vocational programs will reflect annual goals and any modifications necessary for the respective vocational program.

**CURRICULUM PROGRAMS**

The various programs of study offered at Lakeview Middle-High School may be grouped into two broad classifications: College & Career Prep and Vocational Prep.

**A. The College & Career Prep Curriculum**

This program provides opportunities for students as they prepare for entrance into college and/or the world of work. English, Social Studies, Math and/or Science are recommended each year in addition to other core requirements. The curriculum offers a strong educational foundation to provide students with the skills and knowledge they need to be successful in their post-secondary endeavors, to become self-sufficient adults and to provide them with an understanding of the society in which they live so they can function effectively as citizens.

**B. The Vocational Prep Curriculum**

The Mercer County Career Center, located in Mercer, offers areas of study for students in grades 10, 11 and 12. Three-year programs are chosen by students when they are in ninth grade. Specified two-year programs are chosen by students in 10<sup>th</sup> grade. Students selecting cosmetology should be aware that it is a three-year program; the final year's cost is to be borne by the student. Detailed programs at the Career Center are available from the Guidance Office and the Internet [www.mccc.onlinecommunity.com](http://www.mccc.onlinecommunity.com). Career Center students will attend MCCC in the morning, departing school at 8:05 a.m. and returning at 11:15 a.m. each day.

Automotive Technology  
Carpentry  
Collision Repair and Refinishing  
Computer Information Technology  
Computer Programming  
Cosmetology  
Culinary Arts  
Diesel Technology

Early Childhood Education  
Electrical Occupations  
Health Care Careers  
Innovation and Entrepreneurial Development  
Logistics - Material & Supply Chain Management  
Precision Production Metals  
Welding

## PROCEDURE FOR COURSE SELECTION

At an appropriate time each year, secondary students after discussions with parents, counselors and teachers, will make course selections appropriate to their educational and vocational goals. In making course selections, students must meet the minimum standards for each grade level, including required subjects and number of credits specified by the Pennsylvania State Department of Education and Lakeview Board of School Directors.

Both students and counselors are responsible for meeting the following guidelines in scheduling:

1. Students should review the entire program of study booklets with their parents and choose a particular curriculum model.
2. Students must schedule all required courses listed in the model they choose to follow.
3. Any deviation or change in the program curriculum must have the approval of the counselors and administration. These will be based on the needs of the student as identified by the staff. **Note that some courses will require teacher recommendation and/or parent permission, as indicated.**
4. The student and the parent **must** sign the course selection form. **For students with IEPs, the special education case manager must also sign the course selection form.** Changes may be made at the administration level, as needed.
5. Timetable of activities:
  - a. Students are presented with a course of studies booklet and an explanation of procedures.
  - b. Courses are selected, worksheets completed and returned to Advisory Teachers.
  - c. Draft schedules are distributed to students and are to be reviewed by students and parents. Changes and corrections are to be made on this form.

## CHANGES IN COURSE SELECTION

Once made, course selections are considered final and binding. The selection of courses should be viewed as a contract between students and school. The administration and guidance staff will do all in their power to make provisions for students to be scheduled in the courses of their choice. The students, in turn, must complete those courses they select.

**All courses listed in this booklet may not be offered. If there is not sufficient registration for a course, it may be withdrawn and the students will be notified so that they can make another selection.**

If students sign up for a course and then circumstances develop which make the choice unreasonable, they may contact the Guidance Office and request permission to make a change. The counselor will evaluate the request and explain the procedures to be followed.

**All schedule changes must be made prior to the 1<sup>st</sup> day of school. \***

***\*Honors courses will not be dropped due to a student's non-completion of required summer work. However, failure to complete the required work may have a profound effect on the first quarter grade. Students and parents must be fully committed to taking an honors/advanced level course and the work that is required.***

Students are eligible for special consideration and schedule change approval when their requests are based on one of the following:

1. Health problems verified by a physician;
2. Computer errors or conflicts;
3. The need to earn credit(s) for graduation (seniors only).

Any request for a schedule change which does not fit these criteria, but which is deemed necessary by the guidance counselor will be eligible for review by the high school Principal of Academics. Dropping a class may result in a "Withdrawal F" on records, if deemed appropriate by the teacher, counselor and principal. The High School principal determines the final schedule change.

## GRADUATION REQUIREMENTS

**Academic Curriculum:** The Pennsylvania Department of Education and the local Board of School Directors set the standards for graduation from Lakeview Middle-High School. **Students must earn a minimum of 27 credits in grades nine through twelve.** \*ALL students will be required to schedule a minimum of 7 credits per academic year.

\*Students may request a study hall if they feel they could benefit from one in addition to the Advisory period. However, no student is guaranteed to have a study hall, even if requested.

### Students Graduating 2021 and beyond

	Total Required Credits	Grade 9	Grade 10	Grade 11	Grade 12
English/Language Arts	4	1	1	1	1
Social Studies	3.5	1	1	1	.5
Math	3 or 4 each, 7 total (Total of 3 each for MCCC Students)	1	1	1	1 (or science)
Science		1	1	1	1 (or math)
Health & Physical Education	1	.5	.5 (taken in 10 <sup>th</sup> , 11 <sup>th</sup> OR 12 <sup>th</sup> )		
Unified Block 9 Careers (.25) Health (.25) Public Speaking (.25) Family Living (.25)	1	1			
Computer	1.5	.5	.5	.5 (Taken either Grade 11 or 12)	
Electives	9.0	Taken in Grades 9-12			
Total	27 (26 for MCCC students)				

## Keystone Exams/Pathways to Graduation

**Pathway 1)** A score of Proficient or above on the Pennsylvania Keystone Exams in Algebra I, Literature, and Biology is a Lakeview Middle-High School and Pennsylvania Department of Education (PDE) graduation requirement beginning with the class of 2023.

**Pathway 2)** If a student does not score proficient in all 3 tested areas, he or she must earn a minimum composite score (set by the state) including at least one proficient/advanced score and a minimum of basic on the other 2 scores.

**Pathway 3-5)** Students not meeting either of these 2 pathways for graduation must prove their readiness for graduation based on one of 3 other pathways determined by PDE. It will be the student's responsibility to ensure that one of these pathways are met.

Students and parents are strongly encouraged to take the Keystone test seriously and to strive to complete pathway 1 or 2, as these are the least complex pathways to achieve graduation status.

An exam will be initially administered at the completion of the following courses:

Algebra I

English 10/Honors English 10

Biology

Students who do not achieve a score of proficient or above may receive remediation in each subject he/she did not score proficient on and may be retested during subsequent waves of Pennsylvania Keystone Exam Testing Windows.

### Senior Graduation Project

During the sophomore, junior and senior years, students are required to begin and complete all components that comprise the senior graduation project. Details and this packet are available in the guidance office.

## NON-DISCRIMINATION NOTICE

Lakeview School District is an equal opportunity educational institution and will not discriminate on the basis of race, color, national origin, sex, or handicap in its activities, programs, or employment practices as required by Title VI, Title IX, and Section 504.

For information regarding civil rights and grievance procedures or concerning the full range of available educational opportunities, location of services, activities, and facilities that are accessible to and usable by handicapped persons, contact Lakeview School District, Title IX Coordinator/Section 504 Coordinator, 2482 Mercer Street, Stoneboro, PA 16153, 724-376-7911.

## CLASS STANDING AND GRADUATION

*Class standing does NOT determine the year of graduation.*

Class standing (grade level) at the senior high school level is easily misunderstood. Students at the senior high level will be promoted each year to the next grade level for data collection purposes and grade level state assessment testing. This promotion is NOT an indicator of the number of credits earned and does not indicate if specific graduation requirements are being met. Students and parents are reminded that graduation requires meeting the criteria stated in this book under Graduation Requirements. Therefore, class standing has limited meaning and use at the senior high level.

Primary uses of class standing (grade level) are:

1. Determining class rank (for those graduating in 2022, 2023)
2. Eligibility for student activities and athletics
3. Student processing for scheduling
4. A database for record keeping and reporting data
5. State assessment Keystone testing completed by 11<sup>th</sup> Grade

**Having senior class status (12<sup>th</sup> grade) DOES NOT necessarily mean that a student can or will graduate at the end of the school year.**

## WEIGHTED GRADING SYSTEMS

The philosophy of grade weighting is based on the premise that a grade in a more academically challenging upper level course should carry more point value than the same grade given in a less challenging course. The primary reason for grade weighting is to determine a student's rank in his/her particular class. The amount of weight that will be assigned to a course will be based on the academic difficulty of the course as determined by a committee of faculty, guidance and administrative personnel. Weights will only be applied to Lakeview Middle- High School Academic courses taken while the student is in grade 9-12.

Courses have been divided into three levels. A point value of 1.0 has been established for courses in Level I. This level would include our basic or entry level classes. The following is a list of courses for Level II and Level III.

\*Note that beginning with the class of 2024, students will be under the Latin System. See "Latin System" section.

### Weighted Courses

**LEVEL II** (weight = 1.05 this level would include our more advanced courses)

Chemistry 1 w/lab	Adv Math
-------------------	----------

**LEVEL III** (weight – 1.1 this level would include our most advanced and primarily junior/senior courses)

Adv Biology (CHS)	Calculus I (CHS)	Human Anatomy w/lab (CHS)	Physics w/lab
Adv Chemistry w/lab (CHS)	Calculus II AP/(CHS)*	International Politics (CHS)	Pre-Calculus (CHS)
AP Lit/Honors 11	French IV (CHS)	Introduction to Python (CHS)*	Psychology (CHS)
AP Language and Comp	Honors English 9, 10, 12	Mass Communication Process (CHS)	Spanish (AP)
American Politics (CHS)			Stats (CHS)

\*Potential CHS Course credit pending College in High School approval

## Latin System

Beginning with the Class of 2024, students will no longer be ranked by weighted average, but will have the opportunity to earn one of 3 academic distinction levels based on weighted GPA. There will no longer be Valedictorian or Salutatorian or traditional "Top 10" ranked students. However, students will still be selected to speak at graduation and 10 students from a variety of areas will represent the class. This change will allow more of our students to be recognized for their high academic achievement, challenging themselves with courses that best fit their interests and career paths without creating competition between students.

Latin distinctions will be earned as follows:

Latin Distinction	Weighted GPA Range
Summa Cum Laude	4.2
Magna Cum Laude	4.0-4.19
Cum Laude	3.8-3.99

Please contact Academic Principal, Laurie Snyder with any questions.

## GPA Conversions

Grade	Weight	Percentage	GPA
A	Weighted	92-100	5
B	Weighted	83-91	4
C	Weighted	74-82	3
D	Weighted	66-73	2
F	Weighted	0-65	0
A	Regular	92-100	4
B	Regular	83-91	3
C	Regular	74-82	2
D	Regular	66-73	1
F	Regular	0-65	0

## **EARLY COLLEGE ADMISSION**

A student, with parent approval, shall inform the high school principal and guidance counselor of intent to pursue this option. A student must fulfill the following:

1. A conference must be held with parents, counselor, principal and student to review the terms and conditions of the early college admission option.
2. The student must be accepted by an accredited institution of higher learning as a full time student and must successfully complete the freshman year as a full time student. With these conditions met, the senior year of all required courses at Lakeview Middle- High School shall not be required.
3. During the initial year (or beyond) of higher education, the student is not considered enrolled at Lakeview High School; and therefore, is not eligible to participate in school activities, intramurals, interscholastic sports or other events conducted by the high school with the exception of the Junior-Senior Prom and the graduation ceremony.
4. The student will not be eligible for community and school scholarships, awards or class rank.
5. A high school diploma will be awarded either at graduation or through certified mail to the student when the following conditions are met:
  - a. Successful completion of the freshman year as a full time student (12 credit hours each semester or equivalent) at an accredited institution of higher learning.
  - b. Presentation to the high school principal of an official transcript of credits showing the student has completed the freshman year successfully.
  - c. Request in writing the issuance of a diploma from the high school.

## **COLLEGE IN HIGH SCHOOL (CHS)/AP, DUAL ENROLLMENT**

Dual Enrollment Opportunities are available for students in grades 11 and 12. These courses do not count toward class rank determination or GPA, but with Principal pre-approval, can count towards LMHS credit requirements. LMHS also has CHS courses available through the University of Pittsburgh and Seton Hill University, as well as AP courses. These courses are delivered through LMHS and require a fee that must be paid by the student, if he/she would like to receive college credit for the class in addition to credit toward High School graduation. Courses will be weighted at a 1.1 level and be included in GPA and class rank determination.

## SUGGESTED COLLEGE & CAREER PREP CURRICULUM PROGRESSION

<b>Grade 9</b>	<b>Credits</b>	<b>Grade 10</b>	<b>Credits</b>
English 9 / Honors English 9	1	English 10 / Honors English 10	1
US History I	1	US History II	1
Alg 1 (+)	1	Geometry (+)	1
Physical Science/ Biology	1	Biology/Chemistry I w/lab	1/1.5
Foreign Language I	1	Foreign Language II	1
Internet and Multimedia	.5	Phys. Ed 10-12	.5
Unified Block 9 <sup>th</sup>	1	Intro to Manufacturing or Business Web Design	.5
Phys. Ed 9	.5	Electives	2
Electives	1	<b>Total Credits</b>	<b>8</b>
<b>Total Credits</b>	<b>8</b>		
<b>Grade 11</b>	<b>Credits</b>	<b>Grade 12</b>	<b>Credits</b>
English 11/Honors English 11	1	English 12/Honors English 12	1
World Cultures	1	Economics	.5
Algebra II (+)	1	Pre-Calc (CHS), Advanced Math (+)	1
Chem I w/lab, Adv. Bio (CHS) or Adv. Chem (CHS)	1/1.5	Science Elective & Lab	1.5
Phys. Ed 10-12 or Elective	.5	Phys. Ed 10-12 or Elective	.5
STEM/Computer/Programming Elective	.5	CHS Course	1
Other Electives	3	Electives	2.5
<b>Total Credits</b>	<b>8</b>	<b>Total Credits</b>	<b>8</b>

+ = students may work beyond these suggested progressions

### COMMENTS:

Juniors and Seniors who have narrowed their college preferences should select electives in specific subject areas to meet their needs. Always recommended for electives are computer classes and foreign language electives. Deviations from the progression require the permission of both counselor and principal.

### COMMENTS:

As sophomores, juniors, and seniors narrow their possible career fields, electives should be selected with their personal aptitudes and interests in mind. All students who are planning to attend college should strongly consider taking one or more CHS/AP/Dual Enrollment courses.

**SUGGESTED VOCATIONAL CURRICULUM PROGRESSION**

<b>Grade 9 (2 yr. Program/3yr Program)</b>	<b>Credits</b>	<b>Grade 10 (2 yr. Program/3 yr Program)</b>	<b>Credits</b>
English 9	1	English 10	1
US History I	1	US History II	1
Alg 1 (+)	1	Geometry (+)	1
Physical Science/Biology	1	Biology/Chemistry I w/lab	1/1.5
Internet and Multimedia	.5	PE 10-12 or Elective or Career Center	.5/3
Unified Block 9th	1	Intro to Manufacturing or Career Center	.5/0
PE 9	.5	Electives or Career Center	3/0
Electives	2	<b>Total Credits</b>	<b>8/7</b>
<b>Total Credits</b>	<b>8</b>		
<b>Grade 11</b>		<b>Grade 12</b>	
English 11	1	English 12	1
World Cultures or Economics	1/.5	Economics	.5
Algebra II (+)	1	Computer Elective(s)	.5/1
Chem I w/lab, Adv. Bio (CHS) or Adv. Chem (CHS)	1/1.5	Math or Science elective	1
Career Center	3	PE 10-12 and .5 Credit Elective	1
<b>Total Credits</b>	<b>7</b>	Career Center	3
		<b>Total Credits</b>	<b>7</b>

+ = students may work beyond these suggested progressions

**COMMENTS:**

Required courses from the college and career prep curriculum may be substituted for Career Center Courses with counselor and principal approval, or may be taken in addition to regular curriculum requirements.

## MERCER COUNTY CAREER CENTER COURSE DESCRIPTIONS

### MCCC – CLASSES

Courses available at Mercer County Career Center meet during the mornings. Transportation is provided by the school district. The MCCC bus will depart at 8:05 a.m. and return at 11:15 a.m. A multitude of technical trades are offered. See the guidance counselor for details.

Automotive Technology Carpentry Collision Repair and Refinishing Computer Information Technology Computer Programming Cosmetology Culinary Arts Diesel Technology	Early Childhood Education Electrical Occupations Health Care Careers Innovation and Entrepreneurial Development Logistics - Material & Supply Chain Management Precision Production Metals Welding
--	--

Course	Course Number	Credits	Grade Level
<b>Automotive Technology</b>	<b>V0830</b>	<b>3</b>	<b>11,12</b>

Automotive Technology allows students to perform a wide range of diagnostics, repairs, and preventative maintenance on automobiles and light trucks. Students will gain the technical knowledge and skills to obtain an entry-level position and/or pursue postsecondary education. The program's curriculum enables students to develop basic knowledge through classroom theory lessons and acquire a core set of technical skills by applying learned knowledge in hands-on shop experiences. Classroom lessons include lectures, reading and writing assignments, and demonstrations. The program's instruction includes the diagnosis and testing of malfunctions in and repair of engines, fuel, electrical, cooling, steering, suspension and brake systems. Students also prepare to obtain certifications for PA Safety Inspection; Emissions Inspection; and Refrigerant, Recovery, and Recycling.

<b>Carpentry</b>	<b>V0823</b>	<b>3</b>	<b>11,12</b>
------------------	--------------	----------	--------------

Carpentry prepares students to obtain entry-level positions in the construction or wood industries, apprenticeships in trade unions and/or to pursue enrolling in postsecondary institutions for degrees in construction, sales, or management. The program's curriculum enables students to develop a knowledge base through classroom theory lessons and acquire technical skills by applying learned knowledge in hands-on shop experiences. Classroom lessons include lectures, reading and writing assignments, demonstrations, individual and group projects and activities. The program's instruction includes units on safety, hand and power tools, blueprint reading, framing, interior and exterior finish, construction materials, measuring, estimating, and building codes. Students also study technical mathematics, residential steel-framing, and cabinetmaking.

<b>Collision Repair (Auto Body)</b>	<b>V0829</b>	<b>3</b>	<b>10, 11,12</b>
-------------------------------------	--------------	----------	------------------

Collision Repair and Refinishing prepares students to obtain an entry-level position in auto body repair and/or to pursue postsecondary education. The program's curriculum enables students to develop technical knowledge through classroom theory lessons and acquire a core set of skills by applying learned knowledge in hands-on shop experiences. Classroom lessons include lectures, reading and writing assignments, and demonstrations. The program's instruction includes units on workplace skills, safety techniques, vehicle design and function, structural and non-structural welding, estimating repair costs, collision repair procedures, and automotive painting and refinishing. Students learn these fundamental skills of repairing and refinishing damaged vehicles using the tools, products, and materials found in auto body shops and repair facilities.

<b>Computer Information Technology</b>	<b>V0835</b>	<b>3</b>	<b>10,11,12</b>
--	--------------	----------	-----------------

Computer Information Technology prepares students to obtain entry-level employment and/or provides the foundation for post-secondary success. The program's curriculum enables students to develop a basic level of knowledge through classroom theory lessons and acquire a core set of technical skills by applying learned knowledge in hands-on lab experiences. Classroom lessons include lectures, reading and writing assignments, demonstrations, and individual and group activities. The program will provide students experience in the administration and support of computer networks, which includes user and group management, server security, network sharing, operating systems, user and workstation security, help desk support, computer repair and remote access. Students will focus their study on network technologies, network devices, network management, tools and security. Computer Information Technology students will be expected to read and interpret complex instructions, technical literature and solve a variety of technical problems.

<b>Computer Programming</b>	<b>V0840</b>	<b>3</b>	<b>11,12</b>
-----------------------------	--------------	----------	--------------

Computer Programming prepares students for either entry-level employment in a variety of rapidly growing computer careers or continuing education at the post-secondary level. Students will be introduced to many computer concepts including the following: flowcharting, structured programming for the Internet, games programming, and the programming languages COBOL, SQL, and Visual Basic. Students will have the opportunity to explore a variety of programming languages, complete projects and pursue industry recognized certifications. The skills learned in this program serve as a foundation needed to pursue postsecondary degrees leading to a career as a software developer, programmer, application developer or game designer.

<b>Cosmetology</b>	<b>V0825</b>	<b>3</b>	<b>10,11,12</b>
--------------------	--------------	----------	-----------------

Cosmetology trains students to become licensed cosmetologists in specialized or full-service salons. The program's curriculum provides concentrated studies in the professional competency areas unique to the cosmetology field. Students develop a knowledge base through classroom theory lessons and perfect their clinical skills by applying learned knowledge in the program's student-operated salon. Classroom lessons include lectures, reading and writing assignments, demonstrations, individual and group projects, as well as other activities. The program's instruction includes units on shampooing, conditioning, cutting and styling hair; chemical texture services and hair coloring techniques; and providing facials, manicures and pedicures. Personal safety, professionalism, and the sanitation and disinfection of equipment and facilities are emphasized. Students also study business management with a focus on managing a salon.

<b>Culinary Arts</b>	<b>V0826</b>	<b>3</b>	<b>11,12</b>
----------------------	--------------	----------	--------------

Culinary Arts prepares students to obtain entry-level employment related to institutional, commercial, or independently owned food establishments and other food industry occupations and/or provides a foundation for students who pursue acceptance into a post secondary culinary program. The program's curriculum enables students to develop knowledge through classroom theory lessons and acquire culinary skills by applying learned knowledge in the program's fully equipped commercial kitchen and dining room. Classroom lessons include lectures, reading and writing assignments, demonstrations, and individual and group projects and activities. The program's instruction includes units on use and care of utensils and food preparation equipment; safety; sanitation procedures, nutrition basics, and recipes preparation. Students develop and practice skills through hands-on activities and experiences related to planning, selecting, preparing, and serving of quality food and food products.

<b>Diesel Technology</b>	<b>V0831</b>	<b>3</b>	<b>11,12</b>
--------------------------	--------------	----------	--------------

Diesel Technology prepares students to obtain entry-level employment and/or to pursue postsecondary education. The program's curriculum enables the students to develop basic knowledge through classroom theory lessons and acquire a core set of technical skills by applying learned knowledge in hands-on shop experiences. Classroom lessons include lectures, reading and writing assignments, and demonstrations. The program's instruction includes units on safety, diesel engine mechanics, suspension and steering, brake systems, electrical and electronic systems, and preventive maintenance. Students develop skills for troubleshooting problems; disassembling, rebuilding, and reassembling engines; applying electrical principles to service electrical/electronic systems; inspecting, repairing or replacing various systems' components; and performing preventive maintenance on medium/heavy vehicle systems.

<b>Early Childhood Education</b>	<b>V0824</b>	<b>3</b>	<b>11,12</b>
----------------------------------	--------------	----------	--------------

Early Childhood Education allows students to obtain a variety of entry-level childcare occupations in day care centers and preschools and/or provides a foundation for students who pursue a postsecondary early childhood education program. The program's curriculum enables students to develop a knowledge base through classroom theory lessons and acquire care giving, teaching, and managing skills by applying learned knowledge in the program's fully equipped preschool. Classroom lessons include lectures, reading and writing assignments, demonstrations, and individual and group projects and activities. Instruction includes units on growth and development; nutrition; program play activities; child abuse and neglect; learning experiences for children; and laws, regulations, and policies relating to childcare services.

<b>Electrical Occupations</b>	<b>V0805</b>	<b>3</b>	<b>11,12</b>
-------------------------------	--------------	----------	--------------

Electrical Occupations prepares students to apply technical knowledge and skills necessary to install, operate, maintain and repair electrically-energized residential, commercial and industrial systems, and DC and AC motors, controls and electrical distribution panels. Instruction emphasizes practical application of circuit diagrams and use of electrical codes and includes blueprint reading, sketching and other subjects essential for employment in the electrical occupations. Reading and interpretation of commercial and residential construction wiring codes and specifications, installation and maintenance of wiring, service and distribution networks within large construction complexes are also critical components of the program.

**Health Care Careers** **V0801** **3** **11,12**

Health Care Careers prepares students to obtain entry-level positions in the health field and/or to pursue postsecondary education. The program provides students with health career exploration activities, instruction of basic skills, which are fundamental to all areas of health care, and clinical experiences. Students develop health care knowledge through classroom theory lessons and practice health care skills in a laboratory setting prior to their clinical assignments. Classroom lessons include lectures, reading and writing assignments, demonstrations, and individual and group projects. The program's core instruction includes units on medical terminology, anatomy and physiology, basic clinical skills, aseptic techniques, OSHA regulations, and infection control.

**Innovation and Entrepreneurial Development** **V0827** **3** **11,12**

Innovation and Entrepreneurial Development enables students to learn first-hand about the risks and rewards of starting and operating a small business. The program's curriculum provides students with knowledge and skills of fundamental business concepts and entrepreneurship. PowerPoint presentations, reading and writing assignments as well as hands-on activities provide students with an overview of the steps and considerations involved in turning an idea into a business, identifying a passion or hobby that can provide a product or service, researching the market, and weighing the risks of starting a small business. The program's core instruction includes units on economic principles, business plans, business related math skills, technology skills and sales along with marketing techniques. Students engage in various business activities related to each planned unit.

**Logistics-Material & Supply Chain Mgmt** **V0841** **3** **11,12**

Logistics and Materials Management is designed to prepare individuals for entry level employment in this industry. Students will learn and perform logistical functions associated with receiving, storing, shipping goods, and the various systems and record keeping for supply chain management.

Students with good attention to detail who enjoy a fast-paced, hands-on, physical workplace would be successful in this program. The curriculum provides instruction in the use of powered material, handling equipment, and OSHA safety and ergonomics. Supply chain management, automated inventory control systems, purchasing, receiving, order selections, packaging, and shipping methods are presented. Academic subjects include business mathematics and communications. The course includes job retention skills and customer relations.

**Precision Production Metals** **V0833** **3** **10,11,12**

Precision Production Metals prepares students to obtain entry-level employment in the machine tool industry, apprenticeships sponsored by unions or manufacturers, and/or to pursue enrollment in postsecondary programs. The program's curriculum enables students to develop a knowledge base through classroom theory lessons and acquire technical skills by applying learned knowledge in hands-on shop experiences. Classroom lessons include lectures, reading and writing assignments, and demonstrations. The program incorporates national skills standards developed by the National Institute of Metalworking Skills (NIMS). Instruction includes units on bench work and the operation of lathes, power saws, grinders, milling machines, drills and computer operated equipment. Students also study the use of precision measuring instruments such as layout tools, micrometers and gauges as well as blueprint reading. Emphasis is on machining parts for the NIMS performance exams.

**Welding** **V0834** **3** **10,11,12**

Welding prepares students to obtain entry-level employment as a welder or in related positions in all types of small and large companies and/or to pursue enrolling in postsecondary programs such as welding engineering or metallurgy. The program's curriculum enables students to gain a knowledge base through classroom theory lessons. Program activities allow students to put their classroom learning into hands-on practice of technical skills. Classroom lessons include lectures, reading and writing assignments, and demonstrations. The program's instruction includes units on safety practices, gas cutting and welding, arc welding in various positions, and types and uses of electrodes and welding rods. Students also learn to fabricate and join metal parts according to diagrams, blueprints, and specifications.

For more information on Mercer County Career Center programs and services, see your guidance counselor or visit their website at <https://mercerccc.org>

## Lakeview Middle-High School Course Offerings

<p><b><u>Applied Arts</u></b>            Fundamentals of Art (Level 1)            Intermediate Art (Level 2)            Studio Art (Level 3)            Advanced Studio Art (Level 4)</p> <p><b><u>Business &amp; Computers</u></b> *can be applied towards computer requirements</p> <p>Accounting I, II *            Business Web Design *            Internet and Multimedia (Required) *            Video Editing &amp; Production *            Intro to Business &amp; Marketing            Personal Financial Investments            Mass Communication Process (CHS) *            Intro to Comp Programming Python (CHS)* +            Digital Photography I, II</p> <p><b><u>Family &amp; Consumer Science</u></b>            FCS I            Culinary Arts II            Culinary Arts III            Living on Your Own</p> <p><b><u>Language Arts</u></b>            English 9, 10, 11, 12 (Keystone Tested 10<sup>th</sup>)            Honors English 9, 10, 12 (Keystone Tested 10<sup>th</sup>)            Honors English 11/AP Literature            AP Language and Composition            Journalism I, II, III, IV (Newspaper and Yearbook)            Theatre Arts I, II, III, IV            Greek Mythology            Literature Through Film            Holocaust Literature</p>	<p><b><u>Mathematics</u></b>            Algebra I (Keystone Tested) w/lab (as needed)            Geometry w/lab (as needed)            Algebra II            Pre-Calculus (CHS)            Advanced Math            Calculus I (CHS)            Calculus II (AP/CHS+)            Statistics (CHS)            Practical Math            Applied Mathematics</p> <p><b><u>Music/Performing Arts</u></b>            Band            Jazz Band            Chorus            Chamber Singers            History of Rock n Roll            Guitar</p> <p><b><u>Physical Education</u></b>            Physical Education 9            Physical Education 10-12            High Impact PE 10-12            Weightlifting            Team Builders and Total Wellness</p> <p><b><u>Science</u></b>            Physical Science            Biology (Keystone Tested)            Chemistry I w/lab            Advanced Chem w/lab/(CHS)            Physics w/lab            Forensic Science            Environmental Science            Human Anatomy &amp; Physiology w/lab (CHS)            Wildlife Biology &amp; Ecology            Astro Physics (Astronomy)            Issues in Science</p>	<p><b><u>Social Studies</u></b>            US History I            US History II            World Cultures            Economics            Law            Applied Psychology            Psychology/ (CHS Psychology)            Western European History            World War II            History Through Film            American Political Process (CHS)            International Politics (CHS)</p> <p><b><u>Technology/Industrial Arts (each of these can be applied toward computer requirements)</u></b>            Intro to Manufacturing &amp; Design            Advanced Manufacturing I, II            Manufacturing Enterprise            STEM/CADD</p> <p><b><u>Unified Block</u></b>  <b>Grade 9 (Full Year)</b>            Health            Family Living            Public Speaking            Careers</p> <p><b><u>World Languages</u></b>            Spanish I, II, III, Spanish IV (AP Spanish)            French I, II, III, French IV (CHS French)</p> <p><b><u>Internship/Externship</u></b>            Internships:                Elementary School                Tutoring/Writing Center for MS/HS            Externships:            Must be career focused and be approved by counselor and academic principal</p>
---	--	--

+Pending College in High school approval



## LMHS MATH PROGRESSIONS



- Practical Math or Applied Math can be taken once TWO MATH CREDITS have been earned, in 11th or 12th grade.
- Students may double up in Algebra II and Geometry with teacher recommendation.
- Statistics can be taken junior or senior year as long as the student had >83% in Algebra II.

## LAKEVIEW HIGH SCHOOL COURSE DESCRIPTIONS

### LANGUAGE ARTS DEPARTMENT

Required Courses	Course Number	Credits	Grade Level
<b>English 9</b>	<b>1100</b>	<b>1</b>	<b>9</b>
<p>This course is designed to present students with the opportunity to practice all of the language arts in a variety of contexts and for a variety of audiences through a survey of literature. The course is designed to take a multi-genre approach by exploring classic and contemporary literature with a focus on providing foundational skills to read, appreciate, and analyze literature. The student will also be required to do research-based projects and presentations, including formal research papers</p>			
<b>Honors English 9 - Weighted Level III</b>	<b>1150</b>	<b>1</b>	<b>9</b>
<p>This course is a survey of literature; while the core curriculum is similar to English 9, honors classes offer a more rigorous pace, additional portions of literature, special studies, and connections to historical events, science, and culture. Students need to be motivated self-starters who can work well independently. In order to be considered for Honors 9, students will be assessed on a written skills test paired with the student's work ethic during class, writing skills, and teachers' recommendations. Students meeting the aforementioned requirements will be given the required summer reading assignments. <b>Students enrolled in this course are expected to fully complete the summer requirements. Failure to do so may have a profound impact on the course grade for the first 9 weeks, but will not result in a change in English placement, as it is scheduled with parent permission and acknowledgement that the course will not be dropped due to non-completion of summer requirements.</b></p>			
<b>English 10</b>	<b>1200</b>	<b>1</b>	<b>10</b>
<p>This course provides an in-depth study of the great works of American literature. Classic and Contemporary pieces from a variety of genres—short stories, novels, poetry, and dramas, as well as essays, biographies and autobiographies, and Seminal American pieces—will be studied. The Keystone Literature exam will be administered to all students at the conclusion of this course. The student will also be required to do research-based projects and presentations, including formal research papers.</p>			
<b>Honors English 10 - Weighted Level III</b>	<b>1250</b>	<b>1</b>	<b>10</b>
<p>This course will also be an exploration of American literature; while the majority of the core curriculum will be the same, honors students will explore some pieces at greater depth, at a more rigorous reading level, or more challenging texts. The Keystone Literature exam will be administered to all students at the conclusion of this course. (Offered only to students meeting pre-determined guidelines).</p> <p><b>Testing data, teacher recommendation, and student performance prerequisites must be met to enter this course.</b> Students meeting entrance criteria will then be given the required summer reading assignments. <b>Students enrolled in this course are expected to fully complete the summer requirements. Failure to do so may have a profound impact on the course grade for the first 9 weeks, but will not result in a change in English placement, as it is scheduled with parent permission and acknowledgement that the course will not be dropped due to non-completion of summer requirements.</b></p>			
<b>English 11</b>	<b>1300</b>	<b>1</b>	<b>11</b>
<p>This course is designed to explore world literature providing students with exposure to perspectives and cultures outside of their own, as well as to learn of literary techniques, structures, and themes reflective of the human experience from a global context. The student will also be required to do research-based projects and presentations, including formal research papers. This course is designed primarily for students planning to continue academic work beyond high school.</p>			
<b>Honors English 11/AP Literature and Composition - Weighted Level III</b>	<b>1350</b>	<b>1</b>	<b>11</b>
<p>AP English Literature and Composition is an introductory college-level literary analysis course. Students cultivate their understanding of literature through reading and analyzing texts as they explore concepts like character, setting, structure, perspective, figurative language, and literary analysis in the context of literary works. This rigorous college-level course is offered to highly motivated 11th grade students who are interested in the careful reading and critical analysis of imaginative literature. While the core curriculum will have commonalities with English 11, AP students will read some pieces of greater complexity, be introduced to literary criticism approaches, and analyze texts at a greater depth more independently. (Offered only to students meeting pre-determined guidelines). This class requires a minimum of 10 hours of work per week and is reading and writing intensive. <b>Testing data, teacher recommendation, and student performance prerequisites must be met to enter this course.</b> Students meeting the aforementioned requirements will then be given the required summer reading assignments. <b>Students enrolled in this course are expected to fully complete the summer requirements. Failure to do</b></p>			

LANGUAGE ARTS DEPARTMENT, cont.

Required Courses	Course Number	Credits	Grade Level
------------------	---------------	---------	-------------

so may have a profound impact on the course grade for the first 9 weeks, but will not result in a change in English placement, as it is scheduled with parent permission and acknowledgement that the course will not be dropped due to non-completion of summer requirements. Students will be strongly encouraged to take the AP English Literature and Composition Exam at the end of the course.

<b>English 12</b>	<b>1400</b>	<b>1</b>	<b>12</b>
-------------------	-------------	----------	-----------

This is a study of the great works of British Literature, both classic and contemporary. Students will study representational works in various genres; short story, novel, drama, and poetry. This course is designed primarily for students planning to continue academic work beyond high school. The student will also be required to do research-based projects and presentations, including formal research papers.

<b>Honors English 12 - Weighted Level III</b>	<b>1450</b>	<b>1</b>	<b>12</b>
---	-------------	----------	-----------

This course will be an in-depth exploration of British Literature and incorporate intensive writing, close reading, oral presentation, research, and critical analysis to develop collegiate level skills. Strong performance will hopefully lead to college credit or college course exemption and to increased performance on the SAT. Research, analysis and critique will be highlighted. Students will address topics, share ideas, gather information, develop thoughts, organize details, and control language. The goals of each student should be to develop and expand on effective personal writing style, to learn to read a variety of literature critically and analytically, and to learn independent learning strategies. **Testing data, teacher recommendation, and student performance prerequisites must be met to enter this course.** Students meeting the requirements will then be given the required summer reading assignments. **Students enrolled in this course are expected to fully complete the summer requirements. Failure to do so may have a profound impact on the course grade for the first 9 weeks, but will not result in a change in English placement, as it is scheduled with parent permission and acknowledgement that the course will not be dropped due to non-completion of summer requirements.**

Elective Courses	Course Number	Credits	Grade Level
------------------	---------------	---------	-------------

<b>AP Language and Composition - Weighted Level III</b>	<b>1455</b>	<b>1</b>	<b>11, 12</b>
---	-------------	----------	---------------

This rigorous college-level course is offered to highly motivated 11th and 12th graders who are interested in learning how to read critically and do rhetorical and stylistic analysis in both fiction and non-fiction. It will focus on expository analytical and argumentative compositions, active reading and response, research and use of primary and secondary sources, developing your own writing style and AP exam preparation. The main goal of this course is to create strong writers who will have the skills to write effectively in their college courses and in their personal and professional lives. Students will keep a writing log over the course of the year to document their improvement and to engage themselves in thinking about their writing. This class requires a minimum of 10 hours of work per week and is reading and writing intensive. **There is also required summer reading. Students will be strongly encouraged to take the AP English Language and Composition exam at the end of the course. Testing data, teacher recommendation, and student performance prerequisites must be met to enter this course.**

<b>Journalism I (Newspaper/Yearbook)</b>	<b>1470</b>	<b>1</b>	<b>9, 10, 11, 12</b>
--	-------------	----------	----------------------

Lakeviewer/Log is a publications class designed as an elective for creative and self-motivated students. The staff requires students with competent skills in at least one of the following areas: journalistic writing, investigating, computers, scanners, photography, and advertising. Submissions are graded. Students create the yearbook, school newspaper, digital magazine, as well as other publications. **Expect to submit a writing or photography sample or to demonstrate computer skills. Instructor permission required.**

<b>Journalism I, III &amp; IVI (Newspaper/Yearbook)</b>	<b>1475/1480/1485</b>	<b>1</b>	<b>10, 11, 12</b>
---	-----------------------	----------	-------------------

Level 2-4 students will mentor younger newspaper/yearbook staff and will be eligible to hold leadership positions. Submissions are graded. **Instructor permission required.**

<b>Theatre Arts I/II</b>	<b>1820/1822</b>	<b>1</b>	<b>9, 10, 11, 12</b>
--------------------------	------------------	----------	----------------------

The "Introduction to Theater" class will cover basics of staging, acting, set design, lighting, theatrical movements and popular styles of drama. Roles within the theater—such as director, actor, set designer, lighting engineer and prop/stage manager—will all be explored. We will also read and/or view famous plays to better acquaint ourselves with popular works. Active class participation is a must! Upon completion of this course, you will know the "lingo" of the theater to help you better understand and appreciate "the stage."

## LANGUAGE ARTS DEPARTMENT. cont.

<b>Elective Courses</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Theatre Arts III/IV</b>	<b>1825/1827</b>	<b>1</b>	<b>11, 12</b>
<p>Theatre helps in multiple aspects of life, including public speaking and literary analysis. This course will study the range of experiences related to the art of acting and heighten the love of acting and anything theatre! Through lecture, discussion, demonstration and film, students will experience and explore acting. Students in this course will study, write, research, critique, create, design, perform and participate in a variety of theatre-based learning experiences. Students will be involved with self and peer evaluations in oral critiques and written forms through assignments and will prepare for final project performances. Prerequisite: Theatre Arts I &amp; II</p>			
<b>Greek Mythology</b>	<b>1840</b>	<b>.5</b>	<b>10, 11, 12</b>
<p>This course aims to help students acquire substantial familiarity with the principal, classical myths and the ways those myths are represented in literature and popular culture. After taking this course, you will be able to identify the major (and many of the minor) characters from Greek mythology. The student will be able to describe the ancient literary sources for classical mythology; explain the use of the most influential theories about and the approaches to mythology; describe and analyze, in writing, mythological themes and structures in literature, art, and films; compare different myths, or different versions of the same myth, and discuss common and different elements; and relate the knowledge you have obtained throughout this course to your own experience, including an ability to create your own myths and recognize mythic elements in the world around you.</p>			
<b>Literature Through Film</b>	<b>1841</b>	<b>.5</b>	<b>11, 12</b>
<p>Literature Through Film is a course offered to juniors and seniors. A high level of reading texts, film journal articles and film reviews will occur. Students will be required to be active participants in film viewings and discussion. Student writings will include their own reviews of films, analysis of the dramatic, cinematic, narrative aspects of films, and comparisons of literary works and their cinematic adaptations. This course will also implement technology, research of history, the use of Socratic seminars after film viewing, and student presentations.</p>			
<b>Holocaust Literature</b>	<b>1848</b>	<b>.5</b>	<b>10, 11, 12</b>
<p>An exploration of literature that focuses on the voices of resistance, victims, and survivors. The literature will explore the breadth of literature—literary nonfiction, historical fiction, primary documents, essays, journals, and poetry. The goal of the course is to develop empathy, stronger literary analysis, and the role of literature as an art to explore the human narrative.</p>			

## SOCIAL STUDIES DEPARTMENT

<b>Required Courses</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>US History I</b>	<b>2100</b>	<b>1</b>	<b>9</b>
<p>A study of the development of the United States from the English Colonial Period to Post-Civil War America will be covered. Major topics of study include the 13 English Colonies, American Revolution, fundamentals of U.S. Government under the U.S. Constitution, Westward U.S. Expansion, Pre-Civil War America, and the American Civil War.</p>			
<b>US History II</b>	<b>2200</b>	<b>1</b>	<b>10</b>
<p>This course will study U.S. History from the Progressive Era to Present Day. History, government, economics, sociological development of the United States will be covered. In-depth studies of the 1920's, the depression, FDR's New Deal, and the Cold War. The major wars and modern day change will be featured in this course.</p>			
<b>World Cultures</b>	<b>2300</b>	<b>1</b>	<b>11, (12 MCCC only)</b>
<p>This first part of this course will have components on regions of Asia, India and Africa. People, customs, religions, social conditions and economics of each of these regions will be studied. The second portion of the course will focus on regions in the Middle East, North and South America, Europe, and the Commonwealth of Independent States (former Soviet Union)</p>			
<b>Economics</b>	<b>2400</b>	<b>.5</b>	<b>12</b>
<p>The behavior of individuals and institutions engaged in production, exchange, and consumption of goods and services will be studied. Economic systems, markets, scarcity and choice, supply and demand, work and earnings are topics of study.</p>			

### SOCIAL STUDIES DEPARTMENT, cont.

<b>Elective Courses</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Law</b> This course provides a top down view on the American legal system. The course begins with the historical foundations of the American legal system and includes studies in Constitutional, Criminal, and Civil law.	<b>2430</b>	<b>.5</b>	<b>10, 11, 12</b>
<b>World War II</b> This course examines the history of World War II from 1933 to 1945. It will take an in-depth investigation of the significant individuals associated with the war, the conflicts and battles of the war, and the eventual outcome and consequences of the war. Students will also participate in a comprehensive analysis of the lasting global impacts of the war up to the present time.	<b>2445</b>	<b>.5</b>	<b>10, 11, 12</b>
<b>History Through Film</b> History Through Film is a course in which students use films as historical documents or resources. The course will challenge students to critically analyze selected films for a deeper understanding of various people, periods, and events in history. In doing so, students are expected to be actively engaged thinkers while viewing the films, contemplating the films, and discussing the films. Through their studies, students will hone their critical thinking skills. This course will be writing intensive.	<b>2450</b>	<b>.5</b>	<b>10, 11, 12</b>
<b>Western European History</b> This course is designed for students who have completed World Cultures and want a more in depth discussion of Western European History. Topics may include Ancient Greece and Rome, the Middle Ages, the Renaissance, the Enlightenment and the French Revolution.	<b>2460</b>	<b>.5</b>	<b>12</b>
<b>Psychology (CHS) Weighted level III</b> This course is to provide a general introduction to the area of psychology to prepare students for an entry-level college course.	<b>2470</b>	<b>1</b>	<b>11, 12</b>
<b>Applied Psychology</b> This course is designed to help students apply psychological principles to their lives. Topics include, but are not limited to Sleep, Memory, Stress Management, and Life Planning.	<b>2480</b>	<b>.5</b>	<b>11, 12</b>
<b>American Politics (CHS) Weighted level III</b> This is an introductory college level course in American politics. The purpose of the course is to teach students both about the American political system and about broad concepts social scientists use to study politics. Offered in odd years. <b>Prerequisite: Algebra 1</b>	<b>2900</b>	<b>1</b>	<b>11, 12</b>
<b>International Politics (CHS) - Weighted level III</b> International Relations is the study of how states interact with each other. This course builds a working knowledge of our field, introducing the background, theoretical, and empirical tools necessary to understand international relations today. Students will learn about important findings in a variety of subfields, including war, international political economy, institutions, nuclear proliferation, and terrorism. Students will also solve problem sets and work with common international relations datasets to obtain a working understanding of the discipline's methodological foundations. Offered even years. <b>Prerequisite: Algebra 1.</b>	<b>2910</b>	<b>1</b>	<b>11, 12</b>

### MATHEMATICS DEPARTMENT

<b>Required Courses</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Algebra 1</b> Students in this required course will study the vocabulary and principles of algebra including number sets, operations of polynomials, linear equations and inequalities, functions graphing, radicals, quadratic equations and analysis of verbal problems. Algebra I is to prepare a foundation for the study of Geometry, Algebra II, and Pre-calculus. <b>This is a Keystone Tested Course.</b>	<b>3100</b>	<b>1</b>	<b>9</b>
<b>Geometry</b> This course is required and emphasizes the further development of skills, techniques and connections of geometric concepts. Topics include but are not limited to: foundations of geometry, proofs and logic, lines, transformations, probability, polygons, similarity, 2-D and 3-D measurement, circles and basic trigonometry. <b>Prerequisite: Algebra I.</b>	<b>3200</b>	<b>1</b>	<b>10</b>

**MATHEMATICS DEPARTMENT. cont.**

<b>Required Courses</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Math Lab</b>	<b>3110</b>	<b>.5</b>	<b>9, 10</b>
<p>This course runs concurrently with Algebra 1 and Geometry, where students will receive intervention, support and practice in the study of mathematics at their level. Math lab will meet every other day on an A/B schedule. Enrollment will be determined by the math team together with Guidance and Administration and will be a required course when deemed necessary by the team.</p>			
<b>Elective Courses</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Algebra II</b>	<b>3120</b>	<b>1</b>	<b>10, 11, 12</b>
<p>Algebra II fulfills the requirements of two years of algebra for many colleges and chosen careers. It provides the foundation of future mathematical studies. Algebra II is taught as an extension of Algebra I and following completion of Geometry. It includes the operations of polynomials, the study and graphing of linear and quadratic equations and inequalities, exponents, radicals and logarithms, and complex numbers. <b>Prerequisite: "C" or higher in Algebra I, Geometry</b></p>			
<b>Applied Mathematics</b>	<b>3205</b>	<b>1</b>	<b>11, 12</b>
<p>An interactive, work-place centered approach to Algebra and Geometry concepts. This course is an elective math for the student who wants to learn more about real-world application of math concepts that he/she will likely use in the workforce. It can be a stand-alone credit or taken in conjunction with other math courses.. <b>Prerequisites: Algebra I and Geometry</b></p>			
<b>Advanced Math - Weighted level II</b>	<b>3300</b>	<b>1</b>	<b>11, 12</b>
<p>Functions, trigonometry functions, logarithmic functions, conic sections, sequences, probability and statistics are some of the areas that will be studied. This class is designed to prepare the student for college level mathematics. <b>Prerequisite: "C" or higher in Algebra II.</b></p>			
<b>Practical Math</b>	<b>3320</b>	<b>1</b>	<b>11, 12</b>
<p>In Practical Math students learn about the many practical applications of math in everyday life. Topics of study in this elective course include statistics, probability, statistical graphs, geometry, finance, budgeting, and mathematical modeling. Project units allow students to apply and extend their math skills for problem solving. <b>Prerequisite: Algebra I and Geometry</b></p>			
<b>Pre-Calc (CHS) - Weighted level III</b>	<b>3400</b>	<b>1</b>	<b>10, 11, 12</b>
<p>A study of elementary functions, their graphs, and applications, including polynomial, rational, algebraic, exponential, logarithmic, and trigonometric functions. <b>Prerequisite: "B" or higher in Algebra II.</b></p>			
<b>Calculus I (CHS) - Weighted level III</b>	<b>3422</b>	<b>1</b>	<b>11, 12</b>
<p>This course is an introduction to differential and integral calculus: the study of change. We study the calculus of one variable. Topics found in this course include (but are not limited to) functions, limits, continuity, derivatives, Implicit differentiation, related rates, extrema, and an introduction to integration with applications to area and volume. <b>Prerequisite: "B" or higher in Pre-Calc (CHS).</b></p>			
<b>AP Calculus II (CHS*) - Weighted level III</b>	<b>3425</b>	<b>1</b>	<b>12</b>
<p>Calculus II is designed to be an extension of the Calculus I course. It is intended for advanced math students who have completed courses through CHS Calc. 1 with a high degree of success. Topics covered will include an initial review of prerequisite skills and concepts, differentiation and integration of transcendental functions, advanced integration techniques, and various applications thereof. <b>Prerequisite is "B" or higher in CHS Calculus 1</b></p>			
<b>Statistics (CHS) - Weighted level III</b>	<b>3450</b>	<b>1</b>	<b>11, 12</b>
<p>This course teaches methods and terminologies of descriptive and inferential statistics. Students who complete this course will be able to conduct their own analyses of standard one-sample or two-sample data sets, follow statistical reasoning, and read statistical reports with understanding. Introductory topics in linear regression, analysis of variance and contingency table analysis also will be covered. <b>Prerequisite: "B" or higher in Algebra II</b></p>			

## SCIENCE DEPARTMENT

<b>Required Courses</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Physical Science</b> The first portion of this course is an introduction to the concepts in Chemistry. Students will study measurement, observation of properties of matter, reactions among substances, and the basic scientific theories which explain the behavior of matter. Throughout the course, students will use technology to organize and communicate their observations. Problem-solving skills are used in applying mathematical formulas to a variety of practical situations and in analyzing data from experiments. Students will spend considerable time in the laboratory learning concepts by experience. The second section of this course is an introduction to the concepts in Physics. Students will study the basics of the Physical world, including motion of objects according to Newton's Laws of Motion, and investigate energy in the forms of Heat, Light & Sound. Students will use technology to organize & communicate their observations. Problem-solving skills are used in applying mathematical formulas to a variety of practical situations & in analyzing data from experiments. Students will spend considerable time in the laboratory learning concepts by experience.	<b>4100</b>	<b>1</b>	<b>9</b>
<b>Biology</b> All students will take Biology as part of the state and district graduation requirements. Concepts are developed through laboratory investigations and discussion. The major ideas covered are energy relationships, ecological relationships, reproduction and development and patterns of inheritance. Interactions among plants and animals and their environments are also investigated, as well as energy relationships, ecological relationships, reproduction and development and patterns of inheritance. <b>Keystone Tested Course.</b>	<b>4200</b>	<b>1</b>	<b>10</b>
<b>Elective Courses</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Chemistry I w/lab - Weighted level II</b> Academic Chemistry is an elective advanced science course for college preparatory students who are pursuing careers in science, health, engineering, architecture, math, education and many other fields. Concepts of chemical science are developed through academic and laboratory exercises. <b>Prerequisite/Recommendation: "C" or better in Algebra II or enrolled currently in Algebra II.</b>	<b>4300</b>	<b>1.5</b>	<b>10, 11, 12</b>
<b>Advanced Chemistry (CHS) w/lab - Weighted level III</b> Advanced Chemistry is the first half of a two-term, college-level introduction to general chemistry. Topics covered include atomic theory, stoichiometry, atomic and molecular structure, molarity, gases and kinetic theory, thermochemistry, electronic structure, the periodic table, relationships between phases, ionic solutions and acid/base theories, redox reactions, rates of reaction, chemical equilibria, and thermodynamics. Problem solving and laboratory experiences are a functional part of this course. Homework should be expected most evenings. This course requires laboratory sessions and exams on the Pitt campus. Transportation will be provided. <b>Prerequisite: High school Chemistry I</b>	<b>4320</b>	<b>1.5</b>	<b>11, 12</b>
<b>Advanced Biology (CHS) - Weighted level III</b> The goal of this course is to provide students with a foundation in biology. This course focuses on a review of chemistry as it applies to biology, the structure and function of macromolecules, the basic structure of cells, energy and cellular respiration, introduction to genetics and molecular biology, and development of dissection skills. While these topics are covered in high school Biology courses, Preparation for Biology delves deeper and applies chemistry to achieve a more complete understanding of Biology. This, combined with practicing critical thinking skills, and primary literature and data analyses, prepares students for the rigors of the Foundations of Biology series. <b>Prerequisite: A or B in Biology and Chemistry or instructor permission, passed Biology Keystone.</b>	<b>4400</b>	<b>1</b>	<b>11, 12</b>
<b>Physics w/lab - Weighted level III</b> Physics is an elective laboratory science. Topics to be covered during the course include motion of objects, classical mechanics (Galileo and Newton), momentum and energy in the form of light, sound, heat, and electricity. It is advisable that the student possess a strong mathematical background. Students should elect this course if they are interested in attending college or working in a science-related occupation. <b>Prerequisite/Recommendation: "C" or better in Chemistry. Successful completion of CHS Pre-Calc or Adv. Math.</b>	<b>4420</b>	<b>1.5</b>	<b>11, 12</b>

**SCIENCE DEPARTMENT. cont.**

<b>Elective Courses</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Forensic Science</b> This course is an interdisciplinary class involving Biology, Anatomy, Chemistry, Physics, and Earth Science with an emphasis in complex reasoning and critical thinking. In addition, students most incorporate use of technology, communication skills, language arts, art, mathematics, and social studies. Topics include introduction to forensics (observation, forensic history, careers, crime scene investigations), physical evidence, (glass, sand, soil), DNA, documentation (handwriting, paper and ink analysis, fraud), and biology (osteology, odontology, archeology, botany, and entomology), toxicology (drugs, alcohol), trace evidence (hair, fiber), and serology (blood typing, genetics, characteristics and differentiations, spatter patterns). This will be a semester course. <b>Prerequisite: Biology</b>	<b>4500</b>	<b>.5</b>	<b>10, 11, 12</b>
<b>Environmental Science</b> Environmental Science is an activity-based course designed to help students understand the interactions between the different elements of the environment. The course will also make the students aware of environmental problems on both local and global levels. The activities will include conventional laboratory exercise, workbook exercises, and projects. Several activities such as water quality testing will be performed both in the lab and outdoors. The course will deal with environmental history, science systems, biodiversity, climate, ecology, agriculture, use of resources, types of pollution and the disposal of waste. Because environmental science is an integrated science, students must have satisfactorily completed a Biology course. Students will be evaluated through the use of examinations, lab work, lab behavior, written lab reports, and projects. This will be a semester course. <b>Prerequisite: Biology</b>	<b>4510</b>	<b>.5</b>	<b>10, 11, 12</b>
<b>Human Anatomy &amp; Physiology w/lab (CHS) - Weighted level III</b> This course is designed to provide students with an in-depth background in human anatomy (structure) and physiology (function). It is strongly recommended for students who have an interest in nursing, or other health careers. Emphasis is placed on skeletal, muscular, nervous, endocrine, digestive, respiratory, reproductive, cardiovascular, urinary, and immune systems. Students must be able to work well in a supervised lab. To elect this course, students must have completed Biology, and should have completed Chemistry. This is a full year class. <b>Students must have completed Biology and passed the Biology Keystone Exam. It is highly suggested that all students in this course purchase an additional consumable resource; Kaplan Medical Anatomy Coloring Book 6th Edition, for a cost of \$30. This is optional, but would be a great additional resource to benefit the student.</b>	<b>4520</b>	<b>1.5</b>	<b>11, 12</b>
<b>Ecology/Wildlife Biology</b> Ecology/Wildlife Biology is the study of the interactions between organisms and their environment. This course provides a background in the fundamental principles of ecological science, including concepts of natural selection, population and community ecology, biodiversity, and sustainability. Students will acquire an "ecological literacy" about how the natural world works, and develop an "understanding" of how scientific methods are used to construct ecological knowledge. During this course we will also be studying the wildlife of Pennsylvania. The Wildlife course of this class will be dedicated to the study of the organisms that live and thrive in Pennsylvania. <b>Prerequisite: Biology</b>	<b>4530</b>	<b>1</b>	<b>10, 11, 12</b>
<b>Astro-Physics (Astronomy)</b> Astro-Physics is a course designed to introduce students to the fascinating world of astronomy. It is for students who desire to learn about phenomena beyond the scope of the earth using a minimal amount of mathematics. The topics that may be included, but are not limited to include space flight, the solar system, black holes, stars, comets, asteroids, galaxies, cosmology, and the universe. <b>Prerequisite: Biology</b>	<b>4550</b>	<b>.5</b>	<b>10, 11, 12</b>
<b>Issues in Science</b> This will be a student driven course where the class explores current topics that may be controversial in the scientific community. Students will research a variety of topics to gain a deeper understanding of the topic while gathering unbiased facts. Once the students have gathered their information, there will be a classroom discussion on the topic where students can voice their opinions. The goal of this course is for students to develop skills of uncovering unbiased facts through research and being able to make their own conclusions based on their findings. Students will take the information they have researched and apply it to the real world situations to make informed decisions on issues that will affect the future. <b>Prerequisite: Prerequisite: Biology &amp; English 10, Teacher Recommendation.</b>	<b>4560</b>	<b>.5</b>	<b>11, 12</b>

## WORLD LANGUAGE DEPARTMENT

<b>Course</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Spanish I</b>	<b>5210</b>	<b>1</b>	<b>9, 10, 11, 12</b>
<b>Spanish II</b>	<b>5220</b>	<b>1</b>	<b>10, 11, 12</b>
<b>Spanish III</b>	<b>5230</b>	<b>1</b>	<b>11, 12</b>
<b>AP Spanish IV - Weighted level III</b>	<b>5240</b>	<b>1</b>	<b>12</b>

The purpose of these courses is to gain reasonable knowledge in speaking, reading, writing and understanding the Spanish language. The student will also learn about Spanish culture, history, art, music and literature. Spanish is useful to both students who are planning to attend college as well as to those who are not. Without a college education, Spanish is very useful in such careers as bilingual secretaries, social work and many others. In addition, the knowledge of Spanish is helpful in our own country, which has millions of Spanish-speaking people. Along with a college education, Spanish is useful in numerous international careers such as translators, interpreters, international business and government as well as many others. The student may advance to Spanish II, III, IV. **Prerequisite/Recommendation for Spanish I: "C" or better in 8<sup>th</sup> grade English.**

<b>French 1</b>	<b>5310</b>	<b>1</b>	<b>9, 10, 11, 12</b>
<b>French II</b>	<b>5320</b>	<b>1</b>	<b>10, 11, 12</b>
<b>French III</b>	<b>5330</b>	<b>1</b>	<b>11, 12</b>
<b>French IV/CHS - Weighted level III</b>	<b>5340</b>	<b>1</b>	<b>12</b>

The purpose of these courses is to gain reasonable knowledge in speaking, writing, reading, and understanding the French language. The student will also learn about French culture, history, art, music and literature. Textbook study is enriched through the use of maps, photographs, slides, magazines, videos, cassette tapes, and cooking demonstrations. French is interesting and useful for students who are planning to attend college, as well as for those who are not. Recent statistics show that a person who can speak a second language often improves his chances of finding a job. Foreign language mastery is a kind of insurance for many careers both skilled and professional. Language also expands the pleasures of travel, good literature and the arts. The student may advance to French II, III, IV. **Prerequisite/Recommendation for French I: "C" or better in 8<sup>th</sup> grade English.**

### UNIFIED BLOCK - Grade 9

This period of class work is required of all freshmen and each course is 9 weeks in length. The following summarizes activities:

<b>Course</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Health</b>	<b>UB910</b>	<b>.25</b>	<b>9</b>

Health will also be taught in this course covering the essential good health practices.

<b>Family Living</b>	<b>UB970</b>	<b>.25</b>	<b>9</b>
----------------------	--------------	------------	----------

This required course includes such topics as person development from birth to old age, dating, marriage, teen pregnancy, and family relationships/dynamics. A community project is also included.

<b>Public Speaking</b>	<b>UB985</b>	<b>.25</b>	<b>9</b>
------------------------	--------------	------------	----------

This course is an introduction to public speaking and is meant to give students an overview of experiences to help them lose their fear of speaking in front of groups. They will learn how to plan, research, compose, practice and deliver speeches and presentations. They will learn about the different types of speeches and will deliver each one. The students will study the process of communication and may study mass media, act out skits, debate one another, read dramatically and communicate using verbal and non-verbal methods.

<b>Careers</b>	<b>UB990</b>	<b>.25</b>	<b>9</b>
----------------	--------------	------------	----------

This course emphasizes the importance of furthering one's education and training as a path to a successful career. Students will use self-survey methods to discover occupations which match their interests, abilities, and which they find promising. Research is performed to find more specific information about these occupations (employment outlook, salary expectations, and lifestyles). The final segment of the course is devoted to job skills such as applications networking, interviewing, attendance and work behavior, and dealing with financial matters.

## PHYSICAL EDUCATION DEPARTMENT

<b>Required Courses</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Physical Education 9</b>	<b>6450</b>	<b>.5</b>	<b>9</b>
<p>In this required course, students will analyze the effects of regular participation in moderate to vigorous physical activities in relation to health improvement, stress management, disease prevention and weight management. They will analyze factors that affect the responses of body systems during physical activities, including: exercise location, individual fitness status, cardiorespiratory fitness, muscular endurance, muscular strength and flexibility. Students will describe and apply the components of skill-related fitness to movement performance, concepts of motor skill development, skill improvement, principles of training, apply biomechanical principles to complex movements and describe and apply game strategies to complex games and physical activities such as soccer, flag football, basketball, volleyball, fitness, dance, aerobics, hockey, badminton, archery, bowling, golf, tennis, softball, team games and track and field. Required for all 9<sup>th</sup> grade students.</p>			
<b>Physical Education 10-12</b>	<b>6455</b>	<b>.5</b>	<b>10, 11, 12</b>
<p>In this required course, students will continue the concepts outlined in PE 9 to evaluate and engage in an individualized physical activity plan that supports achievement of personal fitness and activity goals and promote lifelong participation. They will analyze the social, physiological and psychological effects of regular participation in moderate to vigorous physical activities. Students will assess and use strategies for enhancing adult group interaction in physical activities, apply knowledge of movement, skill-related fitness and movement concepts to identify and evaluate physical activities that promote personal lifelong participation. Students will participate in games and physical activities such as soccer, flag football, basketball, volleyball, fitness, dance, aerobics, hockey, badminton, archery, bowling, golf, tennis, softball, team games and track and field. Required once, sometime from 10<sup>th</sup>-12<sup>th</sup> grade.</p>			
<b>Elective Courses</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>High Impact Sports 10-12</b>	<b>6460</b>	<b>.5</b>	<b>10, 11, 12</b>
<p>High intensity physical education elective class for students who are interested in extra physical challenge. This course fulfills the requirement for .5 credits of PE within the 10-12 grade band.</p>			
<b>Weightlifting</b>	<b>6475</b>	<b>.5</b>	<b>10, 11, 12</b>
<p>Physical education elective class focusing on muscular strength, endurance, flexibility, and safety. Weight room safety, warm-up/cool down procedures, lifting technique and safety for all lifts, major muscle identification, and individual goal setting are all important components in this course. In addition, students will monitor and improve their fitness levels.</p>			
<b>Team Builders &amp; Total Wellness</b>	<b>6480</b>	<b>.5</b>	<b>9, 10, 11, 12</b>
<p>Have you ever wanted to work on your leadership skills and focus on your total wellness? This class is a project based class that will focus on leadership skills, how to facilitate and run team building activities as well as work on other aspects of your total wellness such as goal setting and resilience. Mindfulness, stress management techniques, how to be an advocate of your own health and community awareness of total wellness &amp; health. Researching various team building activities, qualities of a good leader, goal setting, problem solving, how to lead or facilitate group activities or meetings and working on collaboration within a group. All skills that you will need in the real world.</p>			

**PERFORMING ARTS DEPARTMENT**

<b>Course</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Band</b>	<b>PA0850</b>	<b>1</b>	<b>9, 10, 11, 12</b>
<p><u>This is a full-year course.</u> Students are admitted to Senior High Band after successfully demonstrating the mastery of instrument fundamentals by audition. Musical development will continue through the study of music from various cultures, styles and periods. Small ensembles will form throughout the year. Permission of the instructor of audition is required to participate in small ensembles. Students, who participate in band during the current year but do not wish to continue in band next year, <b><u>must have a parental conference with the band director in order to withdraw. The last day to arrange to drop band is one week before band camp. Band students will be required to attend a two-week band camp in August.</u></b></p>			

<b>Jazz Band</b>	<b>PA0852</b>	<b>.5-1</b>	<b>9, 10, 11, 12</b>
<p>This elective is for students interested in participating in Jazz Band. It will provide an opportunity for students to be exposed to different jazz styles such as swing, be-bop, blues-rock, and funk. You must be a member of band to participate in Jazz Band. This class may operate on an A/B schedule and may be taken for .5 or 1 credit. This course is offered opposite of chorus/chamber choir.</p>			

<b>Chamber Choir</b>	<b>PA0865</b>	<b>.5</b>	<b>9, 10, 11, 12</b>
<p>This group is an extension of the High School Concert Choir. You must be planning to be a member of the High School Concert Choir in order to audition for the Chamber Singers ensemble. Chamber Singers is a traveling group and has a more demanding performance schedule during concert season. A higher level of music literacy is expected and students will be expected to work outside of this class on their own, as well as attend added curricular rehearsals in the evening as needed according to the director. If you wish to audition or receive more information on the class, please see Mr. Bandi. The class meets on an A/B schedule opposite of Chorus.</p>			

<b>Chorus</b>	<b>PA0860</b>	<b>.5</b>	<b>9, 10, 11, 12</b>
<p>Chorus is an elective vocal class that meets on an A/B schedule opposite Chamber Singers. This is an extension of the middle school choir program. Students will be trained in the art of singing, sight singing, and basic music notation through the study of various choral compositions spanning various styles, genres, time periods, and languages. Students will be expected to attend two curricular concerts held in the evening in the auditorium. This class is a co-requisite for students who intend to also audition and potentially join the Chamber Singers ensemble.</p>			

<b>History of Rock n Roll</b>	<b>PA0870</b>	<b>.5</b>	<b>9, 10, 11, 12</b>
<p>This semester course covers the history of rock music from its origins in the blues and American country music to the diverse rock styles heard today. Analysis of performances and compositional styles of several familiar rock stars is included. Elvis Presley, The Beatles, Rolling Stones, Scott Joplin, The Temptations, Jerry Lee Lewis, and many others will be discussed. Social and political influences will be addressed, but the focus will be on the music itself. This course includes a field trip to the Rock n Roll Hall of Fame Museum in Cleveland. This course is offered opposite of <b>Beginning Guitar Level 1.</b></p>			

<b>Beginning Guitar Level 1/Level 2</b>	<b>PA0876/0877</b>	<b>.5</b>	<b>9, 10, 11, 12</b>
<p>This semester course is designed for students with no or little guitar experience. Students will receive guidance and direction in solving problems related to playing the guitar at a beginning level and will learn many of the different styles, skills and techniques required to become a successful guitarist. Areas of concentration include: correct posture, note reading, aural skills, flat-picking, singing songs, rhythmic patterns, chord study, finger-picking styles, musical forms, improvisation and performing experiences. <b>Teacher permission is required for Level 2 enrollment.</b></p>			

**APPLIED ARTS DEPARTMENT**

<b>Course</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Fundamentals of Art (1)</b> This is an introductory studio course that will prepare students for further art production experiences. Students will be introduced to skills, media, terms and techniques that are utilized in subsequent art electives. Students will learn the elements and principles of design and will explore both two-dimensional and three-dimensional mediums including: drawing, painting ceramics and sculpture.	<b>8800</b>	<b>1</b>	<b>9, 10, 11, 12</b>
<b>Intermediate Art (2)</b> This is a level 2 art course which builds upon the foundational skills learned in Fundamentals of Art (1). As in the level 1 course, Intermediate Art too will explore the Elements and Principles of Art as they relate to both two-dimensional and three-dimensional art. Additionally, this course will place greater stress on examining cultural impact and history of art works, art movements and artists.	<b>8825</b>	<b>1</b>	<b>10, 11, 12</b>
<b>Studio Arts (3)</b> This is a level 3 art course, building on the skills learned in previous courses. Students will produce two-dimensional and three dimensional works demonstrating a more developed understanding of the Elements and Principles of art. Students will continue to examine the cultural impact and history of art, with a greater stress placed on the critical process.	<b>8835</b>	<b>1</b>	<b>11, 12</b>
<b>Advanced Studio Arts (4)</b> In this course, students will be given slightly greater creative freedom, but with each project must submit a proposal, maintain a sketchbook with copious notes and sketches that reflect forethought and development of the project idea. Additionally, an artist statement must be submitted with each completed project. The course will cover art production, art history, art criticism and aesthetics.	<b>8845</b>	<b>1</b>	<b>12</b>

**BUSINESS/COMPUTER DEPARTMENT**

<b>Required Course</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Internet and MultiMedia</b> Students will focus on evaluating and understanding how to use the electronic information resources to create effective multimedia presentations. The course explores Internet based websites, various software packages for presentations, hardware, and other available multimedia resources. Students will effectively use these electronic tools to create individual projects such as Web pages and multimedia slide presentations. <b>This class IS REQUIRED and is typically taken in the 9th or 10th grade year. It fulfills .5 of the required 1.5 Computer Credits</b>	<b>7010</b>	<b>.5</b>	<b>9, 10</b>
<b>Elective Courses</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Business Web Design</b> In this STEM course, students will explore Google Sites and web page design as a way of communicating and placing information on the Internet. Students will learn how to: begin a web site, add text and titles, use color, prepare photos and graphics for the web, etc. It is intended to give students an introduction to web page creation and its application in the world of business. <b>This class will fulfill .5 of the required 1.5 Computer Credits</b> and is typically taken in the 9th or 10th grade year.	<b>7020</b>	<b>.5</b>	<b>9, 10</b>
<b>Accounting I</b> This is an introductory accounting course. Accounting is an essential preparatory course for students who are interested in any business career. Students will learn how to analyze and record business transactions. Financial statements will be prepared with an emphasis on how the numbers affect business decisions. Students will also study the importance of ethics in accounting through the use of real world case studies. This course is extremely beneficial for students interested in studying business after high school. <b>This class will fulfill .5 of the required 1.5 Computer Credits</b>	<b>7040</b>	<b>.5/1 TBD</b>	<b>10, 11, 12</b>
<b>Accounting II</b> This is a level 2 course, which builds on the foundational skills learned in Accounting I. This is a necessary course for any student planning to pursue an accounting career. It is also an excellent option for those who are considering a business major. Principles learned in Accounting I will be expanded and Automated Accounting will be introduced. Prerequisite: Minimum of the grade of B in Accounting I. <b>This class will fulfill .5 of the required 1.5 Computer Credits (Note: Due to enrollment numbers, this course MAY be run as an independent study during the Acct. I time slot).</b>	<b>7045</b>	<b>.5/1 TBD</b>	<b>11, 12</b>

**BUSINESS/COMPUTER DEPARTMENT, cont.**

<b>Elective Courses</b>	<b>Course Number</b>	<b>Credits</b>	<b>Grade Level</b>
<b>Digital Photography</b> This course will cover the basic artistic and technological fundamentals of digital photography. Students will learn how to capture light, color, and other design elements into a picture. Students will use simple point & shoot cameras as well as more advanced DSLR cameras. Students will also learn basic photo editing processes to enhance or add creative elements to their photographs. Equipment responsibility form is required.	<b>7050</b>	<b>.5</b>	<b>10, 11, 12</b>
<b>Digital Photography II</b> This course will continue to cover the artistic and technology based elements of photography. Students will have more rigorous and detailed assignments. This course will continue into more complex photo editing procedures. Students will have to spend time outside of the school day taking and editing photos. Equipment responsibility form and a personal 16GB SD card are required. Prerequisite: Digital Photography I with grade of B or better. <b>Level II will fulfill .5 of the required 1.5 Computer Credits.</b>	<b>7055</b>	<b>.5</b>	<b>11, 12</b>
<b>Video Editing and Production</b> Have you ever wanted to put your creativity onto film? Video Editing and Production will be structured like a work environment. Students will be expected to work in teams, to collaborate with one another, to delegate production roles, and meet deadlines. Students are expected to put forth their best effort. Time outside of school to complete projects will be required. Students will receive a DVD of their semester's work. Students will produce video announcements for the school.	<b>7060</b>	<b>1</b>	<b>10, 11, 12</b>
<b>Introduction to Business &amp; Marketing</b> This one-semester course is designed as an overview of the technology and concepts related to how business and marketing works. It will be helpful for students trying to figure out whether a career in the field of business is right for them. In this course, you will study the concepts, principles and operations of private enterprise. You'll compare and contrast sole proprietorships, partnerships, and corporations – and the legal advantages and disadvantages of each. You will explore the functions of modern business management, marketing, ethics and social responsibility that can improve or tarnish a business. You will also look at the human resource management side of running a business, and learn how employers can motivate their employees. You will be introduced to various areas of marketing research, the effects of competition, e-commerce, pricing, product development, distribution, promotion and advertising. You will also explore topics such as marketing technology and the Internet, global marketing, consumer behavior, and customer service.	<b>7068</b>	<b>.5</b>	<b>9, 10, 11, 12</b>
<b>Personal Financial Investments</b> This is a one semester course that provides the student with valuable skills needed to handle finance and investment decisions. A variety of financial subjects will be covered including the banking industry, financial goals, investment opportunities, risk management, real estate, diverse markets, and investment strategies.	<b>7075</b>	<b>.5</b>	<b>9, 10, 11, 12</b>
<b>Mass Communication Process (CHS)</b> <b>Weighted level III</b> This course is an introduction to mass communication, exploring the cultural, technological, and economic history of the media from newspapers to the Internet, the changing relationships between media industries, audiences, and cultures, and the theoretical underpinnings of mass communication research. By combining histories of specific communication forms, and traditional and contemporary theories of communication, the course places contemporary perspectives and issues in conversation with the history of media development and use in order to help students become more critical consumers of the media they experience daily. <b>Prerequisite: Internet and Multimedia, Class will fulfill 1 of the required 1.5 Computer Credits</b>	<b>7080</b>	<b>1</b>	<b>10, 11, 12</b>
<b>Intro to Comp. Program.Python (CHS)</b> <b>Weighted level III</b> This course is designed to teach students with no programming experience how to analyze and solve problems using the Python programming language (version 3.x). The course begins with an overview of the inner-working of modern computers to illustrate to the students that computers, while quite intricate, are merely machines. With this in mind, the rest of the course will focus on helping students learn to use these machines as problem solving tools through the use of Python, as well as the history of technological developments, computing hardware, networking, operations and terminology. <b>Prerequisite: Internet and Multimedia, Class will fulfill 1 of the required 1.5 Computer Credits</b>	<b>7085</b>	<b>1</b>	<b>10, 11, 12</b>

## FAMILY AND CONSUMER SCIENCE DEPARTMENT

Course	Course Number	Credits	Grade Level
<b>Intro to Family Consumer Science (1)</b> This introductory course focuses on foods, caring for a family and preparing students for success in the home, workplace and community. Home management; including basic cooking techniques and foods, planning nutritious and affordable meals, housing options, caring for, leaning and decorating a home, budgeting time and basic sewing are included. Students will have opportunities throughout the course to apply their learning through hands-on kitchen labs. They will also look at the food supply and analyze the influence of food engineering/technology trends, new food safety laws, the government's role in safeguarding our food supply and the impact of food addictions and eating disorders. <b>*You must take this course before you take any other cooking class.*</b>	<b>8000</b>	<b>1</b>	<b>9, 10, 11, 12</b>
<b>Culinary Arts II</b> This semester course will enhance and expand on food concepts covered in FCS 1 (Basic Foods). Some of the units covered in this class will be Quick Breads, Pastries, Foreign Foods, Holiday Traditions, and Soups. The course may also incorporate restaurant style food presentation, serving and clean-up. <b>Prerequisite: FCS 1 (Basic Foods)</b>	<b>8002</b>	<b>1</b>	<b>10, 11, 12</b>
<b>Culinary Arts III</b> This course will enable all students to learn how to express themselves creatively through food. It offers insight into personal and professional opportunities in culinary skills. Some of the units covered in class will be Cupcake Wars, Soup Off, CasseroleCConcoctions, and more! We will explore many unique and creative ways to cook and bake and will incorporate restaurant style food planning and preparation, presentation, serving, clean up and money management. <b>Prerequisite: FCS 1 (Basic Foods)</b>	<b>8003</b>	<b>1</b>	<b>10, 11, 12</b>
<b>Living on Your Own</b> This course is designed to help you sharpen your focus on your own life. It is to help you gain a clear picture of who you are, how you got that way, and most importantly, to help you make wise choices in your life. Topics include: relationships, housing, personal finance, parenting, communications, healthy lifestyle, food and nutrition, and preparing for life after high school.	<b>8050</b>	<b>.5</b>	<b>10, 11, 12</b>

## TECHNOLOGY/INDUSTRIAL ARTS DEPARTMENTS

Course	Course Number	Credits	Grade Level
<b>Introduction to Manufacturing and Design</b> This STEM class will be an introduction to the field of Manufacturing and Design. Students learn how to safely and properly use basic tools and machines. This class will also learn basic computer aided drafting (CADD). <b>*This is a mandatory Prerequisite to any other Manufacturing or CADD based elective. It will fulfill .5 of the required 1.5 Computer Credits.</b>	<b>8110</b>	<b>.5</b>	<b>9, 10, 11, 12</b>
<b>Advanced Manufacturing I/II</b> These STEM classes are project driven and allow students to properly develop, design and manufacture independent projects. All projects will be designed in CADD before any production work is done. Students at this level will also use advanced manufacturing technology including CNC machining, 3D printing and laser engraving. <u>Students must achieve a "C" or higher in Intro to Manufacturing &amp; Design before admission to this class. Any student that receives a failing grade in a marking period or misuses the technology will be removed from the class.</u> <b>This course will fulfill 1 of the required 1.5 Computer Credits.</b>	<b>8120/8125</b>	<b>1</b>	<b>10, 11, 12</b>
<b>STEM w/CADD</b> This STEM (Science, Technology, Engineering, Mathematics) course is designed to develop students' problem-solving, visualization and communications skills. The emphasis is on identifying, formulating, and using physics to solve engineering problems. Students will apply knowledge of mathematics, science, and engineering, design and conduct experiments, analyze and interpret data, as well as function on multi-disciplinary teams. Students will also be introduced into the various engineering fields as well as the requirements needed to excel in those majors. Students will need to come into class with the ability to use CADD software. <b>Prerequisite: "Introduction to Manufacturing and Design."</b> <b>It will fulfill .5 of the required 1.5 Computer Credits.</b>	<b>8130</b>	<b>.5</b>	<b>10, 11, 12</b>
<b>Manufacturing Enterprise</b> This hands-on business based course will provide students an opportunity to establish and run a company, develop a business plan, advertise for their company and properly design and construct products for the purpose of sale. It is highly recommended students take the Advanced Manufacturing and CADD courses before taking this class. Students will have access to modern manufacturing technologies that include CNC machining, 3D printing and laser engraving. <b>Prerequisite: Introduction to Manufacturing &amp; Design</b> <b>It will fulfill .5 of the required 1.5 Computer Credits.</b>	<b>8170</b>	<b>.5</b>	<b>12</b>

## INTERNSHIP/EXTERNSHIP PROGRAM

Course	Course Number	Credits	Grade Level
<b>Externship/Work Experience</b>	<b>9000</b>	<b>Varies</b>	<b>12</b>
<p>Work experience has been organized with the cooperation of local industries and trades to provide the student who has the proper qualifications with the opportunity to further knowledge and skills in the chosen occupational field during the school year. Participation is determined by students meeting minimum requirements and by the needs of local employers. Grading is based on submission of weekly logs and employer evaluations. <b>All Externships must be pre-approved by Guidance and Administration.</b></p>			
<b>Internship</b>	<b>9100</b>	<b>Varies</b>	<b>12</b>
<p>This is a school-based program in which students assist teachers as classroom tutors. Students will be placed as teachers' assistants in the <b>Elementary and/or the MS-HS Tutoring and Writing Center</b>. Students are assigned to specific teachers and classes and will provide academic assistance to younger students. Participation is determined by students meeting certain academic standards and with the recommendation of the high school principal, guidance counselor and assigned teachers. <b>All Internships must be pre-approved by Guidance and Administration.</b></p>			

### AP/CHS - COLLEGE IN HIGH SCHOOL (Dual Enrollment)

University of Pittsburgh, Seton Hill University - taught at Lakeview Middle-High School

Course	Course Number	Credits	Grade Level
<b>Honors English 11/AP Literature and Composition - Weighted level III</b>	<b>1350</b>	<b>AP 3/1 HS</b>	<b>11</b>
<p>This rigorous college-level course is offered to highly motivated 11th grade students who are interested in the careful reading and critical analysis of imaginative literature. Students learn to analyse and interpret literature; including novels, plays, short stories, essays and poetry through careful observation of textual detail, establish connections among their observations and draw on inferences from those connections leading to interpretive conclusions about the work's meaning. Writing instruction focuses on the critical analysis of literature and improving the students' abilities to explain clearly and cogently their understanding and interpretation of the literary works they read. While the core curriculum will have commonalities with English 11, honors/AP students will read some pieces of greater complexity, be introduced to literary criticism approaches, and analyze texts at a greater depth more independently. (Offered only to students meeting pre-determined guidelines). Students will keep a writing log over the course of the year to document their improvement and to engage themselves in thinking about their writing. This class requires a minimum of 10 hours of work per week and is reading and writing intensive. There is also required summer reading. <b>Testing data, teacher recommendation, and student performance prerequisites must be met to enter this course.</b></p> <p>Students meeting the aforementioned requirements will then be given the required summer reading assignments. <b>A student must fully complete the summer requirements to participate in the course. Students will be strongly encouraged to take the AP English Literature and Composition Exam at the end of the course.</b></p>			
<b>AP Language and Composition Weighted level III</b>	<b>1455</b>	<b>AP 3/ 1 HS</b>	<b>10, 11, 12</b>
<p>AP English Literature and Composition is an introductory college-level literary analysis course. Students cultivate their understanding of literature through reading and analyzing texts as they explore concepts like character, setting, structure, perspective, figurative language, and literary analysis in the context of literary works. This rigorous college-level course is offered to highly motivated 11th grade students who are interested in the careful reading and critical analysis of imaginative literature. While the core curriculum will have commonalities with English 11, AP students will read some pieces of greater complexity, be introduced to literary criticism approaches, and analyze texts at a greater depth more independently. (Offered only to students meeting pre-determined guidelines). This class requires a minimum of 10 hours of work per week and is reading and writing intensive. Testing data, teacher recommendation, and student performance prerequisites must be met to enter this course. Students meeting the aforementioned requirements will then be given the required summer reading assignments. A student must fully complete the summer requirements to participate in the course. Students will be strongly encouraged to take the AP English Literature and Composition Exam at the end of the course.</p>			

AP/CHS - COLLEGE IN HIGH SCHOOL (Dual Enrollment), cont.

<b>Psychology (CHS Introduction to Psychology) - Weighted level III</b>	<b>2470</b>	<b>3 CHS/1 HS</b>	<b>11, 12</b>
An introduction to psychology and its major subfields. Topics include experimental psychology, research methodology and statistics, learning, memory, brain and behavior, perception, human development, assessment techniques, personality theories, social psychology, and psychological disorders and treatment.			
<b>American Politics (CHS) Weighted level III</b>	<b>2900</b>	<b>3 CHS/1 HS</b>	<b>11, 12</b>
This is an introductory college level course in American politics. The purpose of the course is to teach students both about the American political system and about broad concepts social scientists use to study politics. Prerequisites: 1) 88% average in US History I and US History II courses, 2) Advanced or Proficient score on the Keystone Literature test and 3) Approval of instructor. <b>Offered odd years.</b>			
<b>International Politics (CHS) Weighted level III</b>	<b>2910</b>	<b>3 CHS/ 1 HS</b>	<b>10, 11, 12</b>
International Relations is the study of how states interact with each other. This course builds a working knowledge of our field, introducing the background, theoretical, and empirical tools necessary to understand international relations today. Students will learn about important findings in a variety of subfields, including war, international political economy, institutions, nuclear proliferation, and terrorism. Students will also solve problem sets and work with common international relations datasets to obtain a working understanding of the discipline's methodological foundations. <b>Prerequisite: Algebra 1. Offered even years.</b>			
<b>Pre-Calc (CHS) - Weighted level III</b>	<b>3400</b>	<b>3 CHS/ 1 HS</b>	<b>10, 11, 12</b>
A study of elementary functions, their graphs, and applications, including polynomial, rational, algebraic, exponential, logarithmic, and trigonometric functions. <b>Prerequisite: "B" or higher in Algebra II.</b>			
<b>Calculus I (CHS) - Weighted level III</b>	<b>3420</b>	<b>3 CHS/ 1 HS</b>	<b>11, 12</b>
This course is an introduction to differential and integral calculus: the study of change. We study the calculus of one variable. Topics found in this course include (but are not limited to) functions, limits, continuity, derivatives, Implicit differentiation, related rates, extrema, and an introduction to integration with applications to area and volume. <b>Prerequisite: "B" or higher in Pre-Calc (CHS)</b>			
<b>*Calculus II (CHS*) AP - Weighted level III</b>	<b>3425</b>	<b>3 AP/ 1 HS</b>	<b>12</b>
Calculus II is designed to be an extension of the Calculus I course. It is intended for advanced math students who have completed courses through Calc I with a high degree of success. Topics covered will include an initial review of prerequisite skills and concepts, differentiation and integration of transcendental functions, advanced integration techniques, and various applications thereof. <b>Prerequisite is Calculus 1</b>			
<b>Statistics (CHS Statistics) Weighted level III</b>	<b>3450</b>	<b>3 CHS/1 HS</b>	<b>11, 12</b>
This course teaches methods and terminologies of descriptive and inferential statistics. Students who complete this course will be able to conduct their own analyses of standard one-sample or two-sample data sets, follow statistical reasoning, and read statistical reports with understanding. Introductory topics in linear regression, analysis of variance and contingency table analysis also will be covered.			
<b>Advanced Chemistry w/lab (CHS) - Weighted level III</b>	<b>4320</b>	<b>4 CHS/1.5 HS</b>	<b>11, 12</b>
This is the first half of a two-term introduction to general chemistry. Topics include atomic theory, molarity, gases and kinetic theory, thermochemistry, electronic structure and the periodic table, relationships between phases, ionic solutions and acid/base theories, redox reactions, carbon chemistry, rates of reactions, chemical equilibria, and thermodynamics. This course requires laboratory sessions and exams on the Pitt campus. Transportation will be provided. Prerequisite: High school chemistry.			
<b>Advanced Biology (CHS Preparation for Biology) - Weighted level III</b>	<b>4400</b>	<b>3 CHS/ 1 HS</b>	<b>11, 12</b>
The goal of this course is to provide students with a foundation in biology. This course focuses on a review of chemistry as it applies to biology, the structure and function of macromolecules, the basic structure of cells, energy and cellular respiration, introduction to genetics and molecular biology, and development of dissection skills in the lab. While these topics are covered in high school Biology courses, Preparation for Biology delves deeper and applies chemistry to achieve a more complete understanding of Biology. This, combined with practicing critical thinking skills, and primary literature and data analyses, prepares students for the rigors of the Foundations of Biology series. <b>Prerequisite: A or B in Biology, passed Biology Keystone.</b>			

AP/CHS - COLLEGE IN HIGH SCHOOL (Dual Enrollment), cont.

<b>Human Anatomy w/lab (CHS)</b> <b>Weighted level III</b>	<b>4520</b>	<b>3 CHS/ 1.5 HS</b>	<b>11, 12</b>
---	-------------	----------------------	---------------

This course is designed to provide students with an in-depth background in human anatomy (structure) and physiology (function). It is strongly recommended for students who have an interest in nursing or other health careers. Emphasis is placed on skeletal, muscular, nervous, endocrine, digestive, respiratory, reproductive, cardiovascular, urinary and immune systems. Students must be able to work well in a supervised lab. This is a full year class. **Students must have completed Biology and passed the Biology Keystone Exam. They should have also taken Chemistry. It is highly suggested that all students in this course purchase an additional consumable resource; Kaplan Medical Anatomy Coloring Book 6th Edition, for a cost of \$30. This is optional, but would be a great additional resource to benefit the student.**

<b>AP Spanish IV - Weighted level III</b>	<b>5240</b>	<b>3 AP/ 1 HS</b>	<b>12</b>
---	-------------	-------------------	-----------

The grammar component includes gustar and similar verbs; the uses of para and por; the two Spanish past tenses (the preterite and the imperfect); the use of se with indefinite subjects; reflexive verbs; and formal and informal commands. Also included are comparatives and superlatives; the present subjunctive; the conditional, and the present and past perfect tenses. The oral, reading comprehension and cultural components of the course are enhanced by a series of short films and readings of interest to students. **Prerequisite: Spanish 1-3 and teacher recommendation. All students taking this course will be expected to take the AP test.**

<b>French IV (CHS) - Weighted level III</b>	<b>5340</b>	<b>3 CHS/ 1 HS</b>	<b>12</b>
---	-------------	--------------------	-----------

This course is an Intermediate College French I. The students will develop literacy skills in French through the communicative acts of reading, writing, and creating discourse around texts of all types. The students will be able to ask and respond to questions including the Francophone culture, politics, social problems, as well as the media. Grammar components will be included so that the students will be able to express themselves by writing longer and more cohesive paragraphs. Listening comprehension activities will be integrated into the course work to advance the understanding of the spoken language. All of these factors will give the students the opportunity to become proficient in the French language. **Prerequisite: French 1-3 and teacher recommendation.**

<b>Mass Communication Process (CHS)</b> <b>Weighted level III</b>	<b>7080</b>	<b>3 CHS/ 1 HS</b>	<b>10, 11, 12</b>
--	-------------	--------------------	-------------------

This course is an introduction to mass communication, exploring the cultural, technological, and economic history of the media from newspapers to the Internet, the changing relationships between media industries, audiences, and cultures, and the theoretical underpinnings of mass communication research. By combining histories of specific communication forms, and traditional and contemporary theories of communication, the course places contemporary perspectives and issues in conversation with the history of media development and use in order to help students become more critical consumers of the media they experience daily. **Course may be offered every other year.**

<b>*Introduction to Computer Programming Python (CHS) - Weighted level III</b>	<b>7085</b>	<b>3 CHS/ 1 HS</b>	<b>10, 11, 12</b>
--	-------------	--------------------	-------------------

This course is designed to teach students with no programming experience how to analyze and solve problems using the Python programming language (version 3.x). The course begins with an overview of the inner-working of modern computers to illustrate to the students that computers, while quite intricate, are merely machines. With this in mind, the rest of the course will focus on helping students learn to use these machines as problem solving tools through the use of Python. **Course may be offered every other year.**

\*College in High School availability pending CHS approval

**Grove City College - taught at GCC Campus (students responsible for transportation)**

**Additional information and enrollment packets will be available in the Guidance Office.**

Introduction to Biology  
Principles of Marketing  
Introduction to Productivity Software  
Principles of Microeconomics  
Principles of Macroeconomics  
Calculus I  
Introduction to Philosophy  
Introduction to Ethics

Foundations of Political Science  
Introductory & Intermediate Chinese  
Introductory & Intermediate French  
Introductory & Intermediate German  
Introductory & Intermediate Greek  
Introductory & Intermediate Hebrew  
Introductory & Intermediate Spanish